CONTRACT NO. 4400024424

CONTRACT FOR I-10 ITS SCOTT TO LAKE CHARLES (CE&I)

STATE PROJECT NO. H.013256.6 | F.A.P. NO. H013256 | ROUTE: I-10

LAFAYETTE, ACADIA AND JEFFERSON DAVIS PARISHES

June 15, 2022

Wednesday, June 15, 2022

Louisiana Department of Transportation and Development
1201 Capitol Access Road, Room 405-E
Baton Rouge, LA 70802-4438

Arcadis U.S., Inc.
10352 Plaza Americana Drive
Baton Rouge, Louisiana 70816
Phone: 225 292 1004
Fax: 225 218 9677
www.arcadis.com

Subject: **Contract No. 4400024424**
Contract for I-10 ITS Scott to Lake Charles (CE&I)

Dear Project Evaluation Team,

Construction activities are dependent on a contractor's schedule and complexity of the project, requiring varying levels of inspector resources for different tasks. LADOTD can draw on our large pool of inspector and engineering resources and trust they are fully qualified, certified and cross-trained to efficiently and effectively complete assigned tasks – regardless of size or complexity.

We have organized a project team by expertise and discipline to quickly identify the personnel best-suited to address the project's needs and scope. We bring a quality, experienced staff of ITS and CE&I personnel possessing the unique talents and direct experience necessary to meet the schedule and technical requirements of this contract.

Additionally, we've teamed with GEC and APS to add depth of expertise, specifically in their understanding of structural inspections, foundations, and soils. Through our hands-on, local experience with the LADOTD and ITS Section, as well as our success with LADOTD ITS CE&I IDIQ and Maintenance Engineering & Inspection (ME&I) IDIQ contracts, the Arcadis team is ready on Day 1 without any learning curve to successfully deliver this project.

We look forward to the opportunity to continue partnering with LADOTD to improve the safety, service, and reliability of Louisiana's transportation system. Thank you for your time and consideration.

Sincerely,
Arcadis

Tony Moore

Tony Moore, PE
Senior ITS CE&I Engineer

Akhil Chauhan PE, PTOE, PTP, PMP
Senior Vice President, Transportation Services

Sections

1-11

"Arcadis did an outstanding job managing the construction of the project. The Arcadis Project Engineer and inspectors were familiar with the area of work and easily navigated between multiple work locations, DOT facilities, and contractor facilities. Arcadis personnel were equipped with all the necessary Personal Protective Equipment (PPE) needed for the working conditions as required by the DOT Safety Manual and made sure the contractor was also in compliance of the DOTD Safety Manual PPE requirements. As mentioned above, their understanding of LADOTD CE&I standards and technical specifications resulted in the efficient execution of this project. This project was completed on time and within budget."

- Alaa Shams, LADOTD Alexandria ITS Deployment Phase 3 CE&I Project Manager

Arcadis drone operator taking video of Manchac Tower, New Orleans, LA

DOTD FORM: 24-102

(Revised March 1, 2022)

PROPOSAL TO PROVIDE CONSULTANT SERVICES

Prime consultant shall complete the DOTD Form 24-102 without altering the Form's text; however, the instruction and/or guidance for Sections 12 through 23 can be removed but do not remove Section title and number.

ANY CONSULTANT FAILING TO SUBMIT ANY OF THE INFORMATION REQUIRED ON THE DOTD FORM 24-102, OR PROVIDING INACCURATE INFORMATION ON THE DOTD FORM 24-102, MAY BE CONSIDERED NON-RESPONSIVE.

Prime consultant should enter the firm name in the footer at the bottom of this page. (It will carry over to subsequent pages.)

1. Contract title as shown in the advertisement	CONTRACT FOR I-10 ITS SCOTT TO LAKE CHARLES (CE&I) ROUTE: I-10 LAFAYETTE, ACADIA AND JEFFERSON DAVIS PARISHES
2. Contract number(s) as shown in the advertisement	CONTRACT NO. 4400024424
3. State Project Number(s), if shown in the advertisement	STATE PROJECT NO. H.013256.6 F.A.P. NO. H013256
4. Prime consultant name (as registered with the Louisiana Secretary of State where such registration is required by law)	ARCADIS ARCADIS U.S., INC.
5. Prime consultant license number (as registered with the Louisiana Professional Engineering and Land Surveying Board (LAPELS) if registration is required under Louisiana law)	EF.0002808 DUNS 057690414
6. Prime consultant mailing address	10352 Plaza Americana Drive Baton Rouge, LA 70816
7. Prime consultant physical address (existing or to be established, if location is used as an evaluation criteria)	10352 Plaza Americana Drive Baton Rouge, LA 70816
8. Name, title, phone number, and email address of prime consultant's contract point of contact	Tony Moore, PE Project Manager P. 504 648 3610 | E. Anthony.Moore@arcadis.com
9. Name, title, phone number, and email address of the official with signing authority for this proposal	Akhil Chauhan, PE, PTOE, PTP, PMP Senior Vice President P. 225 368 6563 | E. akhil.chauhan@arcadis.com
10. This is to certify that all information contained herein is accurate and true, and that the team presently has sufficient staff to perform these	

services within the designated time frame. By submitting this proposal, proposer certifies that it is not engaged in a boycott of Israel and it will, for the duration of its contract obligations, refrain from a boycott of Israel. Proposer also certifies and agrees that the following information is correct: In preparing its response, the proposer has considered all proposals submitted from qualified, potential subcontractors and suppliers, and has not, in the solicitation, selection, or commercial treatment of any subcontractor or supplier, refused to transact or terminated business activities, or taken other actions intended to limit commercial relations, with a person or entity that is engaging in commercial transactions in Israel or Israeli-controlled territories, with the specific intent to accomplish a boycott or divestment of Israel. The proposer also has not retaliated against any person or other entity for reporting such refusal, termination, or commercially limiting actions. DOTD reserves the right to reject the response of the bidder or proposer if this certification is subsequently determined to be false, and to terminate any contract awarded based on such a false response.	 Akhil Chauhan, PE, PTOE, PTP, PMP Date: June 15, 2022
11. If a Disadvantaged Business Enterprise (DBE) goal has been set for this advertisement, indicate which firm(s) will be used to meet the DBE goal and each firm(s)' percentage.	Firm(s): Firm(s)' %: APS (DBE/SBE) – 2%

DOTD
LOUISIANA DEPARTMENT OF TRANSPORTATION & DEVELOPMENT

ARCADIS

Sections 12-14

"Arcadis provided superior project management throughout the duration of the project and exceeded my expectations. Arcadis provided the project schedule, weekly and monthly status reports regarding completed and scheduled work in a timely manner. Their invoices are on-time and with almost no errors (invoices are extremely large and complicated). Exceptional performance in communications, cooperation, and follow-up with all stakeholders"

– *Erik Smith,* LADOTD ITS Routine Maintenance ME&I Project Manager

Arcadis inspector documenting installation of DMS post for Alexandria ITS Deployment.

12. Past Performance Evaluation Discipline Table:

As indicated in the advertisement, insert the completed table here. The percentages for the prime and sub-consultants must total 100% for **each past performance evaluation discipline**, as well as the overall total percent of the contract.

The only past performance evaluation disciplines to be used are: Road, Bridge, Traffic, CE&I/OV, Geotech, Survey, Environmental, Data Collection, Planning, Right-of-Way, CPM, ITS, Appraiser and Other. The crosswalk from the old categories to the new categories can be found at the link below: http://wwwsp.dotd.la.gov/Inside_LaDOTD/Divisions/Engineering/CCS/General%20Information/CPPR%20Crosswalk%20to%20New%20Evaluation%20Disciplines.pdf. (same link as in the advertisement)

Sub-consultants are allowed to be used for this proposal. Fill in the table by identifying only those evaluation disciplines consistent with the approach and methodology proposed in Section 19 of the DOTD Form 24-102*, the name of each firm that is part of the proposal, and the percentage of work in each past performance evaluation discipline to be performed by that firm. The percentage estimated for each evaluation discipline is for evaluation purposes only and will not control the actual performance or payment of the work. The percentages for the prime and sub-consultants must total 100% for each past performance evaluation discipline, as well as the overall total percent of the contract.

Evaluation Discipline(s)	% of Overall Contract	Arcadis	GEC	APS (DBE/SBE)
CE&I/OV	60%	85%	15%	
ITS	30%	100%		
Traffic	5%	100%		
Other (Field Testing)	5%	20%	40%	40%
Identify the percentage of work for the overall contract to be performed by the prime consultant and each sub-consultant.				
Percent of Contract	100%	87%	11%	2%

13. Firm Size:

For all firms that are part of this team, indicate the approximate number of personnel to be committed to this contract, by DOTD Job Classification and the total number of personnel within the firm that could provide support, if needed. If a specialized job classification is required and not included on the DOTD job classification list, specify "Other (xxxx)" and include the classification title inside the parentheses. The DOTD Job Classification(s) to be used can be found at the following link:
http://wwwsp.dotd.la.gov/Inside_LaLADOTD/Divisions/Engineering/CCS/Job_Qualification/Job%20Classifications%20with%20Descriptions.pdf

Firm name	LADOTD Job Classification	Number of personnel committed to this contract	Total number of personnel available in this LADOTD Job Classification (if needed)
ARCADIS	Principal	1	2
	Supervisor Engineer	3	5
	Supervisor – Other	1	1
	Engineer	6	6
	Senior Technician	1	2
	Inspector – Lead	2	2
	Inspector	2	2
GEC	Inspector – Lead	2	2
APS Engineering and Testing (DBE/SBE)	Engineer	1	2
	Technician	1	1

(Add rows as needed)

14. Organizational Chart:

LOUISIANA DEPARTMENT OF TRANSPORTATION & DEVELOPMENT

Legend:

Meeting TEPR Requirement*
Traffic Control Supervisor (TCS) / Traffic Control Technician (TCT)
Meeting MPR
1. GEC, Inc.
2. APS, Inc.

Principal-in-Charge

Akhil Chauhan, PE, PTOE, PTP, PMP*

Tony Moore, PE*
Project Manager

Technical Advisor - QA/QC

Jeff Jones, IMSA II

CE&I Services

Construction Contract Administration
Tony Moore, PE*
Jeff Jones, IMSA II

Field Inspection & Investigation
Tony Jackson, IMSA II
Cody Lemoine
Justin Gaspard
Joshua Daigrepont
Reagan Johnson[1]
James Wheeler[1]

Testing/QA
Tony Jackson, IMSA II
Nick Dwyer, CPESC
Cody Lemoine
Justin Gaspard
Joshua Daigrepont
James Wheeler[1]
Sergio Aviles, PE[2]

Traffic Control
Tony Jackson, IMSA II
Cody Lemoine
Thomas Montz, PE, PTOE, PTP*

Construction Inspection & Testing of Structural Components
Tony Jackson, IMSA II
Tony Moore, PE*
Jeff Jones, IMSA II
Sergio Aviles, PE[2]
Paul Fulcher[2]

Additional ITS Services

ITS Network Design / Communications
Laura Hartley, PE, PTOE, PTP
Cody Lemoine

ITS Design/Electrical
Ranzy Whiticker, PE
Paul Hsu, PE

ITS Systems Engineering
Doug Tilt, PE, PMP
Paul Hsu, PE

Value Added Services

Claims Avoidance / Contract Administration
Roy Cooper, PE

Schedule Review and Tracking
Eric Schatz, PE, PSP, CFCC, LEED AP

Drone Construction Survey
Cody Lemoine

Health & Safety
Teresa Booker

Sections 15-17

"Arcadis has done an outstanding job delivering the ITS ME&I program exceeding my expectations. Their understanding of our ITS systems, innovative approach to ME&I and rapid response to natural disasters has resulted in significant reductions in downtime and increased reliability of the statewide ITS systems. Arcadis experience with ITS project life-cycle including planning, design, implementation, operations & maintenance has been important to bring the best solution to a problem."

- *Erik Smith,* LADOTD ITS Responsive Maintenance ME&I Project Manager

Arcadis drone operator taking video of completed DMS installation for Alexandria ITS Deployment.

15. Minimum Personnel Requirements:

Use the table below to identify both prime consultant and sub-consultant staff designated to work on this contract meeting the Minimum Personnel Requirements (MPRs) specified in the advertisement. Ensure the résumé reflects the required experience stated in the MPR.

MPR No. Do not insert wording from ad	Personnel being used to meet the MPR *(Individual(s) may not satisfy more than one MPR unless specifically allowed by Attachment B of the advertisement)*	Firm employed by	Type of license / certification & number	State of license	License / certification expiration date
1	Akhil Chauhan, PE, PTOE, PTP, PMP	ARCADIS	PE	LA	PE. 33703 09/30/2022
2	Tony Moore, PE		PE	LA	PE. 37887 09/30/2023
3	Ranzy Whiticker, PE		PE	LA	PE. 34132 09/30/2023
4	Laura Hartley, PE, PTOE		PE	LA	PE. 39030 09/30/2022
5	Paul Hsu, PE		PE	LA	PE. 35983 03/31/2023

16. Staff Experience:

Firm employed by	ARCADIS		Meet MPR No. 2
Name	Anthony Moore, PE	Years of relevant experience with this employer	4
Title	Senior ITS CE&I Engineer	Years of relevant experience with other employer(s)	27
Degree(s) / Years / Specialization		BS / 1994 / Civil Engineering, University of Missouri	
Active registration number / state / expiration date		PE.0037887 / LA / Exp. 09/30/2023	
Year registered	2013	Discipline	Civil Engineering
Contract role(s) / brief description of responsibilities.		Project Manager; CEI&I Services (Construction Contract Administration, Construction Inspection & Testing of Structural Components)	

Experience dates	Experience and qualifications relevant to the proposed contract
	Mr. Moore is an ITS CE&I Engineer that has spent the last 8 years successfully working on LADOTD ITS CE&I projects as the Project Engineer on IDIQ contracts. He currently specializes in ITS CE&I but has extensive experience in traffic and ITS engineering, design, signal timing development and deployment, and Intelligent Transportation System (ITS) design. He has more than 27 years of experience in the fields of traffic and safety analysis, signal design, and ITS design. As an ITS CE&I Engineer, his focus has been safety during construction and future maintenance of constructed components. He has successfully worked on projects at the Louisiana Department of Transportation and Development (LADOTD), Florida DOT, Missouri DOT, Kansas DOT, Texas DOT, City of Kansas City, Missouri, City of Olathe, City of Gainesville, Florida, and Lee County, Florida. Other certifications include: ATSSA TCS, TCT, Flagger, IMSA Traffic Signal Technician Level II.
02/16 – 08/17	**CE&I for Lake Charles ITS Phase 2, LADOTD; Calcasieu Parish, LA.** *Project Engineer*. Provide construction management services to LADOTD on ITS expansion project in the Lake Charles metropolitan area. The ITS expansion project includes the installation of fiber optic communications cable, Dynamic Message Signs and Closed-Circuit Television cameras on I-10. As Project Engineer, responsibilities include overseeing all aspects of construction and inspection including providing engineering support and quality control oversight to the contractor during construction, directing field inspectors, and maintaining project documentation required by LADOTD.
08/21 – Present	**CE&I for I-10 US 61 to Laplace ITS Deployment, LADOTD, Ascension, St. James and St. John the Baptist Parishes, LA.** *Project Engineer*. *Provide Project Management and QA/QC services to LADOTD on ITS expansion project that includes the installation of approximately 23 miles of fiber optic communications cable and conduit and the installation of ten Closed Circuit television cameras including four that will be solar powered.* As Project Engineer, responsibilities include overseeing all aspects of construction and inspection including providing engineering support and quality control oversight to the contractor during construction, directing field inspectors, and maintaining project documentation required by LADOTD, including RFIs and shop drawings. traffic signal equipment upgrades and modifications.
02/19 – 08/21	**CE&I for US 190 ITS Deployment, LADOTD, West Baton Rouge, Pointe Coupee and Landry Parishes, LA.** *Project Engineer.* *Provide project Management and QA/QC services to LADOTD on ITS expansion project that includes the installation of approximately 48 miles of fiber optic communications cable, the interconnection of four traffic signals onto the LADOTD communications network, and the installation of two communications HUB buildings.* As Project Engineer, responsibilities include overseeing all aspects of construction and inspection including providing engineering support and quality control oversight to the contractor during construction, directing field inspectors, and maintaining project documentation required by LADOTD, including RFIs and shop drawings.

10/19 – 08/21	CE&I for Alexandria ITS Deployment Phase 3, LADOTD, Rapides Parish, LA. *Project Engineer*. Provide construction management services to LADOTD on ITS expansion project in the Alexandria metropolitan area. The ITS expansion project includes the installation of fiber optic communications cable, Dynamic Message Signs and Closed-Circuit Television cameras on US 71, US 165, and LA 28. As Project Engineer, responsibilities include overseeing all aspects of construction and inspection including providing engineering support to the contractor during construction, directing field inspectors, and maintaining project documentation required by LADOTD.
10/16 – 08/17	CE&I for I-10 Bonnet Carre Emergency Crossing, LADOTD, St. John and St. Charles Parishes, LA. *Project Engineer*. Provide construction management services to LADOTD on ITS repair project in St. John and St. Charles Parishes. The ITS expansion project includes the installation of fiber optic communications cable, one Dynamic Message Sign, and the repair of two emergency crossing gates on the elevated section of I-10 near the Bonnet Carre spillway. As Project Engineer, responsibilities include overseeing all aspects of construction and inspection including providing engineering support and quality control oversight to the contractor during construction, directing field inspectors, and maintaining project documentation required by LADOTD.
12/15 – 10/16	CE&I for New Orleans Hospitality Zone, LADOTD, Orleans Parish, LA. *Project Engineer.* Provide construction management services to LADOTD on ITS expansion project in the New Orleans metropolitan area. The ITS expansion project includes the installation of Ramp Metering signals on 6 freeway entrance ramps to US 90B, fiber optic communications cable, and Closed-Circuit Television cameras. As Project Engineer, responsibilities include overseeing all aspects of construction and inspection including providing engineering support and quality control oversight to the contractor during construction, directing field inspectors, and maintaining project documentation required by LADOTD.
12/12 – 06/16	CE&I for New Orleans Core ITS, LADOTD, Jefferson and Orleans Parish, LA. *Project Engineer.* Provide construction management services to LADOTD on ITS expansion project in the New Orleans metropolitan area. The ITS expansion project includes the installation of fiber optic communications cable, Dynamic Message Signs and Closed-Circuit Television cameras on I-10, I-610, and US 90B. As Project Engineer, responsibilities include overseeing all aspects of construction and inspection including providing engineering support and quality control oversight to the contractor during construction, directing field inspectors, and maintaining project documentation required by LADOTD.
03/13 – 8/15	CE&I for Weigh In Motion, LADOTD, Jefferson and Orleans Parish, LA. *Project Engineer*. Provide construction management services to LADOTD on statewide weigh in motion upgrade project. The weigh in motion project includes the installation of fiber optic communications cable, Dynamic Message Signs, Closed Circuit Television cameras, and weigh in motion scales on I-10, I-12, and I-20. As Project Engineer, responsibilities include overseeing all aspects of construction and inspection including providing engineering support to the contractor during construction, directing field inspectors, and maintaining project documentation required by LADOTD.
06/14 – 11/15	CE&I for Dynamic Message Sign (DMS) Ladder Statewide, LADOTD, Statewide, LA. *Project Engineer.* Provide construction management services to LADOTD on DMS Ladder project to install new DMSs and ladder/walkway systems on existing DMS poles. As Project Engineer, responsibilities include overseeing all aspects of construction and inspection including providing engineering support to the contractor during construction, directing field inspectors, and maintaining project documentation required by LADOTD.

Firm employed by	ARCADIS		
Name	Anthony Jackson, IMSA II	Years of relevant experience with this employer	4
Title	Senior Technician/Inspector - Lead	Years of relevant experience with other employer(s)	19
Degree(s) / Years / Specialization		Pre-Civil Engineering Coursework / 2016 – Ongoing / Baton Rouge Community College	
Active registration number / state / expiration date		N/A	
Year registered	N/A	Discipline	ATTSA TCT, TCS, Flagger; IMSA Traffic Signal Level II and III. Manufacturer certifications in COHU, Daktronics, Econolite (Autoscope), Trafficware, and Fall Protection (Authorized Person)
Contract role(s) / brief description of responsibilities		CE&I Services (Field Inspection & Investigation, Traffic Control, Testing/QA, Construction Inspection & Testing of Structural Components)	

Experience dates	Experience and qualifications relevant to the proposed contract
	Mr. Jackson has 23 years of experience in field inspection and investigation, testing/QA, and construction inspection and testing of structural components on LADOTD ITS CE&I projects. He has 19 years of experience working on ITS and traffic signal projects including construction, inspection, system integration and maintaining traffic signal and ITS systems in the transportation industry. He has experience with complex intelligent transportation system (ITS), and Traffic Signalizations. He has a thorough knowledge of LADOTD standards and specification. He has certified technical trainings on ITS assets and systems such as COHU, Axis, Daktronics, ISS RTMS Traffic Detector, Trafficware TS2, and Econolite Autoscope and others. He also has certifications as an IMSA Level III Traffic Signal Technician, and Traffic Signal Inspector for Advance Technologies.
08/21 – Present	**CE&I for I-10 US 61 to Laplace ITS Deployment, Ascension, St. James, St. John the Baptist Parishes, LA / S.P.N. H.013710 F.A.P No. H.013710.** *Senior Technician/Lead Inspector. Provide field inspection and investigation services to LADOTD on ITS expansion project that includes the installation of approximately 23 miles of fiber optic communications cable and conduit and the installation of ten Closed Circuit television cameras including four that will be solar powered.* As Senior Technician/Lead Inspector, responsibilities include overseeing all aspects of construction and inspection including providing support and quality control oversight to the contractor during construction, directing field inspectors, and maintaining project documentation required by LADOTD, including Daily Work Reports, materials testing submittals, daily temporary traffic control, and daily pay item field diaries.
02/19 – 08/21	**CE&I for US 190 ITS Deployment, LADOTD, West Baton Rouge, Pointe Coupee, and Landry Parishes, LA / S.P.N. H.011511 F.A.P No. H.011511.** *Senior Technician/Inspector - Lead. Provide field inspection and investigation services to LADOTD on ITS expansion project that includes the installation of approximately 48 miles of fiber optic communications cable, the interconnection of four traffic signals onto the LADOTD communications network, and the installation of two communications HUB buildings.* As Project Technician, responsibilities include overseeing all aspects of construction and inspection including providing engineering support to the contractor during construction, directing field inspectors, and maintaining project documentation required by LADOTD.
10/19 – 08/21	**CE&I for Alexandria ITS Deployment Phase 3, LADOTD, Rapides Parish, LA / S.P.N. H.011505 F.A.P No. H.011505.** *Project Technician.* Provide construction management services to LADOTD on ITS expansion project in the Alexandria metropolitan area. The ITS expansion project includes the installation of fiber optic communications cable, Dynamic Message Signs and Closed-Circuit Television cameras on US 71, US 165, and LA 28. As Project Technician, responsibilities include overseeing all aspects of

	construction and inspection including providing engineering support to the contractor during construction, directing field inspectors, and maintaining project documentation required by LADOTD.
05/13 – Ongoing	ITS Maintenance Retainer Contract – Program Management and Maintenance Management System, LADOTD, Statewide, LA. *Sr. Technician*. Premier duties were to integrate, troubleshoot, and perform preventative maintenance, on CCTV Cameras, DMS, VD, and Ramp Meters. Performs QA/QC checks after any work is performed on the routine and responsive maintenance. The site visits for quality control on maintenance activities to secure thoroughness of work against maintenance procedure. It also allows the inspection of the TCP installation, and usability for current roadway geometrical conditions.
06/15 – 12/15	District 04 Controller Upgrade Traffic Signalization and Related Work, Bienville, Bossier, Caddo, Claiborne, Desoto, Red River, Webster, Jefferson, Orleans, St. Bernard, St. Charles Parishes, Baton Rouge, LA. *Project Manager/Sr. Technician*. Participated in planning and bidding to obtain contracts for projects. Acting Traffic Control Supervisor on the project and coordinated work schedule with LADOTD. Served as Lead Technician on project and approved partial estimates and change orders. On site, was responsible for programming ATC controllers, and installing GPS in the controller cabinets. Maintain proper traffic control by coordinating the shutdowns of major and minor signalized intersection with state and local police departments.

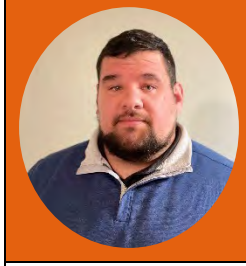
Firm employed by	GEC		
Name	James "Jimmy" Wheeler	Years of relevant experience with this employer	15
Title	Senior ITS Inspector	Years of relevant experience with other employer(s)	13
Degree(s) / Years / Specialization		N/A	
Active registration number / state / expiration date		N/A	
Year registered	N/A	Discipline	N/A
Contract role(s) / brief description of responsibilities.		CE&I Services (Field Inspection & Investigation, Testing/QA)	

Experience dates	Experience and qualifications relevant to the proposed contract
	Mr. Wheeler has more than *28 years of experience in ITS field inspection and investigation*.. He is the lead inspector on a variety of ITS and electrical construction projects and has experience with construction installation and operation including equipment maintenance, heavy equipment operation, installation of dynamic message signs and CCTV cameras with structures in both Louisiana and Texas, installation of bridge mounted conduit and junction boxes and underground conduit and pullboxes, installation of high mast lighting and roadway illumination, installation of electrical service points, installation of guard rail, installation of communication hub buildings, installation of fiber optic cable and splicing, traffic signal build out and commissioning, and setup and execution of lane closures.
10/14 – 01/17	**CE&I for Baton Rouge ITS Deployment Phase 3: Statewide, LA.** *Electrical Inspector.* Responsible for electrical inspection and reporting for this project. CE&I for five (5) new DMS sites, ten (10) new CCTV sites, one (1) new hub site, thirty (30) Bluetooth Vehicle Detectors (combined with new and existing sites) and five (5) miles of new fiber optic build-out, conduit, and associated pullboxes.
05/08 – 10/13	**CE&I for Baton Rouge to New Orleans, ITS – Traffic Incident Management (TIM) Phase I, Route I-10-Bonnet Carré Floodway, Design Build Project, Statewide, LA**. *Electrical Inspector.* Responsible for electrical inspection and reporting for this project. The project included Design and installation of ITS devices including ground and structure mounted Dynamic Message Signs (DMS), ground and structure mounted Closed Circuit Television Cameras (CCTV), structure mounted Traffic Detectors, underground and structure mounted conduit, power distribution, and wireless and fiber optic communications. Performed Quality Control inspection for the Design Build team.
06/10 – 08/11	**CE&I for Baton Rouge to Lafayette, ITS – Traffic Incident Management (TIM) Phase 2, Routes I-10, I-49, US 90, and US 190, Design Build Project, Statewide, LA.** *Electrical Inspector.* Responsible for electrical inspection and reporting for this project. CE&I services for the installation of 24 CCTV, four (4) DMS detection, and wireless & fiber optic communications.
06/11 – 05/14	**CE&I for Traffic Incident Management (TIM) Phase 3, Statewide, LA**. *Electrical Inspector.* Responsible for electrical inspection and reporting for this project. CE&I for the construction and integration of twelve (12) new DMS sites, forty (40) CCTV sites (new and existing), two (2) new hub sites, eleven (11) RVD sites (new and existing) and thirty (30) miles of new fiber optic network backbone elements.
07/19 – Ongoing	**CE&I for I-10/Loyola Interchange Improvements, Jefferson Parish, LA.** *Inspector - Lead.* Serving as the on-site representative for GEC who was selected as the Owner Verification firm. Providing all necessary engineering & related services for Design-Build Construction Support Services for the administration of the Design-Build contract on behalf of LADOTD, along with managing the implementation of the Project's Construction Quality Assurance Program (CQAP). Performs electrical inspection services.

Firm employed by	GEC		
Name	Reagan "Sean" Johnson	Years of relevant experience with this employer	20
Title	Senior ITS Inspector	Years of relevant experience with other employer(s)	10
Degree(s) / Years / Specialization		N/A	
Active registration number / state / expiration date		N/A	
Year registered	N/A	Discipline	N/A
Contract role(s) / brief description of responsibilities.		CE&I Services (Field Inspection & Investigation, Testing/QA)	

Experience dates	Experience and qualifications relevant to the proposed contract
	Mr. Johnson holds the position of ITS Technician and has more than 30 years of experience in field inspection and investigation and testing/QA. He has expansive experience in on-site daily construction inspection, construction inspection reporting, construction management, and maintaining field diaries. He also possesses extensive experience in design, implementation, and integration of ITS projects. Most recently his experience includes use of Headlight software, in addition to his computing skills in UNIX, Linux, and Windows 9xx/NT/2K/XP/server. He also possesses experience with a wide variety of information systems ranging from routing and switching, optical network design, Ethernet network design and management, CCTV video network design and configuration, and point-to-point and point-to-multipoint WAN connectivity. Mr. Johnson is well versed in fiber optic cable outside and inside plant design and handling practices. This includes OTDR analysis, optical budget calculation, cable specification, termination, and selective splicing methods.
01/11 – 12/15	**CE&I for Lake Pontchartrain Causeway Bascule Control System Replacement, GNOEC, St. Tammany and Jefferson Parishes, LA.** *Electrical Inspector.* GEC designed a replacement control system to allow operator control of the bascule bridge system at the North Channel of the Lake Pontchartrain Causeway. Performed inspection of the installation of new electrical components, PLC, operators control console and roadway lighting systems as well as the testing of these systems to assure that they met the requirements and specifications.
08/17 – 04/18	**CE&I for LADOTD Retainer Contract for Intelligent Transportation Systems (ITS) Statewide I-10 Twin Spans ITS, Orleans and St. Tammany Parishes, LA.** *Inspector. The project consisted of field inspection and investigation of one (1) new DMS site, four (4) new CCTV sites, bridge mounted CCTV platforms, and integration into existing fiber optic backbone.*
09/10 – 12/13	**CE&I for ITS-Traffic Incident Management (TIM-PHASE 3), Routes I-10, I-110, I-12, and US 61, DESIGN BUILD PROJECT: Baton Rouge, LA.** *ITS Technician*. Responsibility included CE&I for the construction and integration of 12 new DMS sites, 40 CCTV sites (new and existing), 2 new hub sites, 11 RVD sites (new and existing), and fiber optic network backbone elements.
06/10 – 08/11	**CE&I for Baton Rouge to Lafayette, ITS – Traffic Incident Management (TIM) Phase 2, Routes I-10, I-49, US 90, AND US 190, DESIGN BUILD PROJECT: Baton Rouge, LA.** *ITS Technician*. Responsible for CE&I and plan/submittal review services.
05/08 – 06/14	**CE&I for Baton Rouge to New Orleans, ITS – Traffic Incident Management (TIM) Phase I, Route I-10 – Bonnet Carre Floodway, DESIGN BUILD PROJECT: Baton Rouge, LA.** *ITS Technician*. Responsible for CE&I and plan/submittal review services.
07/16 – 12/21	**Fiber Optic Mapping and Management, LA**. *Inspector*. Performed testing and cataloging of the installed DOTD fiber optics systems. Locations include Hammond, Covington, Slidell, Shreveport, Houma, and Baton Rouge

Firm employed by	ARCADIS		
Name	Cody Lemoine	Years of relevant experience with this employer	2
Title	Senior Technician	Years of relevant experience with other employer(s)	5
Degree(s) / Years / Specialization		N/A	
Active registration number / state / expiration date		N/A	
Year registered	N/A	Discipline	ATTSA TCT, TCS, Flagger; Senior Technician; Manufacturer certifications in COHU, Daktronics, Pelco, Axis, Econolite (Autoscope), ComTrain Tower Safety and Rescue (Certified Competent Instructor)
Contract role(s) / brief description of responsibilities.		CE&I Services (Field Inspection & Investigation, Testing/QA, Traffic Control, Construction Inspection & Testing of Structural Components, Value Added Services (Drone Construction Survey)	

Experience dates	Experience and qualifications relevant to the proposed contract
	Mr. Lemoine has seven years of experience in ITS CE&I and ITS design, integration, and maintenance. He has extensive experience with ITS communication system field inspection and investigation and design including wireless MESH, fiber optics, and copper networks. He has a thorough knowledge of WIFI, Cell Networks and Dedicated Short Range Communication (DSRC) systems and standards. He has certified technical trainings on ITS assets and systems such as COHU, Axis, Daktronics, ISS RTMS Traffic Detector, Trafficware/Naztec, Econolite Autoscope and others. He has been certified thru Comtrain as an in-house competent level instructor in Tower Safety and Rescue. He has 4 years of construction en=gineering and inspection while working on ITS Maintenance and CE&I projects for LADOTD.
08/21 – Present	**CE&I for I-10 US 61 to Laplace, LADOTD, Ascension, St. James and St. John the Baptist Parish, LA.** *Senior Technician.* Provide *field inspection and investigation services to LADOTD on ITS expansion project that includes the installation of approximately 23 miles of fiber optic communications cable and conduit and the installation of ten Closed Circuit television cameras including four that will be solar powered.* As Senior Technician/Lead Inspector, responsibilities include overseeing all aspects of construction and inspection including providing support and quality control oversight to the contractor during construction, directing field inspectors, and maintaining project documentation required by LADOTD, including Daily Work Reports, materials testing submittals, daily temporary traffic control, and daily pay item field diaries.
02/19 – 08/21	**CE&I for US 190 ITS Deployment, LADOTD, West Baton Rouge, Pointe Coupee, and Landry Parishes, LA.** *Senior Technician.* *Provide field inspection and investigation services to LADOTD on ITS expansion project that includes the installation of approximately 48 miles of fiber optic communications cable, the interconnection of four traffic signals onto the LADOTD communications network, and the installation of two communications HUB buildings.* As Senior Technician, responsibilities included overseeing all aspects of construction and inspection including providing engineering support to the contractor during construction, directing field inspectors, and maintaining project documentation required by LADOTD.
10/19 – 08/21	**CE&I for Alexandria ITS Deployment Phase 3, LADOTD, Rapides Parish, LA.** *Project Technician.* Provided construction management services to LADOTD on ITS expansion project in the Alexandria metropolitan area. The ITS expansion project included the installation of fiber optic communications cable, Dynamic Message Signs and Closed-Circuit Television cameras on US 71, US 165, and LA 28. As Project Technician, responsibilities include overseeing all aspects of construction and inspection including providing engineering support to the contractor during construction, directing field inspectors, and maintaining project documentation required by LADOTD.

05/13 – Ongoing	ITS Maintenance Retainer Contract – Program Management (PM) and Maintenance Management System (MMS), LADOTD, Statewide, LA. *Senior Technician*. Responsible for maintenance and related services for the LADOTD ITS maintenance program. Responsible for managing the routine maintenance of CCTV camera, dynamic message sign (DMS), vehicle detector (VD) and ramp meter sites, and responsive/emergency maintenance of CCTV camera and DMS sites located throughout the state of Louisiana. Performed training for and installation of the maintenance management system (MMS). Developed procedures and checklists for the performance of maintenance activities at ITS sites. Performed site inspections, validation and quality control checks for maintenance activities performed under the contract.
08/13 – Ongoing	ITS Maintenance Retainer Routine Maintenance Task Orders – CCTV Camera, DMS, VD, and Ramp Meter, LADOTD, Statewide, LA. *Senior Technician.* Responsible for providing routine maintenance of statewide ITS sites including, CCTV cameras, DMS, VD, and ramp meters. Routine maintenance activities typically include inspecting site equipment, changing air filters, vacuuming dust out of a cabinet, cleaning CCTV domes, cleaning DMS face plates, and cleaning cooling fans, as well as record keeping. Responsibilities also include development of detailed checklist by device type; integration of checklist with MMS software; standardized reporting; development of routine maintenance scheduler; and coordination with statewide traffic management center (TMC), regional TMCs, and DOTD districts before, during, and after all routine maintenance activities.

Firm employed by	ARCADIS		
Name	Justin Gaspard	Years of relevant experience with this employer	3
Title	Junior ITS/Traffic Signal Technician	Years of relevant experience with other employer(s)	3
Degree(s) / Years / Specialization		N/A	
Active registration number / state / expiration date		N/A	
Year registered	N/A	Discipline	N/A
Contract role(s) / brief description of responsibilities. Project Inspector		CE&I Services (Field Inspection & Investigation, Testing/QA, Traffic Control, Construction Inspection & Testing of Structural Components)	

Experience dates	Experience and qualifications relevant to the proposed contract
	Mr. Gaspard *specializes in ITS field inspection and investigation and ITS maintenance.* His responsibilities include managing the routine maintenance of closed-circuit television (CCTV) camera systems and Dynamic Message Sign (DMS), vehicle detector (VD) and ramp meter sites, and responsive/emergency maintenance of CCTV camera and DMS sites located throughout the state of Louisiana.
08/21 – Present	**CE&I for I-10 US 61 to Laplace ITS Deployment, Ascension, St. James, St. John the Baptist Parishes, LA.**-*Project Inspector.* Provide *construction inspection* services to LADOTD on ITS expansion project that includes the installation of approximately 23 miles of fiber optic communications cable and conduit and the installation of ten CCTV cameras including four that will be solar powered. As Project Inspector, responsibilities include observing and documenting all aspects of construction and preparing DWRs and reviewing daily *temporary traffic control*.
02/19 – 08/21	**CE&I for US 190 ITS Deployment, LADOTD, West Baton Rouge, Pointe Coupee, and Landry Parishes, LA.** *Inspector. Provide field inspection and investigation services for LADOTD on ITS expansion project that included the installation of approximately 48 miles of fiber optic communications cable, the interconnection of four traffic signals onto the LADOTD communications network, and the installation of two communications HUB buildings.* As Project Inspector, responsibilities included observing and documenting all aspects of construction and preparing DWRs and reviewing daily *temporary traffic control.* Assisted Lead inspector with maintaining project documentation required by LADOTD
03/19 – Ongoing	**CE&I for Intelligent Transportation System (ITS) Responsive Maintenance, LADOTD, Baton Rouge, LA.** *ITS Technician*. Responsible for providing responsive maintenance of statewide ITS sites including CCTV cameras and DMSs. Performs responsive/emergency maintenance in response to malfunctioning or faulty components that prevent the normal operations of ITS devices. Also responsible for tracking each responsive maintenance ticket to verify that work is done within the defined response time based on the site location.
03/19 – Ongoing	**ITS Routine Maintenance, LADOTD, Baton Rouge, LA.** *ITS Technician*. Responsible for maintenance of statewide ITS sites including CCTV cameras, DMSs, VDs and ramp meters. Routine maintenance activities typically include inspecting site equipment, changing air filters, vacuuming dust out of cabinets, cleaning CCTV domes, cleaning DMS face plates, and cleaning cooling fans, as well as record keeping.
05/22 – Ongoing	**ITS Maintenance, Alabama Department of Transportation & Development, Birmingham, AL.** *ITS Technician*. Responsible for ensuring proper functions of ITS devices including CCTV cameras, Dynamic Message Signs (DMS), and vehicle detectors (VD). Also, responsible for verifying fiber optic communications to traffic signals, and repairing damaged fiber where needed.

Firm employed by	ARCADIS		
Name	Joshua Daigrepont	Years of relevant experience with this employer	4
Title	Senior Technician	Years of relevant experience with other employer(s)	3
Degree(s) / Years / Specialization		N/A	
Active registration number / state / expiration date		N/A	
Year registered	N/A	Discipline	ATTSA TCT, TCS, Flagger; Manufacturer certifications in Daktronics, Econolite (Auto-scope), ComTrain Tower Safety and Rescue (Authorized Climber & Rescuer); IMSA: Traffic Signal Field Technician Level 1 and Level 2.
Contract role(s) / brief description of responsibilities.		CE&I Services (Field Inspection & Investigation, Testing/QA)	

Experience dates	Experience and qualifications relevant to the proposed contract
	Joshua Daigrepont has *seven years of ITS experience including field inspection and investigation, design, integration, and maintainance.* He has experience with complex intelligent transportation system (ITS) networks that include wireless MESH, fiber optics, and copper. He has certified technical trainings on ITS assets and systems such as Daktronics, ISS RTMS Traffic Detector, Econolite Autoscope and others. He has been certified thru Comtrain as an in-house competent level in Tower Safety and Rescue. He has been certified under IMSA as a Level 1 and Level 2 Traffic Signal Field Technician.
08/19 – 05/20	**CE&I for Alexandria ITS Deployment, LADOTD, LA.** Assisted in inspection of ITS device construction and installation including, verifying traffic control, reading plan sets, completing daily work reports (DWR), and tracking quantities.
11/18 – Ongoing	**ITS Maintenance Retainer Contract – Program Management (PM) and Maintenance Management System (MMS), LADOTD; Statewide.** *Junior Technician.* Responsible for maintenance and related services for the LADOTD ITS maintenance program. Mr. Daigrepont is responsible for managing the routine maintenance of CCTV camera, Dynamic Message Sign (DMS), vehicle detector (VD) and ramp meter sites, and responsive/emergency maintenance of CCTV camera and DMS sites located throughout the state of Louisiana. Performed training for and installation of the maintenance management system (MMS). Developed procedures and checklists for the performance of maintenance activities at ITS sites.
11/15 – Ongoing	**ITS Maintenance Retainer Routine Maintenance Task Orders – CCTV Camera, DMS, VD, and Ramp Meter, LADOTD; Statewide, LA**: *Field Technician.* Responsible for providing routine maintenance of statewide ITS sites including CCTV cameras, dynamic message signs (DMS), vehicle detectors (VD), and ramp meters. Routine maintenance activities typically include inspecting site equipment, changing air filters, vacuuming dust out of a cabinet, cleaning CCTV domes, cleaning DMS face plates, and cleaning cooling fans, as well as record keeping. Responsibilities also include development of detailed checklist by device type; integration of checklist with MMS software; standardized reporting; development of routine maintenance scheduler; and coordination with statewide traffic management center (TMC), regional TMCs, and DOTD districts before, during, and after all routine maintenance activities. Performed these tasks for three years with a subcontractor and for 3 months with Arcadis.
11/15 – Ongoing	**ITS Maintenance Retainer Responsive Maintenance Task Orders – CCTV Camera and DMS, LADOTD; Statewide, LA**. *Field Technician*. Responsible for providing responsive maintenance of statewide ITS sites including CCTV camera and DMS. Responsive or emergency maintenance occurs in response to malfunctioning or faulty components that prevent the normal operations of ITS devices. Also responsible for tracking a responsive maintenance ticket to ensure work is done within the defined response time based on a site location.
06/22 – Ongoing	**Intelligent Transportation Maintenance: Alabama Department of Transportation & Development, Birmingham, AL.** *Field Technician.* Responsible for ensuring proper functions of ITS devices including CCTV cameras, Dynamic Message Signs (DMS), and vehicle detectors (VD). Also, responsible for verifying fiber optic communications to traffic signals, and repairing damaged fiber where needed.

Firm employed by	ARCADIS		Meet MPR No. 1
Name	Akhil Chauhan, PE, PTOE, PTP, PMP	Years of relevant experience with this employer	14
Title	Principal Engineer	Years of relevant experience with other employer(s)	6
Degree(s) / Years / Specialization		MS / 2003 / Transportation Engineering, Massachusetts Institute of Technology BS / 2001 / Civil Engineering, Indian Institute of Technology	
Active registration number / state / expiration date		PE.033703 / LA / Exp. 09/2022; PTOE #2544 / USA / Exp. 11/2023; PTP #246 / USA / Exp. 12/2024; PMP #1444676 / PA / Exp. 08/2023	
Year registered	2008	Discipline	Civil Engineering
Contract role(s) / brief description of responsibilities.		Principal-in-Charge	

Experience dates	Experience and qualifications relevant to the proposed contract
	As a principal ITS engineer and Certified Project Manager, Mr. Chauhan brings a unique experience of closely working with different LADOTD sections and stakeholders such as ITS, Traffic Engineering, Safety, Planning, Data/GIS, Environmental, Roadway Design, Bridge, and the local districts. From planning to design and construction to operations/maintenance, this full cycle interaction at various levels of the Department has given him a comprehensive understanding of needs and requirements on projects and programs, and how different pieces can come together to deliver positive outcomes for LADOTD. With his proactive approach and understanding of issues and challenges, Akhil ensures that his team provides quality deliverables within time and budget. He has more than 20 years of experience in the fields of ITS, traffic engineering, safety engineering, transportation planning, and emergency management. He has made several professional publications and presentations related to data and performance measures-driven programmatic ITS maintenance implementation, ITS deployments evaluation, and ITS benefit-cost analysis.
08/21 – Ongoing	**CE&I for I-10 US 61 to Laplace ITS Deployment, LADOTD, Ascension, St. James and St. John the Baptist Parishes, LA.** *Principal Engineer.* *Provide project management and QA/QC services to LADOTD on ITS expansion project that includes the installation of approximately 23 miles of fiber optic communications cable and conduit and the installation of ten CCTV cameras including four that will be solar powered.* The CV Readiness Review covered topics such as CV architecture, CV applications, and a detailed institutional policy, and legal and technical analysis of CV readiness for the TxDOT Fort Worth District. The plan incorporated various methodologies in conformance with the latest national/regional ITS architecture.
08/09 – 03/11	**Baton Rouge to Lafayette ITS – TIM Phase 2 Design-Build, LADOTD; Multiple Parishes, LA.** *Associate Project Manager / Senior ITS Engineer*. Responsible for providing ITS design and integration services for the project. Responsibilities included working with project manager on project planning; critical path method (CPM) project scheduling and updates in Primavera; contract, subcontract and vendor management; client and owner coordination; health and safety plan development; design plan and material submittals and tracking; and financial management and invoicing. Interacted and coordinated with the client and other stakeholders on a regular basis for project progress review meetings and provided meeting minutes. Responsibilities also include design of fiber optic and wireless communication along with 13 CCTV cameras, 13 RVDs, four DMSs, and two HARs within the project limits. Supervised development of temporary traffic control plans. Responsibilities include quality control and review of traffic controls plans to maintain through and local traffic and to limit possible interference with traffic at junctions with roads, streets, and driveways. Traffic control plans were developed for lane closures for several CCTV and RVD sites on US 190 and I-10 Atchafalaya Basin Bridge between Baton Rouge and Lafayette. Selected applicable LADOTD standard traffic control plans for other ITS construction sites.

06/13 – Ongoing	**ITS Maintenance Retainer Contract – Program Management and Maintenance Management System, LADOTD; Statewide, LA.** *Project Manager. R*esponsible for developing, implementing, and managing ITS maintenance plans, policies, standards, procedures, and guidelines. Responsibilities also include deployment planning, installation, configuration validation, data migration support and ongoing update to database, training, and annual MMS software support. Arcadis provided routine and responsive maintenance for the LADOTD's statewide ITS infrastructure. Such infrastructure includes CCTV cameras, Dynamic Message Signs (DMS), radar vehicle detectors, and ramp meters, totaling more than 500 sites statewide. The project scope includes program management; maintenance management system software; comprehensive maintenance plan for routine and responsive maintenance; health and safety and traffic control plan development; and tracking and performance measures reporting.
08/16 – Ongoing	**ITS Maintenance Retainer Routine Maintenance Task Orders – CCTV Camera, DMS, VD, and Ramp Meter, LADOTD; Statewide, LA.** *Project Manager. R*esponsible for providing routine maintenance of statewide ITS sites including CCTV cameras, Dynamic Message Signs (DMS), vehicle detectors (VD), and ramp meters. Routine maintenance activities typically include inspecting site equipment, changing air filters, vacuuming dust out of a cabinet, cleaning CCTV domes, cleaning DMS face plates, and cleaning cooling fans, as well as record keeping. Responsibilities also include development of detailed checklist by device type; integration of checklist with MMS software; standardized reporting; development of routine maintenance schedule; and coordination with statewide Traffic Management Center (TMC), regional TMCs, and DOTD districts before, during, and after all routine maintenance activities.
05/16 – Ongoing	**Connected & Autonomous Vehicles Technology Team Support, LADOTD, Statewide, LA.** *Project Manager.* Providing technical support services and facilitate need-based CV/AV planning activities related to CAV and their impact on highway infrastructure for the department's CAV Technology Team. Akhil and the Arcadis team facilitated workshops and web-based discussions for an inter-disciplinary 30-member CAV Technology Team to keep LADOTD updated on industry trends while preparing Louisiana for the future of transportation. The main goal of this project is to keep pace with current technological developments and better understand DOTD's needs before developing a CAV Strategic Implementation Plan. The purpose of the web meetings and workshops was to identify ways LADOTD can achieve ITS missions by leveraging CAV technology, present "lessons learned from Connected Vehicle (CV) deployments" from other transportation agencies, determine roles and responsibilities within LADOTD to support CAV projects, and keep the team up to date with current CAV technological developments.
04/17 – 07/17	**Real-time Traffic Data Systems Engineering Analysis, LADOTD, Baton Rouge, LA.** *Project Manager.* Provided systems engineering expertise to assist LADOTD transition from legacy roadway sensor infrastructure to traffic probe data service. The systems engineering approach involved comprehensive stakeholder coordination and detailed evaluation of traffic probe data service providers. A Systems Engineering Analysis (SEA) document was developed for this project that includes Concept of Operations to determine how the real-time traffic data will be utilized by the department to achieve traffic management goals. Additionally, the SEA included the development of project's physical architecture, high level system requirements, procurement options, alternative analysis configurations, and applicable ITS standards. The SE analysis was developed to guide the project development process and provided the groundwork for the ensuing system procurement and implementation.
06/18 – 10/19	**I-10 Queue Warning Systems Engineering Analysis, LADOTD, Baton Rouge, LA**. *Project Manager.* Managed a comprehensive team of ITS, Traffic, Data, and Safety engineers specialized in their respective areas to *complete a highly complex and first of its kind ITS Systems Engineering Analysis* involving the evaluation of a Queue Warning System for a frequently congested corridor on I-10 eastbound from LA 77 to I-110. The analysis developed short, medium, and long-term options to provide a comprehensive approach in enhancing the traveler's safety within the project area.

Firm employed by	ARCADIS		
Name	Jeffery Jones	Years of relevant experience with this employer	9
Title	Project Manager / Sr. ITS Technician	Years of relevant experience with other employer(s)	11
Degree(s) / Years / Specialization		2005 / Electrical Engineering Coursework / University of New Orleans 2005 / Electrical Engineering Coursework / Delgado Community College	
Active registration number / state / expiration date		N/A	
Year registered	N/A	Discipline	ATTSA TCT, TCS, TCDS, Flagger; Manufacturer certifications in COHU, Daktronics, Pelco, Axis, Econolite (Autoscope), Fall Protection (Authorized Person), Pelco, IMSA I, IMSA II / Louisiana Contractor License (Statewide Electrical, Telecommunications and Electrical Signs, Scoreboards, Displays, Billboards Construction)
Contract role(s) / brief description of responsibilities.		Technical Advisor – QA/QC, CE&I Services (Construction Contract Administration)	

Experience dates	Experience and qualifications relevant to the proposed contract
	Mr. Jones has 20 years of experience designing, integrating and maintaining information systems in the transportation industry. He has experience with complex intelligent transportation system (ITS) networks that include wireless MESH, fiber optics, and copper. He has a thorough knowledge of WIFI, Cell Networks and Dedicated Short Range Communication (DSRC) systems and standards. He has certified technical trainings on ITS assets and systems such as COHU, Axis, Daktronics, ISS RTMS Traffic Detector, Trafficware/Naztec TS1 and TS2 Traffic Controller, Econolite Autoscope and others. He is IMSA II certified and is a licensed electrical contractor.
02/19 – 08/21	**CE&I for US 190 Intelligent Transportation Systems (ITS) Deployment, LADOTD, West Baton Rouge, Pointe Coupee, and Landry Parishes, LA.** *Project Manager*. *Provided project management and QA/QC services to LADOTD on ITS expansion project that included the installation of approximately 48 miles of fiber optic communications cable, the interconnection of four traffic signals onto the LADOTD communications network, and the installation of two communications HUB buildings.* As Project Manager, responsibilities included overseeing all aspects of construction and inspection including oil engineering support to the contractor during construction, directing field inspectors, and maintaining project documentation required by LADOTD.
10/19 – 08/21	**CE&I for Alexandria ITS Deployment Phase 3, LADOTD, Rapides Parish, LA.** *Project Manager*. Provide construction management services to LADOTD on ITS expansion project in the Alexandria metropolitan area. The ITS expansion project includes the installation of fiber optic communications cable, Dynamic Message Signs (DMS) and Closed-Circuit Television (CCTV) cameras on US 71, US 165, and LA 28. As Project Manager, responsibilities included overseeing all aspects of construction and inspection including providing engineering support to the contractor during construction, directing field inspectors, and maintaining project documentation required by LADOTD.
08/16 – Ongoing	**ITS Maintenance Retainer Contract Program Management (PM) and Maintenance Management System (MMS), LADOTD, Statewide.** *Field Manager / Project Manager* responsible for program and project management, maintenance and related services for the LADOTD ITS maintenance program. Responsible for managing the routine maintenance of CCTV camera, Dynamic Message Sign (DMS), vehicle detector (VD) and ramp meter sites, and responsive/emergency maintenance of CCTV camera and DMS sites located throughout the state of Louisiana. Developed Traffic Control Plans (TCP) and worked with the LADOTD project manager to determine safety class and critical level assignments for all ITS sites. Performed training for and installation of the maintenance management system (MMS). Worked on the development of performance measures reports, ITS Maintenance Plan, Program Management Plan (PMP) and Health and Safety Plan (HASP) for the project. Developed procedures and checklists for the performance of maintenance activities at ITS sites. Performed site inspections, validation and quality control checks for maintenance activities performed under the contract.

08/16 – Ongoing	**ITS Maintenance Retainer Routine Maintenance Task Orders – CCTV Camera, DMS, VD, and Ramp Meter, LADOTD; Statewide, LA.** *Field Manager / Project Manager* responsible for providing routine maintenance of statewide ITS sites including, CCTV cameras, DMS, VD, and ramp meters. Routine maintenance activities typically include inspecting site equipment, changing air filters, vacuuming dust out of a cabinet, cleaning CCTV domes, cleaning DMS face plates, and cleaning cooling fans, as well as record keeping. Responsibilities also include development of detailed checklist by device type; integration of checklist with MMS software; standardized reporting; development of routine maintenance scheduler; and coordination with statewide traffic management center (TMC), regional TMCs, and DOTD districts before, during, and after all routine maintenance activities.
08/16 – Ongoing	**ITS Maintenance Retainer Responsive Maintenance Task Orders – CCTV Camera and DMS, LADOTD; Statewide, LA.** *Field Manager / Project Manager* responsible for providing responsive maintenance of statewide ITS sites including CCTV camera and DMS. Responsive or emergency maintenance occurs in response to malfunctioning or faulty components that prevent the normal operations of ITS devices. Also responsible for tracking a responsive maintenance ticket to see that the work is done within the defined response time based on a site location.
06/13 – 08/16	**ITS Maintenance Retainer Contract Program Management and Maintenance Management System, LADOTD, Statewide, LA.** *Project Manager* responsible for developing, implementing, and managing ITS maintenance plan, policies, standards, procedures, and guidelines. Responsibilities also included deployment planning, installation, configuration validation, data migration support and ongoing update to database, training, and annual MMS software support. Arcadis was *awarded the first-ever ITS maintenance contract* to establish a program to systematically provide routine and responsive maintenance for the LADOTD's statewide ITS infrastructure. Such infrastructure includes CCTV cameras, DMS, radar vehicle detectors, and ramp meters, totaling more than 500 sites statewide. The project scope includes program management; maintenance management system software; comprehensive maintenance plan for routine and responsive maintenance; health and safety and traffic control plan development; and tracking and performance measures reporting.
08/13 – 08/16	**ITS Maintenance Retainer Responsive Maintenance Task Order – CCTV Camera, LADOTD, Statewide, LA.** *Field Manager / Project Manager* responsible for providing responsive *maintenance of statewide ITS sites* including, CCTV camera and DMS. Responsible for responsive and emergency maintenance of ITS sites in Louisiana. Responsive maintenance involves the repair or replacement of any reported failed or malfunctioned equipment. Emergency maintenance is responsive maintenance that requires immediate repair, such as sites requiring traveler information, or incidents and events.
08/13 – 08/16	**ITS Maintenance Retainer Responsive Maintenance Task Order for Dynamic Message Sign (DMS), LADOTD, Statewide, LA.** *Field Manager / Project Manager* responsible for responsive and emergency *maintenance of all 79 DMS sites in Louisiana*. Responsive maintenance is the repair or replacement of any reported failed or malfunctioned equipment. Emergency maintenance is responsive maintenance requiring immediate repair, such as sites requiring traveler information, or incidents and events. Sites were classified by risk to safety, with Class A, B, or C as well as level of criticality, with High, Medium or Low. Each site requires different safety precautions based on classifications. Our project team assessed each site and applied the appropriate LADOTD traffic control details. When necessary, we developed a customized traffic control plan and worked with LADOTD staff for approval.
09/13 – 08/16	**ITS Maintenance Retainer Routine Maintenance Task Order for Ramp Meter Maintenance, LADOTD, Statewide, LA.** *Field Manager / Project Manager* responsible for providing routine *maintenance for the 16 ramp meters owned by LADOTD*. At the start of the program, none of the ramp meters were operating, so the first priority was to bring them back online. Once operational, our team logged routine maintenance site visits to keep all ramp meters in proper condition. These visits included activities such as inspecting site equipment, verifying operation of video and Bluetooth detection devices and making necessary adjustments or configuration changes to restore proper operation, as well as changing air filters, vacuuming dust out of cabinets, and cleaning cooling fans. All of these activities were logged into the MMS.

Firm employed by	ARCADIS		
Name	Douglas Tilt, PE	Years of relevant experience with this employer	23
Title	ITS System Integration Technical Advisor	Years of relevant experience with other employer(s)	4
Degree(s) / Years / Specialization		BS / 1996 / Civil Engineering, Georgia Institute of Technology-Main Campus	
Active registration number / state / expiration date		PE. 0033502 / LA / Exp. 03/2024	
Year registered	2007	Discipline	Civil Engineering
Contract role(s) / brief description of responsibilities.		ITS Services (ITS Systems Engineering)	

Experience dates	Experience and qualifications relevant to the proposed contract
	Mr. Tilt is a Senior Project Manager with more than 23 years of experience in traffic engineering, Intelligent Transportation System (ITS)/advanced transportation management system (ATMS) design, transportation planning, and transportation design. He has managed and designed numerous projects throughout the southeastern United States, including traffic signal projects, ITS/ATMS projects, intersection improvement projects, traffic and corridor studies, roadway concept development, and safety and operation studies.
06/13 – Ongoing	**ITS Maintenance Retainer Contract – Program Management and Maintenance Management System, Louisiana Department of Transportation and Development (LADOTD), Statewide, LA.** *QA/QC Compliance*. Responsible for developing, implementing, and managing ITS maintenance plans, policies, standards, procedures, and guidelines. Responsibilities also include deployment planning, installation, configuration validation, data migration support and ongoing update to database, training, and annual MMS software support. Arcadis provided routine and responsive maintenance for the LADOTD's statewide ITS infrastructure. Such infrastructure includes Closed-circuit television (CCTV) cameras, Dynamic Message Signs (DMS), radar vehicle detectors, and ramp meters, totaling more than 500 sites statewide. The project scope includes program management; maintenance management system software; comprehensive maintenance plan for routine and responsive maintenance; health and safety and traffic control plan development; and tracking and performance measures reporting.
08/16 – Ongoing	**ITS Maintenance Retainer Routine Maintenance Task Orders – CCTV Camera, DMS, Vehicle Detectors (VD), and Ramp Meter, Louisiana Department of Transportation and Development, Statewide, LA.** *QA/QC Compliance*. Responsible for providing routine maintenance of statewide ITS sites including, CCTV cameras, DMS, VD, and ramp meters. Routine maintenance activities typically include inspecting site equipment, changing air filters, vacuuming dust out of a cabinet, cleaning CCTV domes, cleaning DMS face plates, and cleaning cooling fans, as well as record keeping. Responsibilities also include development of detailed checklist by device type; integration of checklist with MMS software; standardized reporting; development of routine maintenance schedule; and coordination with statewide Traffic Management Center (TMC), regional TMCs, and DOTD districts before, during, and after all routine maintenance activities.
08/09 – 03/11	**Baton Rouge to Lafayette Intelligent Transportation Systems - Traffic Incident Management Phase 2, Louisiana Department of Transportation and Development, Baton Rouge, LA.** *ITS Design Manager/QC Manager.* Provided ITS design, construction, and integration services. Responsibilities included managing, leading, and reviewing design of fiber optic and wireless communication along with 13 CCTV cameras and RVDs, four DMSs, and two HARs on I-10, I-49, US 90 and US 190 between Baton Rouge and Lafayette, LA. Managed and reviewed monthly project reports, schedule, and budgets. Interacting with the

	client and other stakeholders on a regular basis for project progress review meetings. Conducted and supervised several field trips to verify design requirements and to meet technical specifications.
08/13 – Ongoing	ITS Maintenance Retainer Routine Maintenance Task Orders – CCTV Camera, DMS, VD, and Ramp Meter, LADOTD, Statewide, LA. *Senior Technician.* Responsible for providing routine maintenance of statewide ITS sites including CCTV cameras, DMS, VD, and ramp meters. Routine maintenance activities typically include inspecting site equipment, changing air filters, vacuuming dust out of a cabinet, cleaning CCTV domes, cleaning DMS face plates, and cleaning cooling fans, as well as record keeping. Responsibilities also included development of detailed checklist by device type; integration of checklist with MMS software; standardized reporting; development of routine maintenance scheduler; and coordination with statewide traffic management center (TMC), regional TMCs, and DOTD districts before, during, and after all routine maintenance activities.
09/11 – 10/11	Georgia SRTA Maintenance and System Integration, Georgia State Road and Tollway Authority, Fulton and DeKalb Counties, GA. *Project Manager*. Served as the Project Manager for the system integration and maintenance of the I-85 HOV to HOT conversion project. As a part of this effort, Arcadis reviewed the available design plans and network configuration documents. Arcadis provided final integration and maintenance support during the "go live" implementation of the I-85 HOT lanes, which included validation that the contractor installed the correct switch/router per contract, optimized the VLAN routing to the WAN, redesigned IP address schedule for improved network management, and developed a comprehensive maintenance plan to SRTA to keep the system running at peak efficiency.
06/06 – 05/08	GA TCC Upgrade and ATMS Modernization, City of Atlanta, GA. *Technical Advisor*. Technical advisor for this project that included the specification, procurement, installation, and integration of all the ATCC equipment. This also included all the equipment that went into the GDOT hub buildings and the field to bring the Atlanta traffic control systems up to current standards. The projects were executed successfully and accepted by the City of Atlanta and was completed in a period of 12 months. Project engineer for all phases. During Phase I, developed an Atlanta TCC field device architecture and strategic plan. Evaluated existing conditions, which included taking inventory of existing ATMS field device conditions in the Atlanta area. During Phase 2, evaluated potential technologies and strategies of ATMS field devices in use in Atlanta. During Phase 3, developed an ATMS network field communication deployment plan to bring the Atlanta TCC up to current state-of-practice.
01/15 – 01/16	New Orbital Highway and Truck Route – Project 23 (Contract 2), Qatar Public Works Authority "ASHGHAL", Doha, Qatar. P*roject ITS Technical Lead*. Project ITS Technical lead for this design-build project. Contract 2 of the New Orbital Highway included a 38km roadway network with 7 interchanges and 1 tunnel. The project also included truck only facilities to separate passenger and commercial truck traffic. ITS requirements included a communication network with Lane Control Signs, DMS, magnetometers, License Plate Recognition cameras, and CCTV cameras. Responsibilities included ITS device layout design, coordination with other disciplines, design report and documentation, and overall ASHGHAL design guideline and specification adherence.

Firm employed by	ARCADIS			Meet MPR No. 4
Name	Laura Hartley, PE, PTOE	Years of relevant experience with this employer		2
Title	Principal ITS Design Engineer	Years of relevant experience with other employer(s)		14
Degree(s) / Years / Specialization		BS / 2006 / Civil Engineering, University of Mississippi		
Active registration number / state / expiration date		PE.0039030 / LA / Exp. 09/2022 Professional Traffic Operations Engineer PTOE 4322		
Year registered	2014	Discipline	Civil Engineering	
Contract role(s) / brief description of responsibilities.		ITS Services (ITS Network Design/Communications)		

Experience dates	Experience and qualifications relevant to the proposed contract
	Ms. Hartley's experience includes developing Intelligent Transportation System (ITS), traffic and transportation planning projects for various Department of Transportations and municipalities across the Southeast. Her ITS experience and responsibilities include a wide range of activities from overall program management and the initial planning and systems engineering to design development, implementation, integration, development of Advanced Transportation Management System (ATMS) software requirements and performance measures for operations and maintenance. She will be responsible for leading the ATMS Task and supporting the Systems Engineering Analyses (SEA), System Integration and Independent Verification & Validation (IV&V) tasks.
04/13 – 10/13	**Video Distribution Management System (VDMS), Louisiana Department of Transportation and Development (LADOTD), Statewide, LA / H.005730.5.** *Project Engineer.* This project included the design and implementation of a VDMS for the distribution of LADOTD video sources statewide. Completed in two phases, Phase 1 included the development of a detailed VDMS design and implementation plan. Phase 2 included the implementation and integration of the VDMS in accordance with the final VDMS design and Implementation plan. The VDMS was designed to collect video sources from throughout the state and distribute amongst the DOTD's internal ITS systems and externally to media, partners, and other agencies, and to and from other regional and the Statewide Traffic Management Center(s) (TMC). Responsible for development of the VDMS design and implementation plan documents.
03/07 – 06/15	**ITS Task 7: Design Mississippi Department of Transportation's (MDOT) ATMS Software, MDOT, Jackson, MS.** *Project Manager, Transportation Engineer, Transportation EI.* Task 7 included the development of software requirements, updates and integration with TMC software, 511 integration, MDOT Traffic website and mobile applications. Responsible for developing software requirements and assisted MDOT in the selection of ATMS and Asset Management Software, which was procured, configured, integrated and tested under this project. This task also included supporting the integration of TMC operations and ITS devices with the ATMS software. Also supported integration of the ATMS that was included in the Mississippi River Bridges' Tiger Grant project which tied systems in Louisiana, Arkansas and Mississippi together.
03/07 – 06/15	**ITS Integrator, Task 6: System Requirements, MDOT, Jackson, MS.** *Transportation Engineer, EI.* This task included defining major function, high-level system requirements, detailed system requirements, and software functional requirements for many new systems and elements included in various ITS designs, ATMS Software, and 511 requirements. Responsible for developing requirements for various ITS designs as well as supporting the efforts in defining the major software requirements.

03/07 – 06/15	ITS Integrator, Task 1: Program Management, Systems Engineering Management Plan and Systems Engineering Analyses, MDOT, Jackson, MS. *Project Manager, Project Engineer.* Responsibilities included providing program level project management services and coordination, tracking ITS related projects, providing document control, developing program reports, developing outreach and marketing materials, developing grant applications, presentations and award submittals and coordinating with other consultants and vendors. Developed or assisted in the development of the Document Control and Management Plan and the development of the SEMP. Also responsible for the development SEAs for over 15 MDOT ITS projects developed during this period.
02/17 – 06/17	MDOSR 477 (West Rankin Parkway) from US 80 to SR 25, Jackson, MS. *Project Manager.* This project included the development of ITS Design Plans and Specifications for SR 477, known as West Rankin Parkway, from US 80 to SR 25. It includes providing fiber optic cable communications to ITS devices and signals along the corridor, a connection to the existing fiber optic communications along Lakeland Dr. and at the communications hub at US 80 and Highway 49. It includes cameras and blue tooth detection at key intersections and upgrades to the communications hut. As part of this project a SEA was also developed. Served as project manager and was responsible for developing the SEA document.
08/15 – 05/18	ITS Design & Implementation WO #4 I-10 Twin Span ITS – Orleans & St. Tammany Parishes, LADOTD, Statewide, LA. *Project Engineer.* Provided plans, specifications and estimates for this 8-mile project. The ITS system on the "Twin Span" utilized existing electrical system, conduits, fiber optic cables, cabinets, closed-circuit television (CCTV) camera locations, Dynamic Message Signs (DMS) location and the new ITS sites to be designed) to provide new bridge ITS elements of cameras, DMS, detection devices, communication hut, communication equipment, generators, and connect to existing bridge health monitoring equipment to the ITS network and TMCs. This project also included construction services.
07/16 – 10/17	ITS 2015 WA#5 - Tupelo Cell Tower and ITS Field Device Deployment, MDOT, Tupelo, MS. *Project Manager.* This project included providing engineering analysis and design services for the ITS and wireless system improvements, which included data collection review and conceptual design where we reviewed existing conditions, evaluated alternatives and provided conceptual design recommendations. Construction plans and detailed specifications for those improvements, including upgrades and/or reconstruction of existing wireless site location(s) and implementation of ITS elements were completed. This project included both wireless and traditional fiber optic communications, closed circuit television cameras, radar detection systems, Bluetooth detection systems with dedicated short-range communications. This is the first project in the state to pilot this technology. Served as the overall Project Manager and Project Engineer for this project which included leading a team of engineers in the development of the conceptual design, evaluation of alternatives and wireless system recommendations, and development of the SEA.
06/18 – 10/19	Phase 3-5 ITS, Town of Smyrna, Smyrna, TN. *Senior Engineer.* This project includes developing the project Systems Engineering Requirements (SEAR) document, plans, specifications and cost estimates for an ITS project in Smyrna, TN that includes interconnecting signals through wireless and fiber optic cable along with wireless devices. CCTVs are also being deployed as part of this project. Responsibilities included developing the SEAR, plans oversight and QAQC and development of ITS Specifications.
03/19 – 10/19	ITS Phase 1, City of Lebanon, Lebanon, TN. *Senior Engineer.* This project includes development of the project SEAR document, plans, specifications and cost estimates for an ITS project in Smyrna, TN that includes interconnecting signals through wireless and fiber optic cable along with wireless devices. CCTVs are also being deployed as part of this project. Responsibilities include development of the SEAR, analysis of Optical Time Domain Reflectometer reports to confirm if existing fiber optic cable was viable, plans oversight and QAQC and development of ITS Specifications.

Firm employed by	ARCADIS			Meets MPR No. 3
Name	Ranzy Whiticker, PE		Years of relevant experience with this employer	2
Title	Principal ITS & Electrical Engineer		Years of relevant experience with other employer(s)	24
Degree(s) / Years / Specialization			BS / 1994 / Electrical and Computer Engineering, University of Tennessee, Knoxville	
Active registration number / state / expiration date			PE.0034132 / LA / Exp. 03/2023	
Year registered	2008	Discipline	Electrical and Computer Engineer	
Contract role(s) / brief description of responsibilities.			ITS Services (ITS Design/Electrical, ITS Network Design/ Communications)	

Experience dates	Experience and qualifications relevant to the proposed contract
	Mr. Whiticker has more than 26 years of experience in the development, design and management of information communication systems and programs, including intelligent transportation systems (ITS) and emergency response systems. His work has included hands-on design, development, integration and operations of numerous types of communication, data and information systems. He has established partnerships for resource sharing and data integration between ITS programs and various emergency and transportation management agencies, and he has directed the implementation of innovative solutions such as video distribution management systems, public information display systems, and connected and autonomous vehicle technologies for multiple departments of transportation and local agencies.
10/12 – 07/15	**Retainer for ITS, Louisiana Department of Transportation and Development (LADOTD), Statewide, LA.** *Project Manager and Project Engineer*. General program assistance, ITS system configuration, configuration verification and management, 511 ATIS concept of operations and high-level requirements, video system support and Advanced Transportation Management System (ATMS) system support. Tasks and activities included assisting in project management services, coordination and provision of management oversight of the ITS program, system configuration and documentation support, public relations and sponsorship program support, and system configuration management support.
06/06 – 06/15	**ITS Integrator, Mississippi Department of Transportation (MDOT), Statewide, MS.** *Principal, Project Manager and Project Engineer.* Planning, design, integration, and operations and management of ITS projects, systems and program as directed by the MDOT project manager. Responsibilities included system evaluation and recommendations for ITS systems and development of technical specifications, including typical field ITS devices; communications equipment; video walls; adaptive signal control technology software; video distribution; 511 and Smart Work Zone systems; and grant development and grant project designs.
11/07 – 06/12	**ITS Task 8: Transportation Management Center (TMC) Operations, MDOT, Jackson, MS.** *Principal and Project Manager*. Provided oversight of Statewide and Regional TMC operations. URS provided many of the TMC operator staff as a sub while GSP provided oversight and technical staff, including network administrators, database managers, and ITS Technician staff. This task included the development of the Concept of Operations and Standard Operating Procedures and regular updates and maintenance of the documents.
10/08 – 06/14	**ITS Task 7: Design of MDOT's ATMS Software, MDOT, Jackson, MS.** *Principal and Project Engineer*. For software functional requirements definition, development, deployment, and management of TMC software, 511 integration, MDOT Traffic website and mobile applications. Provided integration of TMC operations and ITS devices with the ATMS software.
02/19 – 07/19	**TSM&O General Engineer Consultant, Florida Department of Transportation (FDOT) Central Office, Tallahassee, FL.** *QA/QC.* To update the Central Offices systems engineering training presentation documentation and PSEMP templates.

08/18 – 07/19	Tampa Hillsborough Expressway Authority (THEA) GEC, Tampa, FL. *Project Engineer*. Reviewed Connected Vehicle Pilot Project and developed Requirement Check off Matrix; Development of an ITS Master Plan; Developed a story board and concepts for submission of AV Grant; Developed requirements for TMC Video Wall RFP (ongoing); Assist THEA with updates for SOP documents.
10/12 – 10/16	Video Distribution Management System (VDMS), LADOTD, Statewide, LA, H.005730.5. *Project Manager.* Designed and implemented a VDMS for the distribution of LADOTD video sources statewide. Done in two phases, Phase 1 included the development of a detailed VDMS design and implementation plan. Phase 2 included the implementation and integration of the VDMS in accordance with the Final VDMS design and Implementation Plan. The Video Distribution Management System was designed to collect video sources from throughout the state and distribute amongst their internal ITS systems and externally to media, partners, and other agencies, and to and from other regional and the Statewide Traffic Management Center(s).
11/16 – 07/17	Mississippi River Bridges Incident Management, Freight Movement and Security ITS Project, MDOT, Multiple Locations. *Project Manager and Engineer.* TIGER grant project involving work at locations in Mississippi, Arkansas and Louisiana. Provided project design and construction oversight of an ITS project among MDOT, Arkansas Department of Transportation and the LADOTD to build a regional three-state ITS network to improve operational efficiency at the four Mississippi River crossings between the states through traffic monitors and dynamic message boards, river monitoring, and other means of conveying traveler information and detour route management. The project included testing and performance measure creation and monitoring for reporting to the Federal Highway Administration.
11/16 – 07/17	Tupelo Cell Tower and ITS Field Device Deployment WA#5, MDOT, Tupelo, MS. *Engineering Analysis and Design Services*. For the proposed ITS and wireless system improvements. Developed construction plans, detailed specifications and cost estimates. The project included erection of a new wireless tower to support multiple cell carriers and establish MDOT's regional cell tower. The design included interconnecting 13 traffic signals, 18 closed-circuit television cameras, and seven Bluetooth detection systems with dedicated short-range communications capabilities over 32 miles of freeway and four miles of urban/state highway.
06/99 – 12/00	Systems Integration, Georgia Department of Transportation (GDOT), Norcross, GA. *Senior Electrical Engineer*. Responsible for design evaluations and technical studies mainly for GDOT's NaviGAtor system. Responsibilities included developing operational and functional requirements for tasks such as presence detection systems. Performed evaluation studies such as lightning protection, solar-powered field sites, and video transport technologies. Other assignments included ITS architecture for GDOT, Atlanta's 911 studies and MARTA communication systems. Developed test procedures for system software releases.

Firm employed by	ARCADIS		
Name	Thomas Montz, PE, PTOE, PTP	Years of relevant experience with this employer	10
Title	Senior Transportation Engineer	Years of relevant experience with other employer(s)	3
Degree(s) / Years / Specialization		MS / 2011 / Civil Engineering, Louisiana State University BS / 2009 / Civil Engineering, Louisiana State University	
Active registration number / state / expiration date		PE.0039128 / LA / Exp. 09/2022; PTOE 4093 / USA / 07/2022; PTP 599 / USA / 03/2023;	
Year registered	2014	Discipline	Civil Engineering
Contract role(s) / brief description of responsibilities.		CE&I Services (Traffic Control)	

Experience dates	Experience and qualifications relevant to the proposed contract
	Mr. Montz is a Project Manager and Senior Transportation Engineer specializing in transportation planning / feasibility, modeling, safety, and design. He has more than 12 years of experience leading a multitude of planning and engineering projects including traffic signal timing and design, safety studies, NEPA studies, Stage 0 feasibility studies, and transportation management during construction. He specializes in traffic analysis and operations including signal timing, signal design, ITS design, HCM analysis, and microsimulation analysis.
06/13 – Ongoing	**ITS Maintenance Retainer Contract – Program Management and Maintenance Management System, LADOTD; Statewide, LA.** *Senior Engineer.* Responsible for developing, implementing, and managing ITS maintenance plans, policies, standards, procedures, and guidelines. Responsibilities also include deployment planning, installation, configuration validation, data migration support and ongoing update to database, training, and annual MMS software support. Arcadis provides routine and responsive maintenance for the LADOTD's statewide ITS infrastructure. Such infrastructure includes closed-circuit television (CCTV) cameras, dynamic message signs, radar vehicle detectors, and ramp meters totaling more than 500 sites statewide. The project scope includes program management; maintenance management system software; comprehensive maintenance plan for routine and responsive maintenance; health and safety and traffic control plan development; and tracking and performance measures reporting.
06/18 – 10/19	**I-10 Queue Warning Systems Engineering Analysis (SEA), LADOTD, Baton Rouge, LA.** *Senior Engineer.* Developed a highly complex and first of its kind Intelligent Transportation System (ITS) SEA involving the evaluation of a Queue Warning system for a frequently congested corridor on I-10 eastbound from LA 77 to I-110. The analysis required intensive processing and evaluation of traffic probe data as well as LADOTD's crash data using Geographic Information System (GIS) and electronic dashboarding tools to identify existing traffic conditions within the project area. The goal of the project is to provide a comprehensive approach in enhancing the traveler's safety. In addition to developing the operational concept, physical architectures, and alternative analysis configuration, the Arcadis team also provided preliminary 30% design plans that included Queue warning design alternative analysis, communication system integration, electrical system design recommendations, opinions of probable costs, and design drawings
04/19 – 12/19	**US 90 Traffic Signal Timing Upgrades/LADOTD, Lafayette Parish, LA.** *Technical Lead* of project tasks involving traffic data collection and analysis, signal inventory, peak period determination and observations, **warrant analysis**, travel time runs, **traffic signal timing analysis** using Synchro 10 software, and development of updated TSI forms following latest LADOTD standards.

01/18 – Ongoing	I-20 Transportation Management Plan (TMP) and Travel Assessment / LA 3 to LA 3105, Bossier City, LA. *Project Engineer.* Responsible for development of traffic model to predict queueing, delay and alternate travel patterns due to planned construction on I-20 to replace pavement. The project is anticipated to disrupt traffic in this critical portion of I-20. The project scope includes analysis of alternative routes, safety analysis, operational analysis, assistance with public outreach, development of a Level 4 TMP, and development of work zone mitigation strategies.
08/13 – 12/13	Crescent City Connection (CCC) ITS CCTV and Radar Vehicle Detection (RVD) System Repairs, LADOTD, New Orleans, LA. *Project Engineer.* Reviewed 27 ITS CCTV and RVD sites in the New Orleans area and recommend decommissioning or repair of the sites. Performed a technical assessment of the functional status of each site as well as the subsystem to derive the best solution with proposed recommendations for optimizing the operation of this subsystem. Recommendations included decommissioning of certain sites due to safety, operations, or maintenance issues; repair of remaining sites; and restoration of communications using cell modem technology.
07/18 – Ongoing	Tuscaloosa Regional Traffic Operations Program, Alabama Department of Transportation (ALDOT), Tuscaloosa, AL. *Senior Engineer.* Provides active signal and ITS management program for ALDOT. Responsible for creation of upgraded signal timings, signal parameter sheets, standardized TOD plans, and on-call assistance at the RTMC to assess signal plans as needed to improve operations during special events. Work also includes uncovering signal operation deficiencies such as time clock drifts, pedestrian timing issues, wiring issues, and detection anomalies, and field verification of upgraded timings.

Firm employed by	ARCADIS			Meet MPR No. 5
Name	E. Paul Hsu, PE	Years of relevant experience with this employer		5
Title	Senior ITS Design Engineer	Years of relevant experience with other employer(s)		13
Degree(s) / Years / Specialization		BS / 2002 / Electrical & Computer Engineering, Louisiana State University		
Active registration number / state / expiration date		PE.35983 / LA / Exp. 03/2023		
Year registered	2011	Discipline	Electrical Engineering	
Contract role(s) / brief description of responsibilities.		ITS Services (ITS Design/Electrical, ITS Systems Engineering)		

Experience dates	Experience and qualifications relevant to the proposed contract
	Mr. Hsu's comprehensive ITS experience comes from years of working in both the public and the private sector. He has managed and led ITS design teams for a variety of ITS projects by LADOTD, ALDOT, MDOT, TxDOT, FDOT, and GDOT. His areas of expertise in ITS include design and analysis of field devices, communication systems, video systems, electrical systems, traffic management centers, CAV, as well as performing systems engineering analysis (SEA) for over 15 complex ITS projects. He has a wealth of design experience in developing plans, specifications, special provisions, construction estimates, project schedules, traffic management plans, FAA evaluations, and LADOTD Constructability/Biddability reviews. In addition, his experience also includes providing construction support services such as reviewing shop drawings, as-built drawings, and request for information (RFIs). Other certifications include: ATSSA TCS, TCT, Flagger.
06/18 – 10/19	**I-10 Queue Warning Systems Engineering Analysis (SEA), LADOTD, Baton Rouge, LA.** *Project Manager*. Led a comprehensive team of ITS, Traffic, Data, and Safety engineers specialized in their respective areas to complete a highly complex and first of its kind ITS Systems Engineering Analysis involving the evaluation of a Queue Warning system for a frequently congested corridor on I-10 eastbound from LA-77 to I-110. The analysis developed short, medium, and long-term options to provide a comprehensive approach in enhancing the traveler's safety within the project area. In addition to developing the operational concept, physical architectures, and alternative analysis configuration, the Arcadis team also provided preliminary 30% design plans that included Queue warning design alternative analysis, communication system integration, electrical system design recommendations, opinions of probable costs, and design drawings.
04/19 – 02/20	**Video Distribution Management System Replacement SEA, LADOTD, Statewide, LA.** *Project Manager.* Utilized the Systems Engineering Analysis process to evaluate various replacement options for the current Video Distribution Management System (VDMS) in order to provide necessary system upgrades. Five different products and three different hosting solutions were evaluated to gain insight on available technology. Led the Arcadis team to develop a list of needs and system requirements that was used to compare the different products across several categories in detail. The selected concept consisted of a hybrid-hosted system which combined the benefits from the local and cloud-hosted solutions and represented the most value for LADOTD.
10/17 – Ongoing	**Wekiva Parkway Section 6 ITS Design Build Florida Department of Transportation, Lake and Seminole County / 238275-7-52-01.** *ITS & Electrical Design Engineer.* This design-build project involves the design, construction, installation, and integration of a new ITS deployment and electrical power distribution system within the FDOT right of way to power the proposed ITS field devices within the project. A short circuit and protection coordination study was conducted for the designed power system and a power system design report was subsequently developed and submitted to FDOT. The design of electrical power system include disconnects, transformers, power meters, UPS, power distribution units, conduits, conductors and cables, pull boxes, surge protection devices, grounding systems, and lightning protection system. Paul performed electrical analysis for the implementation of each ITS devices and designing the system to ensure that every field site meets the electrical code while providing sufficient capacity for current and future demands. Other tasks of the project also include conducting voltage drop calculations, coordinating with multiple electrical utility companies, developing PS&E.

12/13 – 02/16	**ITS Design and Specs IDIQ, MDOT, Statewide, Mississippi - P.N.104651101000.** *Lead project Engineer.* Managed MDOT design plan development of ITS projects including Desoto County ITS (CMAQ 2013), Jackson County ITS, and Lakeland Drive ITS deployments. Paul also assisted with the development of various Systems Engineering Analyses as requested by MDOT for ITS projects including Desoto County ITS (CMAQ 2013), Jackson County ITS, Hattiesburg ITS, Gluckstadt ITS, I-55 Widening ITS, and the SR 601 Incident Management ITS Deployments. The ITS design services included evaluation and recommendations for ITS field device designs, conceptual design and cost estimates, QA/QC, preparation of notice-to-bidder and special provision documents for other ITS designs, CE&I, submittal review, and design management. The MDOT ITS design manual and technical specifications were prepared as part of this task.
07/13 – 09/13	**Lake Charles Phase 2 SEA, LADOTD, Lake Charles, LA / H.010192.1.** *Lead Project Engineer.* Developed a SE analysis (SEA) document for the Lake Charles phase 2 ITS project in compliance with the FHWA Final Rule (23 CFR Part 940.11) for project implementation. This project defined the high-level requirements and concept of operations for a new RTMC located in the Lake Charles region. The SEA included the following: operational concept, physical architecture, functional requirements, user needs/requirements, alternative analysis configuration, standards, and updated Turbo Architecture file.
06/17 – 10/18	**Fort Worth ITS Master Implementation Plan – TXDOT, Fort Worth, Texas / CSJ 0902-00-198.** *Lead Project Engineer.* The plan included identifying the top 10 arterial and freeway segments in need of ITS connectivity, identifying pilot corridors for ITS deployments focusing on connected freight needs, and conducting a connected vehicle (CV) readiness review. The project team evaluated existing ITS infrastructure and determined the future technology requirements to create a five-year implementation plan for development and maintenance of ITS and communications. The plan incorporated various methodologies in conformance with the latest national/regional ITS architecture.
08/15 – 02/16	**I-10 Twin Span ITS, LADOTD, Orleans and St. Tammany Parishes, LA.** *Project Manager.* Designed an electrical system to power the new and proposed ITS field devices within the project limits. Upgraded the existing electrical and communication systems to accommodate and meet the new ITS deployment's requirements. A single-phase electrical distribution system was designed. Major responsibilities included performing the electrical analysis for each ITS device and designing the system to ensure that field site meets the electrical code while providing sufficient capacity for current and future demand. Other tasks of the project also include conducting the overall communication system design, developing a level 2 Traffic Management Plan (TMP), preparing quantities and cost estimates, as well as preparing plans and specifications.
05/12 – 06/13	**Monroe Phase 1 ITS Design, LADOTD, Monroe, LA / H.006576.** *Lead Project Engineer.* This ITS project involved working with a wide range of communication configurations as well as a variety of ITS devices because an existing deployment was required to be integrated into an upgraded system as requested by LADOTD. A mixture of different types of communication system had to be deployed because of limited resources as well as budget constraints. One of Paul's major responsibilities on this project included performing the electrical analysis for the implementation of each ITS devices and designing the system to ensure that each and every location meets the electrical code while providing sufficient capacity for current and future demand. Other tasks also include conducting overall communication system design, preparing quantities and cost estimates, as well as preparing plans and specifications.
06/13 – 12/13	**Sunshine Bridge ITS Design, LADOTD, St. James Parish, LA / H.010138.** *Lead Project Engineer.* This ITS project involves working with a wide range of communication configurations as well as designing a bridge conduit system that can accommodate the fiber optic communications to reach ITS devices across the Sunshine Bridge on LA 70. In addition to the challenges of selecting suitable conduit system for the bridge application, a mixture of different types of communication system had to be deployed because of limited resources as well as budget constraints.

Firm employed by	ARCADIS		
Name	Nick Dwyer, CPESC	Years of relevant experience with this employer	21
Title	Senior Construction Manager	Years of relevant experience with other employer(s)	1
Degree(s) / Years / Specialization		AAS / 2002 /Civil Engineering, Chattanooga State Technical Community College	
Active registration number / state / expiration date		N/A	
Year registered	N/A	Discipline	N/A
Contract role(s) / brief description of responsibilities.		CE&I Services (Testing/QA)	

Experience dates	Experience and qualifications relevant to the proposed contract
	Mr. Dwyer has been the CE&I Project Manager at Arcadis since 2014 and has 21 years of experience as a CE&I and EPSC inspector on TDOT projects. He has been a Senior CE&I Inspector on several Region 2 roadway, bridge and paving projects and has been the EPSC inspector on nine different TDOT projects. Nick has served as the project manager on several CE&I and EPSC projects including final records review, GDOT SR-299/I-24 slide bridge, TDOT Local Programs Ooltewah-Georgetown Road Roundabout project and TDOT SR 60 bridge repair in Meigs/Rhea Counties.
06/19 – Ongoing	**CE&I On-Call, TDOT, Region 1, Various Locations, TN.** *Project Manager* for the ongoing TDOT Region 1 CE&I On-Call Contract. Responsibilities include oversight for over ten work orders that include the following scope items: EPSC inspections, slope repairs, retaining wall construction, CPM schedule reviews, bridge repair, cross-hole sonic logging (CSL) testing, and survey. Regularly coordinates with Regional TDOT staff to verify proper documentation, performance, and overall project status.
10/16 – 10/17	**CE&I Services for GDOT Office of Innovative Delivery (OID), SR-299 ABC Slide Bridge over I-24, Dade County, GA.** *Project Manager* for CE&I services for bridge replacement of SR 299 over I-24 in Dade County, GA. The bridge replacement was performed using ABC (Accelerated Bridge Construction) methods. Nick oversaw CE&I inspections, coordinated project records, assisted with monthly estimates, attended bi-monthly progress meetings, Site Manager entries for daily work reports and pay quantities, and assisted with structural inspections.
07/17 – 08/18	**CE&I Services for TDOT Local Programs, Ooltewah-Georgetown Road Roundabout, Hamilton County, TN.** *Project Manager* for CE&I services on the TDOT Local Programs project converting a four-way intersection to a roundabout in Hamilton County, TN. He conducted pre-construction and progress meetings, provided monthly estimates for contractor payment, oversaw CE&I inspection and Materials and Testing services, performed bi-weekly EPSC inspections, coordination of change orders, RFI's and project record keeping.
06/16 – 04/18	**Construction Final Records QA/QC Review, TDOT, Region 2, Various Locations, TN.** *Project Manager* responsible for providing QA/QC reviews of final records for a variety of TDOT construction projects including bridge replacements, paving and roadway widening in Region 2. Performed a thorough review of project records including material certifications, paid quantities, proper documentation, DBE information, payroll, etc.; communicating any deficiencies to TDOT personnel so records can be corrected and brought up to Federal standards and specifications. Review of other Arcadis staff members to assure accuracy. Embedded at TDOT Region 2 Final Records Office for over one year.

Firm employed by	ARCADIS		
Name	Eric Schatz, PE, PSP, LEED AP	Years of relevant experience with this employer	12
Title	Sr Scheduler	Years of relevant experience with other employer(s)	8
Degree(s) / Years / Specialization		MS / 2003 / Engineering Management; BS / 2002 / Mechanical Engineering	
Active registration number / state / expiration date		Professional Engineer, PEN.0028214 / CT / 2023; Professional Engineer, 0380869 / NY / 2022; Planning and Scheduling Professional, 02017 / AACE International / 2022	
Year registered	2012	Discipline	Mechanical Engineering; Planning and Scheduling
Contract role(s) / brief description of responsibilities.		Value Added Services (Schedule Review and Tracking)	

Experience dates	Experience and qualifications relevant to the proposed contract
	Eric Schatz has 18 years of experience within the construction industry in the roles of Claims Analyst, Risk Manager, Construction Manager, Scheduler, Estimator and Surety Consultant. He has worked on projects and programs with construction values exceeding $500M, including transportation, municipal, educational, commercial, residential, wastewater and industrial facilities. He is a Professional Engineer, a LEED Accredited Professional, and was named as one of ENR New England's Top 20 under 40 construction professionals. He has extensive experience evaluating delays, loss of productivity, damages calculations, change orders, and deficient work. His diverse background includes delay analysis, Critical Path Method (CPM) scheduling, cost estimating, risk assessments, forensic audits, condition assessments, and con-tract and budget administration. This experience affords him with a strong foundation of project controls and construction management expertise. He has prepared expert reports, participated in mediations, and testified in deposition, arbitration, and at trial.
03/11 – Ongoing	**Tennessee Department of Transportation (TDOT), Claims Services, Statewide, TN**. Since 2006, Tennessee's Office of the Attorney General and TDOT have retained Arcadis to analyze and assist in the resolution of delay, extra work, and termination claims on over ten significant projects. Provided claim and risk services on projects including: • Briley Parkway. *Senior Claims/Scheduling Analyst.* Provided expert claims analysis and forensic schedule review services regarding a dispute on a $47M road and bridge project on the Briley Parkway in Nashville. The contractor submitted a $4M delay claim and a 237-day time extension request to TDOT. The claim alleged that the delays were caused by 30 different issues including changes to retaining walls, changes to noise walls, field conflicts and differing site conditions. • I-440 Widening and Improvement Design-Build Project. *Risk Manager.* This design-build project consists of 7.8 miles of roadway widening and replacement, going from two lanes of concrete pavement in each direction to three lanes of asphalt pavement in each direction, with associated repair and reconstruction of ramps and bridges at several locations. Arcadis provided conceptual design services for TDOT for this budgeted $120M project. While assisting TDOT with the design-build procurement, one of the bidders proposed shutting down the entire highway for eight months, in order to save one year of duration on the project, as compared to traditional lane closures. Evaluated the cost, schedule and community impacts of this possibility, facilitated a risk workshop and prepared a risk register that evaluated and prioritized risks based on these potential impacts.
03/12 – Ongoing	**Connecticut Department of Transportation (ConnDOT), Claims Services IDIQ, Statewide, CT**. Arcadis has held an IDIQ contract for claims consulting services with ConnDOT continuously since 1991, and in the 29 years of service, has worked on more than 100 assignments involving claims ranging from less than $500K to over $100M on projects of similar value. Provided claims analysis services on many projects including the following:

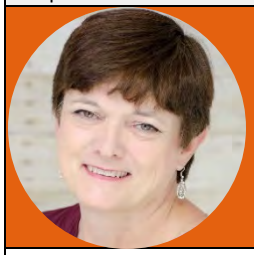
	• Route 1 Bridgeport. *Senior Claims/Scheduling Analyst.* This $4M project involved the widening of Route 1 in Bridgeport, Connecticut, including the addition of a turning lane, traffic signal upgrades and sidewalk modifications. The contractor submitted a time extension request and $1M delay claim, mostly for idle equipment and home office overhead. Performed a delay analysis and identified whether a time extension was justified or if liquidated damages were applicable. Demonstrated analysis at the negotiation meeting with the contractor that the idle equipment and home office overhead claims were unsubstantiated, allowing settlement on favorable terms. • Traffic Signal Improvements Project 92-564. *Testifying Expert*. ConnDOT upgraded or replaced traffic control signals, fiber optic controls and related work at 14 intersections in New Haven, Connecticut. The project's completion was delayed by 18 months, and then remained incomplete due to a standstill regarding non-conforming installation of the fiber optic cable. Analyzed the contractor's time extension request and $2M claim for delay damages and lost productivity. Arcadis also provided traffic signal design expertise related to counterclaim for non-conforming work. Prepared expert report. Supported the Attorney General's office in preparing for and conducting the arbitration hearings, including testifying as expert witness on claims analysis and scheduling.
11/11 – 03/12	Massachusetts Department of Transportation (MassDOT), Route 128 (I-93) / I-95 Add-a-lane, Dedham, MA. *Senior Claims/Scheduling Analyst*. This $99M project involved the full depth widening of a five mile stretch of interstate highway from six to eight lanes, outside of Boston, Massachusetts. During construction MassDOT incorporated additional work, including a significant retaining wall system and the construction of additional entrance and deceleration lanes at a major interchange. The contractor submitted a time extension request for an additional two years. Analyzed the completion schedule, identified non-excusable contractor caused delays, and assisted MassDOT in negotiating an appropriate project extension.
08/11 – 06/13	Massachusetts Department of Transportation (MassDOT), Bridge Rehabilitation of Route 128 over the Annisquam River, Gloucester, MA. *Senior Claims/Scheduling Analyst*. Following a statewide assessment of bridge conditions, MassDOT determined that the bridge carrying Route 128 over the Annisquam River required substantial rehabilitation of the deck and sidewalk superstructure, as well as the steel and concrete pier substructure. During the $30M rehabilitation of the bridge, the contractor fell behind schedule, in large part due to poor subcontractor performance, eventually leading to the termination of its painting subcontractor. Complicating the factual scenario, the bridge substructure required significantly more structural steel repairs than originally anticipated. Analyzed the project schedules to separate non-excusable contractor caused delays from excusable delays, and assisted MassDOT in determining an appropriate time extension.
03/15 – 06/18	Massachusetts Bay Transportation Authority (MBTA), Red Line and Orange Line Infrastructure Improvements Program, Dorchester, MA. *Risk Manager*. MBTA undertook a $1.4B improvement program for the red and orange subway lines to increase the capacity and reliability of the existing alignments, as well as add new and more modern light rail cars to replace the existing fleet. The program scope includes track work, signal upgrades, and new car maintenance facilities. Prepared a risk management plan and worked with the various disciplines in mini-workshop settings to identify and assess potential project risks so process they could be mitigated.

Firm employed by	ARCADIS		
Name	Roy Cooper, PE	Years of relevant experience with this employer	24
Title	Claims Avoidance/Contract Administration	Years of relevant experience with other employer(s)	8
Degree(s) / Years / Specialization		MBA / 1999 / Business Administration, University of Connecticut BS / 1988 / Civil Engineering, Michigan Technological University	
Active registration number / state / expiration date		PE.0044531 / LA / Exp.09/30/2022	
Year registered	2020	Discipline	Civil Engineering
Contract role(s) / brief description of responsibilities.		Value Added Services (Claims Avoidance / Contract Administration)	

Experience dates	Experience and qualifications relevant to the proposed contract
	Mr. Cooper is a Senior Vice President and Leader of Arcadis' Contract Solutions group in North America where he is responsible for all of Arcadis' claims related service offerings including providing expert testimony, claims analysis, schedule review services, constructability reviews, cost estimating, and quantitative risk assessment. He is a Professional Engineer registered in Connecticut, Florida, Louisiana, Maryland, New Jersey, New York, Rhode Island and Texas. Roy has more than 33 years of construction experience, including the analysis and review of complex construction claims from the beginning stages through trial support and expert testimony. Mr. Cooper excels in the role of trusted advisor, bringing clarity to complex technical and financial issues. He has led large-scale claims evaluation assignments of almost every type, including the evaluation of schedule impacts, cost impact analysis, mediation, and claims negotiation, and has been qualified as an expert on both horizontal and vertical type projects. Roy is also an accomplished public speaker and is often invited to speak at seminars on construction claims and managing projects more effectively.
10/06 – 01/07	**Shreveport Convention Center, Long Law Firm, Shreveport, LA.** *Project Executive / Testifying Expert.* Provided claims and schedule analysis for the architects of a $67 million convention center in Shreveport, Louisiana. Provided an analysis of the contract provisions, project delays and their causes. Analyzed the contractor's claims that it accelerated. Assessed for accuracy the damages section of the contractor's claim. The contractor submitted delay and acceleration claims totaling $1.4 million.
12/18 – 12/19	**CPM Scheduling Training, I-440 Widening and Improvement Design-Build Project, Tennessee Department of Transportation (TDOT), Davidson County, TN.** Provided claims avoidance and risk management consulting to the design review team and senior leadership at TDOT on this major project in Nashville. Regularly consulted with team and TDOT as project issues arose. Provided CPM training to TDOT personnel as part of this project.
12/19 – 07/20	**Claiborne Pell Bridge, Rhode Island - Turnpike and Bridge Authority, Providence, RI.** *Project Executive / Testifying Expert.* Provided schedule, damage and claims analysis to the RITBA. The $39 million project consisted of steel repairs and painting of this suspension bridge. The painting contractor filed a $8 million claim alleging that it was delayed and had to accelerate the work because of excessive steel repairs. The case settled during mediation.
01/08 – 07/10	**I-65 Davidson County, State of Tennessee, Nashville, TN.** *Testifying Expert*. Provided expert services to the Tennessee Office of the attorney general regarding a dispute on a $57 million road and bridge project in Davidson County, Tennessee. Assessed the issues and delays on the project along with the contractor's alleged damages. Provided expert testimony at trial. The contractor made a $2.5 million delay claim and a 1,379-day time extension request. The contractor claimed issues related to right of ways, utility relocations, quantity overruns and differing site conditions. Dates: January 2008 – July 2010

04/13 – 02/18	State University of New York (SUNY), Plattsburgh Facility Enhancement for the School of Business, Jersen Construction Company, Plattsburgh, NY. *Project Executive / Testifying Expert*. Evaluated the contractor's planned and actual sequence of construction, assessed its actual productivity losses and damages incurred. The law firm of Couch White contacted Arcadis regarding a dispute on the Jersen Construction $900K masonry contract on the construction of a new building for the school of business at the State University of New York at Plattsburgh. The contractor Jersen made a $2.1 million claim against the general contractor Pike. The claim alleged that Pike failed to construct the building in a timely and quality manner. Jersen was then forced to work disrupted and in uncontemplated extreme winter conditions.
06/12 – 11/12	I-40 SmartWay – Intelligent Transportation System, Tennessee Department of Transportation, Nashville, TN. *Project Executive / Testifying Expert* to the Tennessee Office of the Attorney General regarding a dispute on the $32 million installation of a smart highway system on I-40 in Memphis. Assessed the issues and delays on the project along with the contractor's alleged damages and the applicability of the use of the Eichleay formula. Presented in mediation where the dispute was resolved. The contractor made a $2.5 million home office overhead delay claim and a 183-day time extension request. The contractor claimed that the Tennessee Department of Transportation failed to grant a time extension and it was put on suspension as issues with the design and equipment availability for the smartway were resolved.

Firm employed by	ARCADIS		
Name	Teresa Booker	Years of relevant experience with this employer	5
Title	Health & Safety Manager	Years of relevant experience with other employer(s)	30
Degree(s) / Years / Specialization		BS / 1993 / Business Administration, Mercer University AA / 1983 / Business Administration, Gordon College	
Active registration number / state / expiration date		N/A	
Year registered	N/A	Discipline	N/A
Contract role(s) / brief description of responsibilities.		Health & Safety	

Experience dates	Experience and qualifications relevant to the proposed contract
	Ms. Booker serves as Health & Safety (H&S) Coordinator of Arcadis' Louisiana, Georgia, and Tennessee Infrastructure operations. She supports the AFS and provides general daily oversight, monitoring, and training of the H&S Program. She is responsible for training, compliance and the development of awareness related to our H&S culture. Certifications include OSHA 10 hour and 30 hour; CPR/First Aid/AED/BBP.
02/22 – Ongoing	**Arcadis H&S Coordinator, Arcadis, LA, GA, TN, and North FL.** Responsible for a variety of H&S related assignments in support of Arcadis projects throughout LA, GA and TN. Proficient in utilizing Arcadis' H&S management 4-Sight tool. Responsibilities include: • Oversight of H&S Program during performance of field activities in accordance with OSHA, the client, and Arcadis policies and procedures. • Prepare or review of H&S plans and other documentation. • Participate in or lead daily H&S or tailgate safety meetings. • Works closely with resource managers and new hires in training and education of the Arcadis H&S Program. • Observes employees and tasks being performed to identify questionable behavior. Works with staff and teams to develop appropriate solutions (job safety analysis) to correct behavior and mitigate hazards • Coordinates with Arcadis' Corporate H&S Director as needed. • Support client H&S Programs and conduct audits and compliance assessments. • Communicates with field teams, field supervisors, resource managers, project managers, and subcontractors on H&S culture, needs, and assessments. • Assists in coordinating First Aid, CPR, AED, and other H&S training. • Assists resource managers and staff in identifying required personnel protective equipment (PPE) and procure the PPE.
03/13 – 01/17	**GDOT District Safety Officer, GDOT, Thomaston, GA.** Duties included oversight of H&S program for employees in a GDOT field district. Conducted training classes. Visited field work pro-jects. Work with district management to develop strategies to communicate H&S information. Prepared H&S reports.

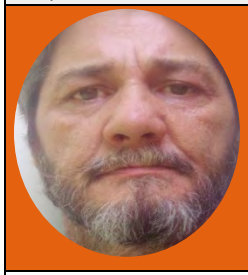
02/99 – 03/03	**GDOT District Training Officer, GDOT, Thomaston, GA.** Assessed training needs of district employees and developed/coordinated scheduling of needed classes. Served as instructor for classes. Developed and reviewed training materials to address employee needs. Coordinated and conducted testing of employees participating in employee development programs. Worked with internal offices and external providers to provide employee training. Maintained employee training records and completed reports.
10/86 – 01 /94	**GDOT Sr. Administrative Assistant, GDOT, Thomaston, GA.** Worked in two area offices and right-of-way office performing general administrative duties. Greeted and assisted DOT customers. Completed monthly reports. During a 9-month period, worked as Maintenance Worker on a Routine Maintenance Crew performing general highway maintenance duties including mowing, driving dump truck, flagging traffic, and shoulder clean-up.

Firm employed by	APS Engineering and Testing		
Name	Sergio Aviles, PE	Years of relevant experience with this employer	10
Title	Principal Geotech Engineer	Years of relevant experience with other employer(s)	10
Degree(s) / Years / Specialization		BS / 2001 / Civil Engineering - Geotechnical	
Active registration number / state / expiration date		0033571/ LA / Exp 03/2024	
Year registered	2007	Discipline	Civil Engineering
Contract role(s) / brief description of responsibilities.		CEI Services (Testing/QA., Construction Inspection & Testing of Structural Components)	

Experience dates	Experience and qualifications relevant to the proposed contract
	Mr. Aviles has more than 10 years' experience in the geotechnical and civil engineering field. Mr. Aviles also has project experience throughout Louisiana with the Pavement & Geotechnical Section of the Louisiana Department of Transportation and Development (LADOTD where his duties included pile foundation design and construction inspection of piles, slope stability design, embankment settlement calculations, design and construction inspection of drilled shafts, MSE wall design, sheet pile design, and testing services that incorporated, PDA, WEAP, and CAPWAP analysis of piles. Prior to signing on with the Pavement & Geotechnical Section of LADOTD, he participated in the LADOTD Rotational Engineer Intern program developed by the Louisiana Transportation Research Center (LTRC). During the program, he learned most of the duties and responsibilities of LADOTD main design and construction sections (Bridge Design, Road Design, Hydraulic Design, Head Quarter construction, and district construction). Mr. Aviles is skilled in levee design, T-wall design, deep soil mixing design and technical site visits.
05/18 – 12/20	**I-10 Highland to LA 73, LA.** *QA/QC Field Testing.* The purpose was to conduct testing on the subsurface, base and concrete placement at the site to enable an evaluation of an acceptable standards for the proposed roadway structures.
01/19 – Ongoing	**FEMA-1B-1, Westend Group, LA.** *QA/QC Field Testing.* The purpose was to conducted testing on the subsurface, base and concrete placement at the site to enable an evaluation of an acceptable standards for the proposed roadway structures.
04/19 – Ongoing	**Westwood Drive, WB Expressway to Lapalco, LA.** *QA/QC Field Testing.* The purpose was to conduct testing on the subsurface, base and concrete placement at the site to enable an evaluation of an acceptable standards for the proposed roadway structures.
05/19 – Ongoing	**Phase 1 Airline Park Blvd, Camphor-West Napoleon, LA.** *QA/QC Field Testing.* The purpose was to conduct testing on the subsurface, base and concrete placement at the site to enable an evaluation of an acceptable standards for the proposed roadway structures.
04/18 – 11/18	**Airline Park Blvd, Camphor-West Napoleon, LA.** *QA/QC Field Testing.* The purpose was to conduct testing on the subsurface, base and concrete placement at the site to enable an evaluation of an acceptable standards for the proposed roadway structures.
07/14 – 08/14	**US 90 Elevated Portion for the Future I-49 Corridor.** *Project Manager.* Responsible for Geotechnical investigations and analysis as assigned for roads and bridges design. APS performed all the preliminary drilling, testing, and CPT for US 90 and High-way 318 Intersection. A total of 46 boring and 11 CPT along with all the testing required by LADOTD. to the Geotechnical investigations and analysis as assigned for roads and bridges design.
09/19 – Ongoing	**Rural Bridge Replacement Initiative, LADOTD, Nine (9) State Projects and 24 structures in Districts 04, 05, 08 and 58.** *Project Manager.* A P S was a Geotechnical Subconsultant through prime consultant T. Baker smith. Tasked A P S with drilling and the sampling of 52 borings to 120

	feet deep. Laboratory tests, Atterberg limits, unconsolidated drained, triaxial test, moisture content, along with the engineering design of the substructure. Project Manager to the Geotechnical Investigations.
09/19 – 06/20	I-10 Widening LA 415 to Essen LN, LADOTD, Baton Rouge, LA. *Project Manager.* Tasked APS thru Department of Transportation and Development (DOTD) geotechnical retainer to drill and sample a total of 52 deep borings starting at the Washing-ton Exit and ending at the LSU lakes. Along with this drilling and sampling APS also tested for strength and engineering characteristics of the soils with. A total of eight over the water borings and 44 land borings with approximate 1000 Triaxial Compression, Unconsolidated Drained or Undrained (UU) and Atterberg Limits. Project Manager to the Geotechnical Investigations.
12/19 – 03/20	US 90 Railroad Overpass SE of LA 85, LADOTD, New Iberia LA. *Project Manager.* Selected APS with the winning team for the Geotechnical Investigation and Design for the proposed new overpass. A total of six deep borings were drilled and tested for Geotechnical recommendation. Project Manager for the project design team.
03/19 – 05/19	US 190 over Bogue Falaya River, LADOTD, Covington, LA. *Project Manager.* Selected APS with the winning team for the Geotechnical Investigation and Design of the proposed new bridge. A total of 19 deep borings were drilled and tested for the foundation recommendation. Project Manager for the project design team.

Firm employed by	APS Engineering and Testing		
Name	Paul Fulcher	Years of relevant experience with this employer	2
Title	Senior Technician	Years of relevant experience with other employer(s)	8
Degree(s) / Years / Specialization		Density Testing Embankment and Base Course (C 0303B) Nuclear Gauge Safety Certification ACI Certified	
Active registration number / state / expiration date		N/A	
Year registered	N/A	Discipline	N/A
Contract role(s) / brief description of responsibilities.		CEI Services (Construction Inspection & Testing of Structural Components)	

Experience dates	Experience and qualifications relevant to the proposed contract
	Mr. Fulcher is a Senior CE&I Technician with more than 10 years' experience in roadway, waterline, sewer, and drain line installation inspection. His responsibilities include reviewing and approving all contract invoices; prepares daily work reports and track construction schedules. Also, observing and documenting subsurface, base and concrete placement as per LADOTD standards and guidelines.
05/18 – 12/20	**I-10 Highland to LA 73, LA.** *Field Technician.* The purpose was to conduct testing on the subsurface, base and concrete placement at the site to enable an evaluation of an acceptable standards for the proposed roadway structures.
01/19 – Ongoing	**FEMA-1B-1, Westend Group, LA.** *Field Technician.* The purpose was to conducted testing on the subsurface, base and concrete placement at the site to enable an evaluation of an acceptable standards for the proposed roadway structures.
04/19 – Ongoing	**Westwood Drive, WB Expressway to Lapalco, LA.** *Field Technician.* The purpose was to conduct testing on the subsurface, base and concrete placement at the site to enable an evaluation of an acceptable standards for the proposed roadway structures.
05/19 – Ongoing	**Phase 1 Airline Park Blvd, Camphor-West Napoleon, LA.** *Field Technician.* The purpose was to conduct testing on the subsurface, base and concrete placement at the site to enable an evaluation of an acceptable standards for the proposed roadway structures.
04/18 – 11/18	**Airline Park Blvd, Camphor-West Napoleon, LA.** *Field Technician.* The purpose was to conduct testing on the subsurface, base and concrete placement at the site to enable an evaluation of an acceptable standards for the proposed roadway structures.

17. Firm Experience:

Firm name	ARCADIS	Past Performance Evaluation Discipline(s)*	ITS, CE&I/OV
Project name	CE&I for I-10, US 61 to Laplace ITS Deployment	Firm responsibility (prime or sub?)	Prime
Project number	H.013710	Owner's name	Louisiana Department of Transportation and Development (LADOTD)
Project location	I-10, Ascension, St. James & St. John the Baptist Parishes	Owner's Project Manager	Alaa Shams, PE
Owner's address, phone, email	1212 East Hwy Dr. Baton Rouge, LA 70802 / 225 379 1497 /alaa.shams@la.gov		
Services commenced by this firm (mm/yy)	08/21	Total consultant contract cost ($1,000's)	$587
Services completed by this firm (mm/yy)	Ongoing	Cost of consultant services provided by this firm ($1,000's)	$587

Describe the project including the firm's role and members involved. (Highlight members to be used in this proposal.)

Firm Members Involved: Tony Moore, Tony Jackson, Cody Lemoine, Justin Gaspard, Jeff Jones Akhil Chauhan

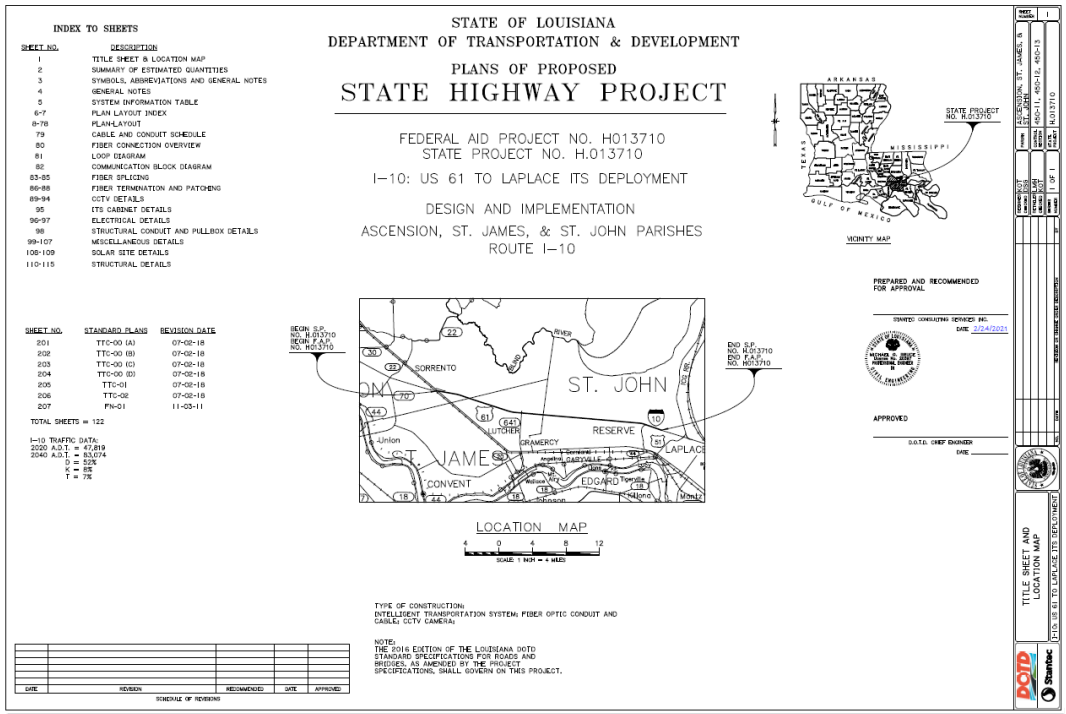
Arcadis is providing ITS CEI services for the I-10 US 61 to Laplace ITS Deployment project in Ascension, St. James, and St. john the Baptist parishes. This project consists of the installation of approximately 120,000 feet of fiber optic cable and conduit, the installation of ten Closed Circuit Television, (CCTV), cameras on seven poles to be connected onto the state communications network. Four of the CCTV cameras will be installed and powered using solar power. The project has a construction cost of $3.99 million.

Our qualified and certified inspectors are providing field inspection and investigation services including the conduit and fiber optic cable installation that crosses numerous canals and existing utilities, the fiber optic cable splicing process at multiple locations to tie all the fiber optic cable together onto the DOTD communication network. The project includes installing conduit and fiber optic cable on a 3.6 mile bridge.

Anthony, (Tony) Jackson, senior technician/senior inspector, is performing the daily inspections for the I-10 US 61 to Laplace ITS Deployment project with support from Cody Lemoine and Justin Gaspard. Tony has over 20 years of experience on traffic signal and ITS projects. He maintains certifications on traffic signal construction and inspection, LADOTD Structural Concrete Inspection certification, as well as other national safety certifications. Anthony, (Tony) Moore, P.E., Arcadis Senior Transportation Engineer, serves as the project engineer. Tony has worked on multiple construction projects in the past several years including multiple ITS project for LADOTD. Tony is directing the monthly progress meetings, overseeing, and assisting in field inspections, coordinating work performed with the contractor and managing all project records on behalf of LADOTD, monitoring and all SiteManager entries, and preparing monthly pay estimates in Site Manager.

Relevant Services

- Arcadis is reviewing and inspecting the installation of 4 solar sites to power CCTV cameras in remote locations on I-10.
- Arcadis inspectors are providing inspection of conduit, pull boxes, and fiber optic cable being installed on the underside of a 3.6 mile-long bridge



CE&I for I-10, US 61 to Laplace ITS Deployment Construction Plan Cover Sheet

Firm name	ARCADIS	Past Performance Evaluation Discipline(s)*	CE&I/OV and ITS
Project name	ITS CE&I for LADOTD US 190 ITS Deployment	Firm responsibility (prime or sub?)	Prime
Project number	H.011511	Owner's name	Louisiana Department of Transportation and Development (LADOTD)
Project location	W. Baton Rouge, Pointe Coupee, and St. Landry	Owner's Project Manager	Alaa Shams
Owner's address, phone, email	ITS Annex Bldg., Room 210-S, 1212 East Highway Drive, Baton Rouge, LA 70802 / 225 379 1497, alaa.shams@la.gov		
Services commenced by this firm (mm/yy)	02/19	Total consultant contract cost ($1,000's)	$603
Services completed by this firm (mm/yy)	10/21	Cost of consultant services provided by this firm ($1,000's)	$603

Describe the project including the firm's role and members involved. (Highlight members to be used in this proposal.)

Firm Members Involved: Tony Jackson, Tony Moore, Cody Lemoine, Jeff Jones, Akhil Chauhan

Arcadis provided ITS CE&I services for the US 190 ITS Deployment project in West Baton Rouge, Pointe Coupee, and St. Landry parishes. This project consisted of the installation of approximately 225,000 feet of fiber optic cable and conduit, the installation of two communication HUB buildings, and the interconnection of four signalized intersections onto the state communications network. The project had a construction cost of $2.3 million.

Our qualified and certified inspectors provided on-site daily field inspection and investigation services including oversight of the conduit and fiber optic cable installation that crossed numerous canals and existing utilities, the fiber optic cable splicing process at multiple locations to tie all the fiber optic cable together onto the DOTD communication network, the installation of HUB building concrete foundations, driveways, gas powered generator installations at HUB sites, driveways and fencing at the HUB sites, and the installation of fiber optic cable into four traffic signal cabinets. *Arcadis staff prepared daily, weekly, and monthly construction inspection reports and maintained all construction activities in field diary spreadsheets.* Arcadis performed all the construction contract administrative tasks including managing the pre-construction meeting, all monthly progress meetings, managed all change order requests and approvals, provided coordination of contractor submittals and Requests for Information, managed the Sampling Plan documentation, and prepared the final project files. Arcadis observed and documented the contractor's fiber optic cable testing during pre and post installation and observed and documented all device commission testing and system integration testing. The Arcadis inspector provided oversight and documented the structural concrete for the drilled shafts and reviewed and approved the concrete contractor's drill shaft logs and concrete placement logs.

"Arcadis did an excellent job managing the construction of the project. The Arcadis Project Engineer and inspectors were familiar with the area of work and easily navigated between multiple work locations, DOT facilities, and contractor facilities. Arcadis personnel were equipped with all the necessary Personal Protective Equipment (PPE) needed for the working conditions as required by the DOTD Safety Manual and made sure the contractor was also in compliance of the DOTD Safety Manual PPE requirements. Their understanding of LADOTD CE&I standards and technical specifications resulted in the efficient execution of this project. Arcadis was able to facilitate the reduction of work originally specified in the plans due to a design error that was not addressed prior to construction letting. The resulting reduction in work allowed DOTD to install an additional CCTV camera that was not originally included in the plans."

Alaa Shams – LADOTD US 190 ITS Deployment CE&I Project Manager

Firm name	ARCADIS	Past Performance Evaluation Discipline(s)*	CE&I/OV and ITS
Project name	ITS CE&I for Alexandria ITS Deployment Phase 3	Firm responsibility (prime or sub?)	Prime
Project number	H.011505	Owner's name	Louisiana Department of Transportation and Development (LADOTD)
Project location	Rapides Parish, LA	Owner's Project Manager	Alaa Shams
Owner's address, phone, email	ITS Annex Bldg., Room 210-S, 1212 East Highway Drive, Baton Rouge, LA 70802 / 225 379 1497, alaa.shams@la.gov		
Services commenced by this firm (mm/yy)	10/19	Total consultant contract cost ($1,000's)	$398
Services completed by this firm (mm/yy)	02/22	Cost of consultant services provided by this firm ($1,000's)	$375

Describe the project including the firm's role and members involved. (Highlight members to be used in this proposal.)

Firm Members Involved: Tony Jackson, Cody Lemoine, Tony Moore, Jeff Jones, Akhil Chauhan

Arcadis provided ITS CE&I services for the Alexandria ITS Deployment Phase 3 project in Rapides Parish. This project consisted of the installation of eleven Closed Circuit Television (CCTV) cameras, six poles and eight CCTV lowering devices, two Dynamic Message Signs (DMS) and two poles, 15,000 feet of fiber optic cable and conduit, and the connection of sixteen signalized intersection, one HUB building, one existing CCTV camera, and the LADOTD District office onto the LADOTD fiber optic communications network. The project had a construction cost of $1.9 million.

Our qualified and certified inspectors provided on-site daily field inspection and investigation services including oversight of the drilled shaft foundations for the new CCTV and DMS poles, erection of the CCTV and DMS poles, installation of the CCTV and DMS cabinets and associated hardware, conduit and fiber optic cable installation that crossed numerous existing utilities, and the fiber optic cable splicing process at multiple locations to tie all the new and existing components onto the DOTD communication network. Arcadis staff prepared daily, weekly, and monthly construction inspection reports and maintained all construction activities in field diary spreadsheets. Arcadis performed all the construction contract administrative tasks including managing the pre-construction meeting, all monthly progress meetings, managed all change order requests and approvals, provided coordination of contractor submittals and Requests for Information, managed the Sampling Plan documentation, and prepared the final project files. Arcadis observed and documented the contractor's fiber optic cable testing during pre and post installation and observed and documented all device commission testing and system integration testing. The Arcadis inspector provided oversight and documented the structural concrete for the drilled shafts and reviewed and approved the concrete contractor's drill shaft logs and concrete placement logs.

Relevant Services

- Arcadis inspectors oversaw the installation of all the drilled shaft foundations on the project, including one site that was drilled in unstable sub-surface soil that was ultimately abandoned and relocated.
- As part of the daily CEI services, Arcadis inspectors worked with the contractor daily to mitigate potential issues including the contractor boring into an underground gas line and expediting the gas company notification and ensuring the safety of all personnel in proximity to the gas line.
- Arcadis inspectors provided complete CEI oversight on all aspects of the project including identifying installation issues with the contractor, i.e. identifying a DMS installation oriented incorrectly, ITS cabinet installations incorrectly installed, and multiple temporary traffic control issues.

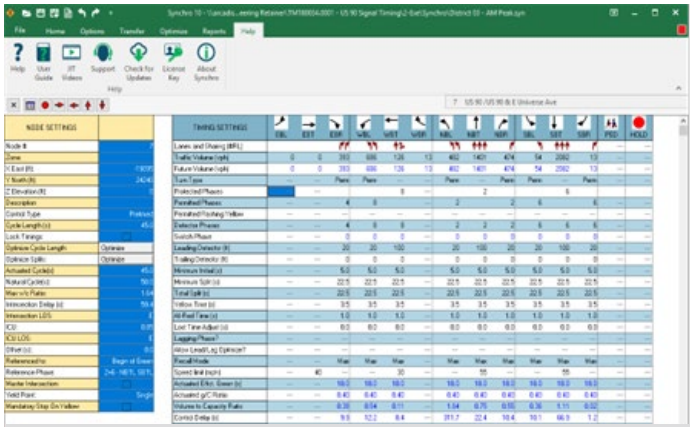
Firm name	ARCADIS	Past Performance Evaluation Discipline(s)*	ITS, CE&I/OV
Project name	CE&I for Adaptive Traffic Signal Design and Implementation	Firm responsibility (prime or sub?)	Sub
Project number	H.012018	Owner's name	Michael Baker International
Project location	Lafayette Parish	Owner's Project Manager	Mary Flynn, PE
Owner's address, phone, email	2600 Citiplace Drive, Suite 450, Baton Rouge, LA 70808, 850-570-8969, mary.flynn@mbakerintl.com		
Services commenced by this firm (mm/yy)	02/22	Total consultant contract cost ($1,000's)	$250
Services completed by this firm (mm/yy)	Ongoing	Cost of consultant services provided by this firm ($1,000's)	$50

Describe the project including the firm's role and members involved. (Highlight members to be used in this proposal.)

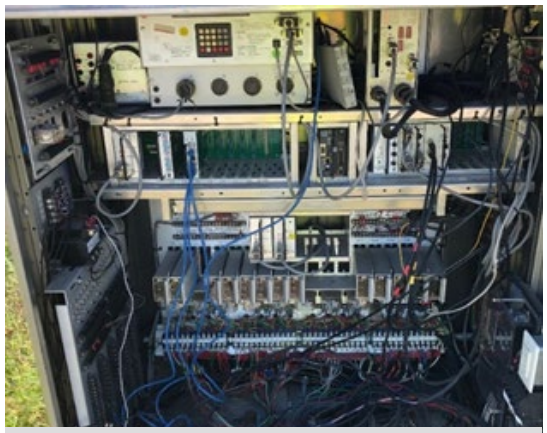
Firm Members Involved: Tony Moore, Tony Jackson

Adaptive traffic signal timing is intended to allow traffic signal equipment to automatically adjust signal timing based on the volume of vehicles traveling through the intersection. The signal timing automatically adjusts to increase or decrease green times to maximize the efficiency of the signal. Adaptive traffic signal systems require extensive communications between signalized intersections and a significant number of vehicle detectors to monitor traffic as it moves through a signalized corridor. The Adaptive Traffic Signal Design and Implementation project consists of the modification of 190 traffic signals in Lafayette Parish, Louisiana to allow the implementation of adaptive traffic signal timing. The modifications include installation of 190 new traffic signal controllers, approximately 1800 magnetometer vehicle detectors, and 190 traffic signal preemption devices.

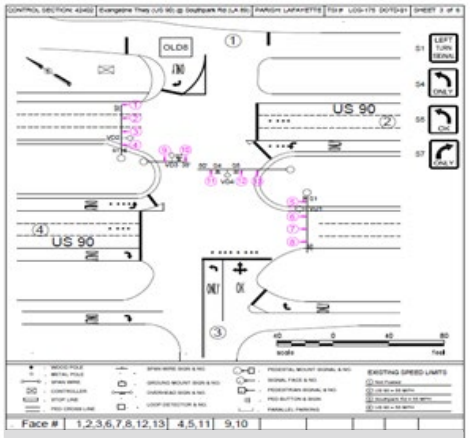
Arcadis is providing field inspection and investigation support to Michael Baker International (MBI), on the H.012018 Adaptive Traffic Signal Design and Implementation project. *MBI requested Arcadis' assistance with this project because of our extensive experience in ITS and traffic signal construction, inspection, and maintenance projects for LADOTD over the last 15 years.* Tony Moore, PE is serving as the Arcadis PM for this project providing traffic signal modification reviews and recommendations. Tony Jackson is providing onsite observation and inspection of the traffic signal detection installations to MBI at the request of local LADOTD construction personnel. Mr. Jackson has over 20 years of experience in traffic signal and ITS construction and inspection. LADOTD and MBI both requested an inspector with IMSA Traffic Signal Level II and Level III certifications to be onsite during installation of the magnetometers because they understand the importance of proper installation techniques for magnetometers. Magnetometers typically fail prematurely due to improper installation techniques so ensuring the contractor is using proper techniques as recommended by the manufacturer are critical to operation and life cycle. Mr. Jackson has the experience and expertise to verify the magnetometers are properly installed.



Preliminary Lafayette Signal Timing



Lafayette Signal Cabinet



Lafayette Intersection Diagram

Firm name	ARCADIS	Past Performance Evaluation Discipline(s)*	ITS, CE&I/OV
Project name	**ITS Maintenance, Engineering & Inspection**	Firm responsibility (prime or sub?)	Prime
Project number	44-2500/44-7102/44-16811	Owner's name	Louisiana Department of Transportation and Development (LADOTD)
Project location	Statewide, LA	Owner's Project Manager	Erik Smith, PE
Owner's address, phone, email	1212 East Hwy Dr. Baton Rouge, LA 70802 / 225 379 2520 /erik.smith@la.gov		
Services commenced by this firm (mm/yy)	02/22	Total consultant contract cost ($1,000's)	$3,000
Services completed by this firm (mm/yy)	Ongoing	Cost of consultant services provided by this firm ($1,000's)	$1,500

Describe the project including the firm's role and members involved. (Highlight members to be used in this proposal.)

Firm Members Involved: Jeff Jones, Paul Hsu, Tony Moore, Akhil Chauhan, Doug Tilt

Over the past decade, the LADOTD has deployed ITS communications and field devices throughout the state. As of May 2020, there are approximately 400 statewide ITS sites including more than 250 CCTV camera sites, 82 Dynamic Message Signs (DMS), 105 radar vehicle detectors (RVD), and 23 ramp meter sites. As part of this growth, ITS maintenance has become a high priority.

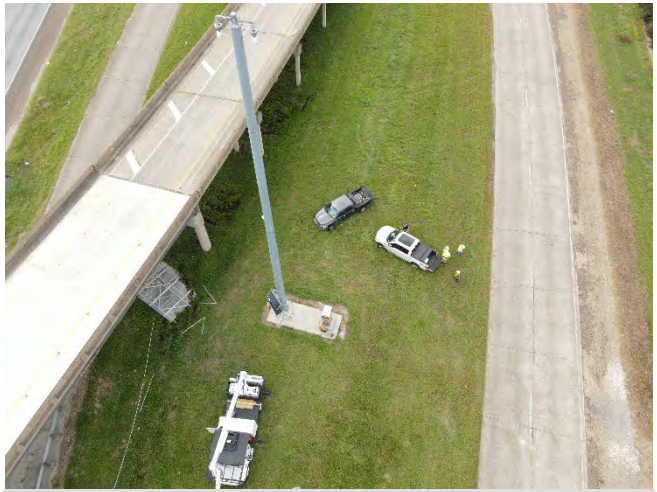
Arcadis was selected to establish their inaugural ITS Maintenance Program to systematically provide routine and responsive maintenance for the LADOTD ITS infrastructure. The Arcadis team has built the program where none existed before. Our ITS and project management experts worked with the LADOTD ITS staff, as a team, to develop a program that would fulfill the Department's goals and improve safety and optimal information dissemination to the traveling public. Arcadis was recently selected to continue these services through 2025. The program's goals include systematic implementation of routine maintenance; improved efficiency of responsive maintenance; comprehensive asset management of ITS devices; efficient mobilization of resources to manage maintenance activities, upkeep and/or replacement of obsolete assets; and tracking maintenance performance.

Arcadis meets these goals through the following programs:

- Program Management – management plan, quality control plan, progress schedule, resource planning, tracking, administration and reporting.
- Maintenance Plan – develop, implement, and manage ITS maintenance plan, policies, standards, procedures, and guidelines.
- ITS MMS Software – deployment planning, installation, configuration validation, data migration support, ongoing update to database, training, and annual MMS software support.
- Maintenance Tracking and Performance Measures Reporting System (PMRS) – interactive dashboard provides users with site reliability, number of sites covered under routine maintenance, number of tickets and work orders.
- Development of Traffic Control Plans and Determination of Safety Class – assign safety class for ITS sites and develop temporary traffic control plans.
- Scheduling, Planning, Tracking, and Performing Routine/Responsive Maintenance – use standard procedures developed in MMS to perform all routine maintenance activities, conduct maintenance tracking, provide maintenance coordination, provide complete logistics and planning, and implementing safety procedures for the maintenance staff and traveling public.
- Scheduling, Planning, Tracking, and Performing Work Order/Call Ticket Maintenance – perform work order maintenance as initiated by receipt of notification of malfunction or device failure. Perform dispatching function and allow management a high-level view of staff location, current work order, and estimated time of completion.
- Site Inspection, Validation, and Quality Control - *Provide QA/QC checks for maintenance activities and schedule site visits for quality control.*

Relevant Services

- No such maintenance program existed at the start of the contract. Arcadis developed and implemented the pilot program.
- Implemented a real-time management software for better reporting and maintenance procedures
- Brought all equipment site uptime to more than 90%. Provided cost savings with routine maintenance and upgrades to equipment



Arcadis drone pilot taking aerial video of Hurricane Ida damage

Firm name	GEC	Past Performance Evaluation Discipline(s)*	CE&I/OV and ITS
Project name	IDIQ Retainer Contract for ITS CE&I, Fiber Optic Mapping and Management	Firm responsibility (prime or sub?)	Prime
Project number	44-1634, H.012381.6	Owner's name	Louisiana Department of Transportation and Development (LADOTD)
Project location	Statewide, Louisiana	Owner's Project Manager	Lucy Kimbeng
Owner's address, phone, email	1201 Capital Access Road, Baton Rouge, LA 70804 / 225 379 2528, lucy.kimbeng@la.gov		
Services commenced by this firm (mm/yy)	12/16	Total consultant contract cost ($1,000's)	$ 692
Services completed by this firm (mm/yy)	12/21	Cost of consultant services provided by this firm ($1,000's)	$ 692

Describe the project including the firm's role and members involved. (Highlight members to be used in this proposal.)

Firm Members Involved: James "Jimmy" Wheeler, Reagan "Sean" Johnson

This project consisted of on-site field inspection and investigation of ITS Fiber Optic Equipment throughout the state. Testing utilized bi-directional Optical Time Domain Reflectometer (OTDR) at 1310 and 1550 nanometer wavelengths for each terminated fiber in order to verify connectivity and provide baseline attenuation results. Testing included cleaning of fiber connectors per industry standard practice for accuracy of results.

Sean Johnson, Senior ITS Inspector for GEC, performed testing and cataloging of the installed DOTD fiber optics systems for the Fiber Optic Mapping and Management project. Sean has more than 33 years of experience with a wide variety of information systems ranging from routing and switching, optical network design, Ethernet network design and management, CCTV video network design and configuration, and point-to-point and point-to-multipoint WAN connectivity. Sean documented findings and transmitted them to the DOTD Project Engineer and Project Manager. In addition, GEC inspectors performed software integration performance and systems acceptance testing including terrain analysis and communications acceptance of the completed ITS system.

Relevant Services

- Fiber Optic Mapping was originally limited to an isolated region of the state. Eventually, the project was expanded to include almost the entire state.

Firm name	GEC	Past Performance Evaluation Discipline(s)*	CE&I/OV and ITS
Project name	IDIQ Retainer Contract for ITS CEI, Baton Rouge ITS Deployment (Phase 3)	Firm responsibility (prime or sub?)	Prime
Project number	44-1634, H.006831	Owner's name	Louisiana Department of Transportation and Development (LADOTD)
Project location	Ascension, East Baton Rouge, Iberville, Livingston, Pointe Coupee, and West Baton Rouge Parishes, Louisiana	Owner's Project Manager	Lucy Kimbeng
Owner's address, phone, email	1201 Capital Access Road, Baton Rouge, LA 70804 / 225 379 2528, lucy.kimbeng@la.gov		
Services commenced by this firm (mm/yy)	09/04	Total consultant contract cost ($1,000's)	$3,851
Services completed by this firm (mm/yy)	02/17	Cost of consultant services provided by this firm ($1,000's)	$833

Describe the project including the firm's role and members involved. (Highlight members to be used in this proposal.)

Firm Members Involved: James "Jimmy" Wheeler, Reagan "Sean" Johnson

G.E.C., Inc. performed field inspection and investigation services for the Baton Rouge ITS Deployment Phase 3 project in Ascension, East Baton Rouge, Iberville, Livingston, Pointe Coupee, and West Baton Rouge Parishes. This project consisted of the construction and integration of five (5) new DMS sites, ten (10) new CCTV sites, one (1) new hub site, thirty (30) bluetooth Vehicle Detectors (combined with new and existing sites), and five (5) miles of new fiber optic build-out, conduit, and associated pullboxes.

Project Deliverables

- Part-time Technical Assistance, meetings (pre-construction and construction progress), and/or field inspections, provided to the Project Engineer and/or field personnel during construction. Assistance includes specialized ITS sites and items as well as non-specialized ITS items such as foundations, structural components, trenching/boring, soils, and pavement.
- Construction Assistance–respond to requests for assistance/coordination with LADOTD, review and respond to requests for information from the contractor, review and respond to proposed plan/scope changes from the contractor, preparation and/or review of as-built drawings, and review requests for payment / payment applications.
- Full-time resident construction engineering and inspection (project representative) and on-site daily inspection.
- Daily reporting, field logs and recordkeeping.
- Project/contract administration and Project Engineer duties.
- Utilization of Site Manager for reporting and administration.
- System acceptance testing–site commissioning testing, system integration testing, and software integration performance testing. Subsequent preparation of a report of findings detailing issues discovered during testing phases.
- Preparation of final project file.

Firm name	GEC	Past Performance Evaluation Discipline(s)*	CE&I/OV and ITS
Project name	IDIQ Retainer Contract for ITS CEI, I-10 Twin Spans ITS	Firm responsibility (prime or sub?)	Prime
Project number	44-1634, H.011503	Owner's name	Louisiana Department of Transportation and Development (LADOTD)
Project location	Orleans and St. Tammany Parishes, Louisiana	Owner's Project Manager	Lucy Kimbeng
Owner's address, phone, email	1201 Capital Access Road, Baton Rouge, LA 70804 / 225 379 2528, lucy.kimbeng@la.gov		
Services commenced by this firm (mm/yy)	07/17	Total consultant contract cost ($1,000's)	$703
Services completed by this firm (mm/yy)	04/18	Cost of consultant services provided by this firm ($1,000's)	$300

Describe the project including the firm's role and members involved. (Highlight members to be used in this proposal.)

Firm Members Involved: James "Jimmy" Wheeler, Reagan "Sean" Johnson

GEC performed Construction Engineering and Inspection services for the I-10 Twin Spans Intelligent Transportation System (ITS) Deployment project. The project consists of construction and integration for one (1) new Dynamic Message Sign (DMS) site, four (4) new Closed Caption Television (CCTV) sites, bridge mounted CCTV platforms, and integration into existing fiber optic backbone including new and existing conduit and associated pullboxes.

Jimmy Wheeler, Senior ITS Inspector for GEC, performed the daily inspections for the I-10 Twin Spans ITS project. Jimmy has more than 28 years of experience with a wide variety of information systems ranging from routing and switching, optical network design, Ethernet network design and management, CCTV video network design and configuration, and point-to-point and point-to-multipoint WAN connectivity. Sean documented findings and transmitted them to the DOTD Project Engineer and Project Manager. In addition, GEC inspectors performed software integration performance and systems acceptance testing including terrain analysis and communications acceptance of the completed ITS system.

Relevant Services

- GEC provided full-time resident construction engineering and inspection (project representative) and on-site daily inspection
- *GEC also provided system acceptance testing which included site commissioning testing, system integration testing, and software integration performance testing*. Subsequent preparation of a report of findings detailing issues discovered during testing phases.

Firm name	APS Engineering and Testing	Past Performance Evaluation Discipline(s)*	CE&I
Project name	RR067 Hollygrove/Leonidas Group	Firm responsibility (prime or sub?)	Prime
Project number	N/A	Owner's name	DPW NOLA
Project location	New Orleans, LA	Owner's Project Manager	Khalid Saleh
Owner's address, phone, email	1300 Perdido Street, Ste. 6W03, New Orleans, LA 70112; 504-658-8100		
Services commenced by this firm (mm/yy)	06/20	Total consultant contract cost ($1,000's)	N/A
Services completed by this firm (mm/yy)	Ongoing	Cost of consultant services provided by this firm ($1,000's)	$300

Describe the project including the firm's role and members involved. (Highlight members to be used in this proposal.)

Firm Members Involved: Sergio Aviles

The City of New Orleans implemented a multi-million-dollar, multi-year comprehensive program to repair roadways damaged due to hurricane Katrina. APS Engineering provided professional engineering services in a multi-neighborhood project for the Hollygrove portion of the Hollygrove/Leonidas Group A project under Waggoner Engineering.

Relevant Services

- Geotechnical Construction (GC)
- Construction Inspection
- Contract Management (CM)

The repairs in this project that were determined to be eligible for FEMA funding are roadways, sidewalks, ADA ramps, and curbing. *APS performed a thorough geotechnical assessment of these damages and recommended the best value approach to implement the repairs.* The recommendations by APS allowed the City to maximize the federal dollars to have the most impact on the neighborhood's infrastructure as possible.

The Hollygrove neighborhood project included multiple construction repair types with an estimated value for roadway improvements that is approximately $10 million.

Firm name	APS Engineering and Testing	Past Performance Evaluation Discipline(s)*	CE&I
Project name	I-10: Highland to LA 73	Firm responsibility (prime or sub?)	Sub
Project number	H.009250	Owner's name	Louisiana Department of Transportation and Development (LADOTD)
Project location	St. Tammy Parish, LA	Owner's Project Manager	Peggy Paine, P.E.
Owner's address, phone, email	1201 Capitol Access Rd., Baton Rouge, La. 70802-4438, 225 379 1001,Peggy.Paine@la.gov		
Services commenced by this firm (mm/yy)	06/20	Total consultant contract cost ($1,000's)	N/A
Services completed by this firm (mm/yy)	Ongoing	Cost of consultant services provided by this firm ($1,000's)	$300

Describe the project including the firm's role and members involved. (Highlight members to be used in this proposal.)

Firm Members Involved: Sergio Aviles

APS is providing Quality Assurance for material testing services for the I-10: Highland to LA 73 road construction project. As the QA testing lab, APS is conducting all the soil, compaction, and concrete testing as required by LADOTD Materials Section.

Relevant Services

- Geotechnical Construction (GC)
- Construction Inspection
- Contract Management (CM)

Firm name	APS Engineering and Testing	Past Performance Evaluation Discipline(s)*	CE&I
Project name	2012-FEMA-7H1-1, Touro Neighborhood	Firm responsibility (prime or sub?)	Prime
Project number	N/A	Owner's name	DPW NOLA
Project location	New Orleans	Owner's Project Manager	Khalid Saleh
Owner's address, phone, email	1300 Perdido Street, Ste. 6W03, New Orleans, LA 70112; 504-658-8100		
Services commenced by this firm (mm/yy)	07/14	Total consultant contract cost ($1,000's)	N/A
Services completed by this firm (mm/yy)	08/16	Cost of consultant services provided by this firm ($1,000's)	$92

Describe the project including the firm's role and members involved. (Highlight members to be used in this proposal.)

Firm Members Involved: Sergio Aviles

The City of New Orleans implemented a multi-million-dollar, multi-year comprehensive program to repair roadways damaged due to hurricane Katrina. APS Engineering *provided professional engineering and field inspection and investigation services in a multi-neighborhood project* for the Touro portion of the Milan/Touro project under Waggoner Engineering. The project evaluated damage to roadways and methods to mitigate future roadway damage by improving storm drainage and water runoff.

Relevant Services

- Geotechnical Construction (GC)
- Construction Inspection
- Contract Management (CM)

Section 18

Arcadis did an excellent job managing the construction of the project. The Arcadis Project Engineer and inspectors were familiar with the area of work and easily navigated between multiple work locations, DOT facilities, and contractor facilities. Arcadis personnel were equipped with all the necessary Personal Protective Equipment (PPE) needed for the working conditions as required by the DOTD Safety Manual and made sure the contractor was also in compliance of the DOTD Safety Manual PPE requirements. As mentioned above, their understanding of LADOTD CE&I standards and technical specifications resulted in the efficient execution of this project. Arcadis was able to facilitate the reduction of work originally specified in the plans due to a design error that was not addressed prior to construction letting. The resulting reduction in work allowed DOTD to install an additional CCTV camera that was not originally included in the plans"

- *Alaa Shams*, LADOTD US 190 ITS Deployment CE&I Project Manager

Arcadis inspector documenting installation of DMS on post for Alexandria ITS Deployment.

Arcadis ITS Past Performance Rating: 4.6/5

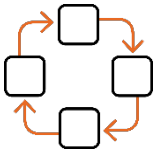
18. Approach and Methodology:

This ITS CE&I project is unique in their nature because it requires a balance of understanding emerging technologies in ITS as well as LADOTD's CE&I protocols and requirements. We have assembled a team (Arcadis + GEC + APS) which brings that balance. Our team has *successfully performed the highest number of ITS CE&I* projects with LADOTD. The Arcadis team has been serving LADOTD on multiple ITS IDIQ contracts over the past 20 years including **ITS CE&I, ITS Maintenance Engineering & Inspection (ME&I), ITS System Design, Integration, and System Verification Services, and ITS Design**. Arcadis' team consists of many engineers and certified inspectors with years of LADOTD ITS and CE&I experience that provide unique capabilities to meet all aspects of the scope of work. Our team has resources available and ready to start working on this project on Day 1 without any learning curve – which is critical to the successful delivery of this project. The depth and availability of the Arcadis team ensures that we can reach out to additional resources as needed to effectively and successfully manage all project needs and requirements. Our team's deep bench of experienced professionals provides redundancies in all aspects of this contract. In addition to the team members presented in this proposal, the Arcadis team includes additional local and regional resources that can be utilized to deliver this project on-time and manage overall team workload.

Tony Moore, Arcadis Project Manager (PM), has a proven record of serving efficiently as the PM on LADOTD ITS CE&I IDIQs over the past eight years. He will ensure consistent and clear communication to keep LADOTD well-informed of all project construction activities and monitor the CPM schedule to maintain timely overall project progress.

Project Understanding

The main scope of this project is to perform in-depth observation, daily recording, and documentation of all the complex components of the ITS construction project using HeadLight software and SiteManager. The complex components of an ITS construction project may include dynamic message signs (DMS) and structural supports, closed-circuit television (CCTV) cameras, structural supports and camera lowering devices, fiber optic cable network, wireless network components, network switches, power supplies, and underground and aerial facilities to accommodate all the network communication components. Familiarity with proper installation, testing, operation, and maintenance of these ITS components are essential to the successful construction of this ITS project. Arcadis' team has the familiarity and expertise with all manner of ITS components to provide excellent in-depth observation of the installation and documentation of this ITS construction project.

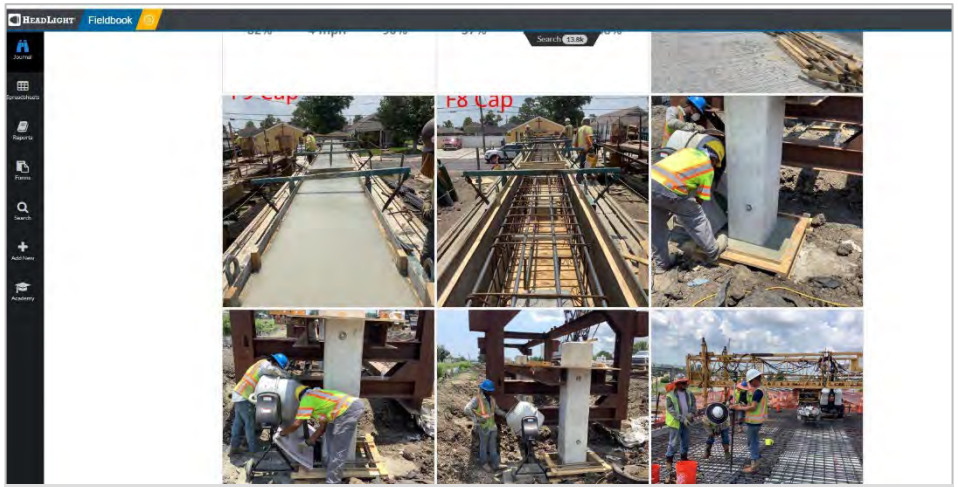


Approach and Methodology:

1. Pre-Construction Meeting: We will schedule and preside over the pre-construction meeting for the project and issue the Notice to Proceed to the contractor on behalf of LADOTD if it has not been issued by LADOTD prior to the selection of this RFP.

2. Field Inspection & Daily Work Reports (DWRs): Daily field inspection is essential on any construction project, but it is even more important on ITS construction projects due to the complex nature of the technological components being installed which allow the ITS devices to perform as they were designed. An ITS inspector will be on-site any time the contractor is on-site and will observe and document all construction activities including deployment of temporary traffic control and all other work activities. The Arcadis inspector will observe the construction activities with an eye towards the step-by-step process required to install ITS components to ensure a successful and fully functioning ITS system. Additionally, all Arcadis ITS inspectors have experience in the construction and maintenance of ITS devices developed through participation on the LADOTD ITS ME&I IDIQ and the previous LADOTD ITS Maintenance IDIQs. The inspector will observe, document, and notify the PM of any construction activities or design issues that may lead to maintenance issues of the ITS component as early in the construction process as possible to allow an opportunity for any maintenance concerns to be addressed prior to the completion of the project. Daily Work Reports (DWR) will be prepared by the inspectors while on-site with the use of LADOTD's recently deployed Headlight software. **The Arcadis team is one of the first firms to utilize HeadLight software for LADOTD CE&I projects and currently manages multiple projects using HeadLight and iPads.** The Arcadis team will utilize this system to document field operations and maintain all field records for the I-10 ITS Scott to Lake Charles (CE&I)

project. This includes making daily entries in the project diary to indicate that Arcadis team personnel and contractor personnel are present on the job site, detail contractor personnel and equipment on the project, accept the work, verify acceptability of traffic control, and charging contract time. **All team inspection staff have experience with the HeadLight software, and all inspectors are proficient with SiteManager and Material Manager.** Pictures will be taken to provide visual documentation for future reference. The team will develop a picture cataloging file system in Headlight that integrates with ArcGIS to provide additional usability of the visual documentation. The Headlight DWRs will be uploaded into SiteManager daily to allow access to the DWR entries by all stakeholders within 24 hours. Additionally, Arcadis will develop and maintain an Excel spreadsheet that includes all contract pay items to document the installation of all pay items by date and quantity. The spreadsheet will be included in the final project closeout submittal.



Arcadis Team is one of the first teams to use HeadLight software for LADOTD CE&I

3. Sampling & Field Testing: Component sampling is vital to the successful completion of a construction project. Sampling ensures the components used by the contractor during construction satisfy LADOTD requirements and will perform as designed. The Arcadis team will work with LADOTD Materials Section to develop a thorough Sampling Plan. Also, we will make sure the contractor submits the required concrete mix designs during the pre-construction meeting and make arrangements to visit all the concrete plants the contractor intends to use to gather and submit concrete components to the District 07 Materials lab for testing to minimize any delays regarding concrete mix design approvals and concrete plant acceptance. We will document and submit contractor provided samples to the LADOTD District 07 Materials lab for testing as required in the Sampling Plan. The Arcadis team will perform all necessary field testing including gathering and documenting all concrete placement and sample requirements and work with the contractor to observe and document all fiber optic cable testing, device commission testing, and system integration testing. The team will monitor all the testing and notify the contractor within 24 hours of a passing or failing test or sample. Additionally, the Arcadis team will document all the required sampling and testing requirements using HeadLight software in coordination with SiteManager.

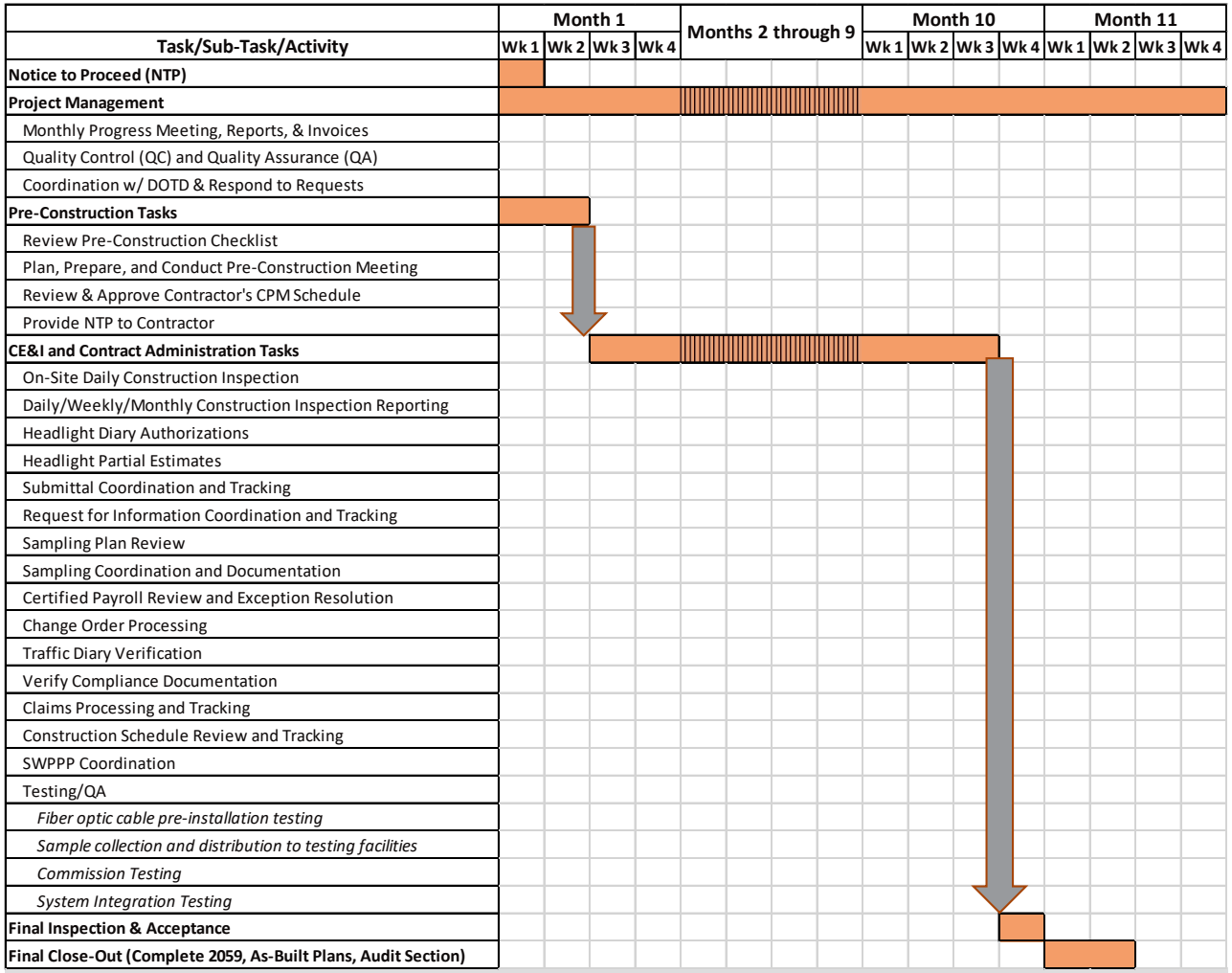
4. Construction Contract Administration: All construction projects must progress in an organized and methodical manner. Prior to the start of construction, Arcadis will have SiteManager and HeadLight access for the project established with the LADOTD IT personnel. Arcadis will have the contract pay item Excel spreadsheet prepared and ready for use and we will verify all the construction components the contractor intends to use during construction to gather and submit all the individual concrete components for testing to the LADOTD District 07 Materials Lab using the LADOTD Materials Site Manager submittal process. All test results will be confirmed as passing prior to allowing the contractor to pour any concrete on the project.

Part of Arcadis' role as the ITS CE&I provider on this project includes being the liaison between LADOTD and the contractor for any and all contract components. The Arcadis team has been providing LADOTD ITS CE&I services since 2004 and ITS Maintenance services since 2012. We have *developed working relationships* with all the ITS contractors authorized to perform ITS construction and maintenance work in Louisiana. As a result, Arcadis can interact with known contractor employees prior to the pre-construction meeting to begin the information exchange that is always necessary at the start of a construction process. Having previously developed relationships with the contractor that is awarded this contract will expedite the process and help ensure a positive and productive interaction between the contractor and LADOTD and allows Arcadis to simplify and shorten any and all communications between the parties.

During previous ITS construction projects, Tony Moore, Arcadis PM, has routinely had daily interactions with all the contractor PMs on any number of construction issues, including following up on outstanding submittals, status of RFIs, unforeseen site conditions, design issues, status of HeadLight partial estimate payments, and many other topics.

Arcadis will review the contractor's CPM schedule weekly to confirm the contractor is on track and identify any shifts in the critical/controlling work item due to supply chain issues or any other circumstance that may potentially cause delays. Arcadis' established relationship with the contractor will allow us to facilitate any necessary discussions when supply chain issues may arise and expedite solutions to *reduce supply chain issues* as much as possible.

Arcadis will schedule monthly construction progress meetings, prepare agendas, and provide meeting minutes for all meetings. Using the HeadLight DWR information, the Arcadis PM will review and approve the daily pay item installation quantities and generate monthly HeadLight partial estimates. Tony will also review and approve contractor weekly certified payroll submittals and address any certified payroll exceptions with the contractor to make sure monthly partial estimates are paid in a timely fashion.



Project Schedule: I-10; Scott to Lake Charles ITS CE&I (315 days)

5. Utility Coordination: The Arcadis team will work with the contractor to coordinate with all utilities which may be encountered during construction. As is typical on LADOTD ITS CE&I construction projects along I-10, there will be underground gas lines, canals, and other underground obstacles that will have to be negotiated by the contractor during construction. We have years of experience dealing with local utilities and is prepared to assist and coordinate all contractor activities where utilities are involved.

6. Track Submittals & RFIs: All construction projects require contractor submittals and invariably will include Requests for Information (RFI). We will prepare a spreadsheet to track all submittals and RFIs to document submittal and RFI number, description, date submitted, date returned and comments to ensure submittals and RFIs are returned within the contract required timeline.

7. SWPPP Coordination: As with utility coordination, the Arcadis team has years of experience working with stormwater pollution prevention plans (SWPPP). In most cases, ITS CE&I construction projects have minimal SWPPP impacts. However, there is always the potential for stormwater pollution to occur especially when working on underground components near low lying areas or wetland areas. The team has experience recognizing

and assisting contractors in mitigating these situations in accordance with EPA and LADOTD requirements.

8. Monthly Pay Estimates: The Arcadis PM will review and approve DWR entries on a daily basis to prevent any pay item installation discrepancies and ensure the timely processing of monthly pay estimates as required by LADOTD. The Arcadis PM will also review and approve the contractor's weekly certified payroll submittals and notify the contractor of any payroll discrepancies immediately upon discovery to make sure the contractor corrects the discrepancy and to prevent future discrepancies.

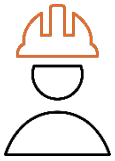
9. Change Orders Management: In the event the contractor has the need for and requests a change order, the Arcadis PM will work with the contractor and the LADOTD project coordinator to make sure a change order is appropriate. Once it is determined that a change order is needed, Tony will provide change order documents in a timely manner that have accurate and appropriate descriptions of the change order request and are complete with all necessary attachments including the category worksheet and are ready for the approval process.

10. Claims & Disputes Management: The Arcadis team has staff available that specialize in claims and dispute management. In the unlikely event the contractor files a contract claim, we will provide claims and dispute management assistance to LADOTD to help mitigate any faulty claims submitted by the contractor.

11. Final Acceptance & Close-Out: Once construction and system testing are complete and accepted and the contractor has received final payment for construction, we will prepare all necessary project close-out documents including as-built plans, signed monthly pay estimates and change orders, all project correspondence, submittal and RFI documents, and a completed Form 2059. Once all the documents are prepared, Tony will generate the project final estimate and submit the final project close-out documentation to LADOTD HQ for project close out.

Network Security: The most important component of any ITS project is the communication network. Communication networks have security vulnerabilities that must be continually addressed. The Arcadis team understands the importance of network security and will verify and document that all network communications are safe and secure. Likewise, Arcadis is fully prepared to comply with the State of Louisiana's Information Security Policy and ensure the contractor has satisfied this requirement prior to any attempt by the contractor to interact with the LADOTD communications network. Additionally, the use of HeadLight will provide an additional layer of security for daily project documentation that was previously unavailable.

QA/QC: *The Arcadis team has developed QA/QC processes for LADOTD on many projects including ITS CE&I, design, system engineering, and ITS maintenance.* Arcadis will provide the LADOTD PM the internal QA/QC manual. This manual will be the basis of our quality control and quality assurance for the duration of the project. Additionally, we will supplement this manual with an internal review of all contractor submittals and RFIs. Our team will also perform independent QC reviews of all inspection submittals by team members. These reviewers will check the inspection data and reports for accuracy and compare them to field notes to verify that all documentation is accurate and properly supported with notes. Arcadis will maintain records of all correspondence between the Arcadis PM and the LADOTD PM.



Work Zone Safety: *Arcadis' core values revolve around safety.* It is part of our everyday operations as a company. To that end, Arcadis understands the dangers associated with working near interstate traffic. At Arcadis, we pride ourselves on our safety processes and daily safety awareness. All Arcadis employees that will participate in any on-site activity will have a valid LADOTD Traffic Control Supervisor certification. At the Kick-off meeting, Arcadis will verify the contractor representatives who will be assigned as Traffic Control Supervisors and Traffic Control Technicians. After construction begins, the lead Arcadis Inspector will confirm and document a daily tailgate safety meeting performed by the contractor and review daily traffic control plans with the contractor's field supervisor.

DOTD
LOUISIANA DEPARTMENT OF TRANSPORTATION & DEVELOPMENT

ARCADIS

Sections 19–21

"Arcadis provided excellent project management throughout the duration of the project. Arcadis provided the project schedule, biweekly and monthly status reports regarding completed and scheduled work in a timely manner. Exceptional performance in communications, cooperation and follow-up with stakeholders."

- *Rosalinda Deville,* LADOTD ITS Systems Engineering Analysis Project Manager

Arcadis inspector documents DMS commission test New Orleans DMS

19. Workload:

Firm(s)	Past Performance Evaluation Discipline(s) *	State project number	Project name	Remaining unpaid balance**
ARCADIS	CE&I/OV	H.011220.6-1	I-10 CBD2 Carrollton-Lafitte Ave and Supplement No. 1	$80,338
		H.012876.6	US 90Z (I-10 Magnolia Street) Supplement No. 1	$26,829
		H.013710.6	I-10: US 61 to Laplace ITS Deployment	$533,794
	ITS	H.013868.6 (B)	ITS Responsive/Emergency Maintenance Engineering and Inspection (ME&I) (2022)	$147,799
		H.004100.5	I-10: LA 415 to Essen Lane on I-10 and I-12	$231,299
		H.013868.5	ITS Program Management and Operations (2022)	$593,753
		H.013868.6 (A)	ITS Routine Maintenance Engineering and Inspection (ME&I) (2022)	$600,711
			PO No. 2000588785 Scott Tower Cable and Grounding Repair, PO No. 2000634027 I-20 @ I-220 CCTV Repair for The Site in Shreveport, LA, PO No. 2000644636 I-10 @ LA 22 DMS CCTV Install	$14,700
	Traffic	H.011328.2	I-49 South (Ricohoc to Berwick)	$176,056
		H.003370	I-220/I-20 Interchange IMP & BAFP Access Design Build	$15,000
		H.004100.5	I-10: LA 415 to Essen Lane on I-10 and I-12	$597,523
		H.005121	LA 1/LA 415 Connector	$105,842
		H.972419.1	SHSP Update and Regional SHSP Marketing/Advertising Support	$12,717
		H.012018.6	Adaptive Traffic Signal Design and Implementation	$12,608
		H.014305.1	US 61: Cardinal Drive to Bert Street	$24,419
		H.013322.1	LA 3040 Feasibility Study	$38,844
		H.013797	LA 30: EBR PL – I-10	$493,720
	Road	H.011328.2	I-49 South (Ricohoc to Berwick)	$353,273
		H.012901.6, H.010634.6	US 90Z (Bodenger Blvd. – Stumpf Blvd.)	$339,654
	Bridge	H.004100.5	I-10: LA 415 to Essen Lane on I-10 and I-12	$1,098,670
	Environmental	H.002397.2	LA 16 (Pete's Hwy) Interstate 12 Interchange Route	$20,109
		H.011328.2	I-49 South (Ricohoc to Berwick)	$828,788
		H.009932	US 80 Widening: Vancil Road to Well Road Environmental Assessment	$5,343
		H.012891	LA 300 at Bayou LaLoutre	$7,959
		H.014215	LA 20 at 40 Arpent Canal and Drainage Canals	$31,698
		H.014213	LA 700 at Indian Bayou and Bayou Grand Marais	$15,071

		H.014279	LA 35: Drain Canal Near Lawtell	$27,893
		H.014278	LA 85: Patout and Drain Canal Bridges	$33,728
		H.014276	LA 975: Creek Bridges	$8,763
		H.014216	LA 682 at Norris Canal and Unnamed Tributaries	$41,250
		H.014241	LA 10 at Mill Creek	$19,609
		H.014251	LA 422: Bridge Over Unnamed Stream	$26,672
		H.012565	LA 963 at Redwood Creek and Little Redwood Creek	$8,212
		H.014257	LA 68 at Karrs Creek	$27,629
		H.014253	LA 421 at Thom Creek	$6,432
		H.014256	LA 952 at McKowen Creek and Beaver Creek	$32,217
		H.014254	LA 955 at Knighton Bayou, Trib. Olive Branch, White Branch, and Chapman Branch	$21,438
		H.012061	LA 1 at Lateral W15#7A and Bayou Moreau	$10,847
		H.014252	LA 1054 at Tyner Creek	$6,932

Firm(s)	Past Performance Evaluation Discipline(s) *	State project number	Project name	Remaining unpaid balance**
GEC	CE&I/OV	Contract # 440013710	Retainer Contract for CE&I, Statewide with the Majority of Work in District 03	
		TO# H.003014.6	I-10 Widening and Reconstruction (LA 37 to ATCR BR.) St. Martin and Lafayette Parishes	$40,623
		TO# H.010601.6	I-10 Widening and Reconstruction (LA 328 - LA 347)	$305,776
		Contract # 4400023074	IDIQ for CE&I Services and Staff Augmentation, District 6	
		TO# H.010724.6	Pecan Island Road Over the Chenal, Pointe Coupee Parish	$155,876
		Contract No. 4400019950	IDIQ for CE&I, Statewide, with Majority of Work in District 03	
		TO# H.002735.6	Bayou Vermillion Bridge	$91,813
		TO# H.002151.6	Bayou Parc Perdue and Creek Bridges	$146,782
		TO# H.010601.6	I-10 Widening and Reconstruction (LA 328 - LA 347)	$101,498
		Contract # 440014315	Retainer Contract for Painting Inspection & Environmental Monitoring with CE&I, Statewide (Sub to GPI)	
		TO# H.003370.6	1-220/1-20 Interchange IMP & BAFB Access	$102,598
		TO# H.010000.6	US 1 71: Calcasieu River Bridge Repairs	$195,107

	ITS		ITS	$168,789
			ITS	$28,665
		Contract # 4400009327 TO# H.014512 TO# H.012381.5-1	Retainer for Intelligent Transportation Systems Monroe Regional ITS Architecture Update (Note: Contract Expired. Remaining amounts will not be billed.) Fiber Optic Mapping and Management (Note: Contract Expired. Remaining amounts will not be billed.)	 $44,245 $38,242
	Road		Geometrics	$70,810
			Road	$412,410
	Bridge		Bridge Study	$71,333
			Bridge	$205,112
			Bridge	$174,700
		SP# H.008145.5	Leeville to Golden Meadow, Route LA 1 Relocated, Const. Engineering Services (Sub to HNTB)	$233,102
		SP# H.003074.5	Williams Blvd – Veterans Blvd., Route I-10, Jefferson Parish, LA	
			Bridge	$148,795
		Contract # 4400010099 TO# H.012485.1 TO# H.092481.5	Retainer Contract for Off-System Complex Bridge Load Rating (Sub to Forte & Tablada) Rating of Off-system Bridge Structures Off-System Load Testing and Evaluation	 $19,056 $14,800
	Geotechnical		Geotechnical (Task Closed)	$51,213
		S.P.# H.004100	I-10 Baton Rouge Widening CMAR Segment 1 (Sub to Huval)	
	Environmental		Environmental	$19,863
	Planning	SP# 4400016958	Road Transfer Program Management, Statewide (Note: Unlikely to bill this entire amount)	$1,688,247
		SP# H.004273.5	I-49 Connector (Lafayette Regional Airport to I-10/I-49/US 167 Interchange) (Sub to Stantec)	
	Other		Program Management ($107,009), Electrical ($301,419)	$408,428
			Project Management ($435,309), Retaining Walls ($211,202), Sound Walls ($128,334) & Electrical ($1,409,387)	$2,184,232
		S.P.# H.013897	I-10 & I-12 College Drive Flyover Ramp Design-Build Project (Sub to Boh Bros.)	
			Project Management ($100,002), Sound Walls ($44,640) & Electrical ($16,335)	$160,977
			Electrical	$55,474
		Contract # 4400011354	IDIQ Contract for Electrical Statewide	

	(Electrical)	TO# H.013442.6 TO# H.013617.5	I-10: Crowder Boulevard Interstate Lighting I-610E Interchange Lighting	$47,379 $38,918
	Other (Electrical)	S.P. # H.004774.5 & H.007300.6	Kansas Lane - Garrett Road Connector and I-I-20 Improvements, Ouachita Parish (Sub to Lazenby & Associates, Inc.)	$2,100

Firm(s)	Past Performance Evaluation Discipline(s) *	State project number	Project name	Remaining unpaid balance**
APS Engineering and Testing (DBE/SBE)	Geotech	H.013127	Retainer Contract for Geotechnical Services	$233,952
		440019336	Rural Bridges Replacement Initiative Phase II	$443,715
		440019337	Rural Bridges Replacement Initiative Phase II	$276,680

20. Certifications/Licenses:

STAFF CERTIFICATION CHART SUMMARY	
Names	**Relevant Certification**
Arcadis Team	
Tony Moore, PE *(Meet MPR No. 2)* ARCADIS	Professional Engineer – LA / PE.0037887 / 09-30-2023 ATSSA Traffic Control Supervisor Refresher – LA State Specific – Exp. 1/2026 IMSA Traffic Signal Technician Level I – Exp. 9/2022 IMSA Traffic Signal Technician Level II – Exp. 9/2022 Traffic Engineering Analysis Process & Report Module 3
Tony Jackson, IMSA II ARCADIS	IMSA Traffic Signal Inspector for Advanced Technologies – Exp. 1/2025 IMSA Traffic Signal Senior Field Technician Level III – Exp. /2025 ATSSA Traffic Control Supervisor Refresher – LA State Specific – Exp. 1/2026 FHWA-NHI-133121 Traffic Signal Design and Operation LADOTD Authorized Concrete Field Tester LADOTD Structural Concrete Field Inspection
James Wheeler GEC	SSPC C-3 Supervisor/Competent Person Training for Deleading of Industrial Structures SSPC C-5 Supervisor/Competent Person Training for Deleading of Industrial Structures ATSSA Traffic Control Supervisor Refresher – LA State Specific – Exp. 1/2025 NFPA 2017 NFPA 70; National Electrical Code Online Series NFPA 2018 NFPA 70; Standard for Electrical Safety in the Workplace Series
Reagan Johnson GEC	SSPC C-3 Supervisor/Competent Person Training for Deleading of Industrial Structures SSPC C-5 Supervisor/Competent Person Training for Deleading of Industrial Structures ATSSA Traffic Control Supervisor Refresher – LA State Specific – Exp. 2/2025
Cody Lemoine ARCADIS	ATSSA Traffic Control Supervisor Refresher – LA State Specific – Exp. 2/2026 Comtrain Certified Competent Climber/Rescuer Comtrain ED R17 In-House Instructor for Authorized and Competent Climber/Rescuer NFPA 70E: Standard for Electrical Safety in the Workplace Image Sensing Systems, Inc - RTMS Traffic Detector Technical Training
Justine Gaspard ARCADIS	ATSSA Traffic Control Technician – LA State Specific – Exp. 7/2023 ATSSA Traffic Control Supervisor Refresher – LA State Specific – Exp. 7/2023
Joshua Daigrepont ARCADIS	IMSA Traffic Signal Technician Level I IMSA Traffic Signal Technician Level II ATSSA Traffic Control Supervisor Refresher – LA State Specific – Exp. 11/2025 Comtrain Authorized Climber and Rescuer
Akhil Chauhan, PE, PTOE, PTP, PMP *(Meet MPR No. 1)* ARCADIS	Professional Engineer – LA / PE.0033703 / 09-30-2022 Professional Traffic Operations Engineer – #2544 / Exp. 11/2023 Professional Transportation Planner – #246 / Exp. 12/2024 Traffic Engineering Analysis Process & Report Modules 1, 2, & 3

Jeff Jones, IMSA II ARCADIS	FIS Fiber Optic Training Course FIS Advance Fiber Optic Training Course Helios Cohu Electronics Certified Installer Closed-Circuit Television CCTV IMSA Traffic Signal Technician Level I – Exp. 8/2024 IMSA Traffic Signal Technician Level II – Exp. 8/2024 ATSSA Traffic Control Design Specialist ATSSA Traffic Control Supervisor Refresher – LA State Specific – Exp. 6/2023 Traffic Controller (Naztec TS1 & TS2) and Streetwise Training Course
Laura Hartley, PE, PTOE *(Meet MPR No. 4)* ARCADIS	Professional Engineer – LA / PE.0039030 / 09-30-2022
Ranzy Whiticker, PE *(Meet MPR No. 3)* ARCADIS	Professional Engineer – LA / PE.0034132 / 03-31-2023
Thomas Montz, PE, PTOE ARCADIS	Professional Traffic Operations Engineer – #4093 Exp. 07/2022 Professional Transportation Planner – #599 / Exp. 12/2024 Traffic Engineering Analysis Process & Report Modules 1, 2, & 3
Paul Hsu, PE *(Meet MPR No. 5)* ARCADIS	Professional Engineer – LA / PE.0035983 / 03-31-2023 ATSSA Traffic Control Technician – LA State Specific – Exp. 2/2025 ATSSA Traffic Control Supervisor Refresher – LA State Specific – Exp. 2/2025
Eric Schatz, PE, PSP, CFCC, LEED AP ARCADIS	AACE Certified Forensic Claims Consultant – No. 00121, ID No. 66376
Sergio Aviles, PE APS Engineering and Testing	ASSHTO Accreditation – Proficiency for Testing and Construction Materials Materials Testing Center (MTC) USACE Certificate of Laboratory Validation – Exp. 12/2023 ATSSA Traffic Control Supervisor Refresher – LA State Specific – Exp. 12/2022 LADOTD Certified Flagger – 1253-1061-25541 – Exp 9/2022
Paul Fulcher APS Engineering and Testing	ASSHTO Accreditation – Proficiency for Testing and Construction Materials Materials Testing Center (MTC) USACE Certificate of Laboratory Validation – Exp. 12/2023 ATSSA Traffic Control Technician – LA State Specific – Exp. 7/2022

LOUISIANA PROFESSIONAL
ENGINEERING & LAND SURVEYING BOARD
(LAPELS)
9643 Brookline Avenue, Suite 121
Baton Rouge, LA 70809
Phone (225) 925-6291
www.lapels.com

Mr. Anthony James Moore

License/Certificate Type - Number	Expiration Date
PE.0037887	09/30/2023

Status: Active

Please be advised that your license must be in "Active" status in order for you to (a) provide or offer to provide engineering or land surveying services in Louisiana or (b) use the words "engineer", "engineering", "land surveyor", "land surveying" or any modification or derivative thereof in your name or in connection with your business or activities in Louisiana. Licensees whose licenses are in "Retired", "Inactive", or "Expired" status are prohibited from engaging in the activities described above in items (a) and (b).

LA R. S. 37:689 requires firms practicing or offering to practice engineering or land surveying in the state of Louisiana to be licensed by the Board prior to offering such services.

ATSSA TRAINED

PROOF OF TRAINING

THIS CERTIFICATE HEREBY RECOGNIZES THAT

Anthony J Moore

has attended

Traffic Control Supervisor Refresher-LA State Specific

Training Course

1/25/2022 to 1/25/2026
Training Valid Through

Director of Training

Baton Rouge, LA
Location

President, CEO

ATSSA provides training and certification but neither constitutes employment by ATSSA.

This certificate provides proof of training, not certification.

ATSSA American Traffic Safety Services Association ATSSA.com

CERTIFIED PUBLIC SAFETY TECHNICIAN
IMSA

Tony J. Moore

is hereby certified as a

Traffic Signal Technician Level I

by completing all requirements and examination for certification
on 9/18/2019

Valid thru 9/18/2022
Certification #AA_127114

Toby Cummings, CAE - Executive Director

CERTIFIED PUBLIC SAFETY TECHNICIAN
IMSA

Tony J. Moore

is hereby certified as a

Traffic Signal Field Technician Level II

by completing all requirements and examination for certification
on 9/18/2019

Valid thru 9/18/2022
Certification #BE_127114

Toby Cummings, CAE - Executive Director

Certificate of Completion

presented to

Tony Moore

for completing the

Traffic Engineering Analysis Process & Report
Module 3

Date: January 30, 2020

Location: Baton Rouge, Louisiana

Professional Development Hours (PDHs) Awarded: 3.5

Authorized Instructor

Authorized Instructor

Authorized instructor

LOUISIANA DEPARTMENT OF TRANSPORTATION & DEVELOPMENT

CERTIFIED PUBLIC SAFETY TECHNICIAN
IMSA

Anthony Jackson, III

is hereby certified as a

Traffic Signal Inspector for Advanced Technologies

by completing all requirements and examination for certification
on 1/26/2022

Valid thru 1/26/2025
Certification #AT_117627

Toby Cummings, CAE - Executive Director

CERTIFIED PUBLIC SAFETY TECHNICIAN
IMSA

Anthony Jackson, III

is hereby certified as a

Traffic Signal Senior Field Tech Level III

by completing all requirements and examination for certification
on 1/26/2022

Valid thru 1/26/2025
Certification #CE_117627

Toby Cummings, CAE - Executive Director

ATSSA TRAINED

PROOF OF TRAINING

THIS CERTIFICATE HEREBY RECOGNIZES THAT

Anthony Jackson

has attended

Traffic Control Supervisor Refresher-LA State Specific

Training Course

1/25/2022 to 1/25/2026
Training Valid Through

Director of Training

Baton Rouge, LA
Location

President, CEO

ATSSA provides training and certification but neither constitutes employment by ATSSA.

This certificate provides proof of training, not certification.

ATSSA American Traffic Safety Services Association ATSSA.com

U.S. Department of Transportation
Federal Highway Administration

NATIONAL HIGHWAY INSTITUTE

National Highway Institute

Certificate of Training

ANTHONY JACKSON

has participated in

FHWA-NHI-133121

Traffic Signal Design and Operation

hosted by

LA DOTD/LTRC

Date: *December 13-14, 2016*

Hours of Instruction: 12

Location: *Baton Rouge, LA*

Instructor

Local Coordinator

Instructor

Valerie Briggs, Director
National Highway Institute

State of Louisiana
Department of Transportation and Development
Awards this certificate to
Anthony Jackson
for the
Successful Completion of the Requirements
to become an
Authorized Concrete Field Tester
Department Certifying Authority

State of Louisiana
Department of Transportation and Development
Awards this certificate to
Anthony Jackson
for
Successful Completion of the Requirements
for Certification in
Structural Concrete
Inspection
Department Certifying Authority

IACET Provider # 1003373
Florida Board of Professional Engineers,
Provider #0004326
New York Board of Professional Engineers
American Board of Industrial Hygiene
Approved Provider #10-193

CERTIFICATE OF COMPLETION

James Wheeler

Has fulfilled the requirements of
SSPC: The Society for Protective Coatings'

C-3 SUPERVISOR/COMPETENT PERSON TRAINING FOR DELEADING OF INDUSTRIAL STRUCTURES

And is awarded
3.0 Continuing Education Units

Course Date(s): 4/7-10/14

Location: Sulphur, LA

Instructor(s):
Fred Smith
Chris Lovelace

SSPC President SSPC Executive Director

www.sspc.org | 40 24th Street 6th Floor Pittsburgh, PA 15222-4656 | P: 412.281.2331 T: 877.281.7772 F: 412.281.9992

IACET Provider # 1003373
Florida Board of Professional Engineers,
Provider #0004326
New York Board of Professional Engineers
American Board of Industrial Hygiene
Approved Provider #10-193

CERTIFICATE OF COMPLETION

James Wheeler
ID # 1304856
Has fulfilled the requirements of
SSPC: The Society for Protective Coatings'

C-5 SUPERVISOR/COMPETENT PERSON REFRESHER TRAINING FOR DELEADING OF INDUSTRIAL STRUCTURES

And is awarded
.8 Continuing Education Units

Course Date(s): 9/6/2018

Location: Baton Rouge, LA

Instructor: Fred Smith

SSPC President SSPC Executive Director

www.sspc.org | 800 Trumbull Drive Pittsburgh, PA 15205 | P: 412.281.2331 T: 877.281.7772 F: 412.281.9992

ATSSA TRAINED

PROOF OF TRAINING

THIS CERTIFICATE HEREBY RECOGNIZES THAT

James C Wheeler

has attended

Traffic Control Supervisor Refresher-LA State Specific

Training Course

1/29/2021 to 1/29/2021
Date

Vice President of Education and Technical Services

Baton Rouge, LA
Location

President, CEO

ATSSA provides training and certification but neither constitutes employment by ATSSA.

ATSSA American Traffic Safety Services Association ATSSA.com

NFPA

2017 NFPA 70; National Electrical Code Online Series
Certificate of Completion

Jimmy Wheeler
Completion Date: 5/17/2018
.6 CEUs or 6 Hours

NFPA

2018 NFPA 70E: Standard for Electrical Safety in the Workplace Series
Online Training
Certificate of Completion

Jimmy Wheeler
Completion Date: 5/30/2018
.7 CEUs

ATSSA SAFER ROADS SAVE LIVES

AMERICAN TRAFFIC SAFETY SERVICES ASSOCIATION

SLOW

This is to affirm that

JAMES WHEELER

has satisfied the requirements to be designated as a

REGISTERED FLAGGER

Expiration Date 8-17-24 State Issued in LA

Instructor Signature

Verification available by calling 1-877-642-4637 or at http://www.flagger.com

SSPC The Society For Protective Coatings

AUTHORIZED IACET PROVIDER

IACET Provider # 3375

American Board of Industrial Hygiene
Approved Provider #11-572

Florida Board of Professional Engineers
Provider #0004326
Provider License #309
File Number #425

CERTIFICATE OF COMPLETION

Reagan S. Johnson

has successfully completed a course and exam

C-3 Supervisor/Competent Person Training for Deleading of Industrial Structures

and is awarded

3.0 Continuing Education Units

Executive Director

President

San Antonio, TX
Location

January 13-16, 2013
Date

Mitch Blum
Rich Burgess
John Hamilton
Instructor(s)

SSPC The Society For Protective Coatings

ACCREDITED IACET PROVIDER

IACET Provider # 1003373
Florida Board of Professional Engineers,
Provider #0004326
New York Board of Professional Engineers
American Board of Industrial Hygiene
Approved Provider #10-193

CERTIFICATE OF COMPLETION

Reagan Johnson
ID # 1296718
Has fulfilled the requirements of SSPC: The Society for Protective Coatings'

C-5 SUPERVISOR/COMPETENT PERSON REFRESHER TRAINING FOR DELEADING OF INDUSTRIAL STRUCTURES

And is awarded
.8 Continuing Education Units

Course Date(s): 9/6/2018

Location: Baton Rouge, LA

Instructor: Fred Smith

SSPC President

SSPC Executive Director

www.sspc.org | 800 Trumbull Drive Pittsburgh, PA 15205 | P: 412.281.2331 T: 877.281.7772 F: 412.281.9992

The American Traffic Safety Services Association

Hereby recognizes that

Reagan S Johnson

has attended

Traffic Control Supervisor Refresher-LA State Specific

Training Course

2/8/2019 to 2/8/2019

Date

Baton Rouge, LA

Location

ATSSA

SAFER ROADS SAVE LIVES

Training & Products Dept. Director

President, CEO

ATSSA

SAFER ROADS SAVE LIVES

AMERICAN TRAFFIC SAFETY SERVICES ASSOCIATION

SLOW

This is to affirm that

Reagan Johnson

has satisfied the requirements to be designated as a

CERTIFIED FLAGGER

Expiration Date 03-18-23 State Issued in LA

Instructor Signature

Verification available by calling 1-877-642-4637 or at http://www.flagger.com

The American Traffic Safety Services Association

Hereby recognizes that

Cody Lemoine

has attended

Traffic Control Supervisor Refresher-LA State Specific Training Course

02/02/2018
Date

Baton Rouge, LA
Location

ATSSA
SAFER ROADS SAVE LIVES

Donna M. Clark
Training & Products Dept. Director

Ryan A. Wertz
President, CEO

This certificate acknowledges that

Cody M. Lemoine

Arcadis

was certified as a Comtrain 4th ED R17 In-House Instructor for Authorized & Competent Climber/Rescuer on 10/30/2018

in

Austin, TX

Certificate # 18896-106970-21

Shayne Campbell

Comtrain Authorized Signature

Certification expires 24 months from date of training

This certificate acknowledges that

Cody M. Lemoine of

Arcadis

was certified as a Competent Climber/Rescuer on 10/30/2018

In Austin, TX

Comtrain Certificate

18896-106969-44

Shayne Campbell

Comtrain Instructor

Certification expires 24 months from date of training

COMTRAIN

IN-HOUSE INSTRUCTOR

As per the Authorized Trainer Agreement for Certified Instructors of Comtrain's "Tower Climbing Safety and Rescue Course"

(RE-CERTIFICATION REQUIRED EVERY 24 MONTHS)

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4th Edition

COMTRAIN

Tower Climbing Safety & Rescue Advanced Course Certification Card

(RE-TRAINING REQUIRED EVERY 24 MONTHS)

COMPETENT CLIMBER & RESCUER

www.comtrainusa.com

512-275-6600

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4th Edition

COMTRAIN

CODY M. LEMOINE

Is Certified as an "In-House Instructor" of Comtrain's "Authorized & Competent Tower Climbing Safety and Rescue" Course for

ARCADIS

Certified
10/30/2018
in
AUSTIN, TX

Shayne Campbell
Comtrain Authorized Representative

www.comtrainusa.com
512-275-6600

Certificate #: 18896-106970-21

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Certificate of Completion

This is to certify that

Cody Lemoine

has completed

NFPA 70E: Standard for Electrical Safety in the Workplace 2017-18

Completion Date 02/26/2019

Course Duration 4.0

Certificate # 000015380357

360training.com

6801 N Capital of Texas Hwy, Bldg I, Suite 250 ♦ Austin, TX 78731 ♦ 877.881.2235 ♦ www.360training.com

CERTIFICATE OF ACHIEVEMENT

is hereby granted to

MR. CODY LEMOINE

To certify satisfactory completion of the RTMS Traffic Detector Technical Training course as presented by

IMAGE SENSING SYSTEMS, INC.

Andrew Thoms
Sales Engineer Manager

19-Jan-16
Date

ImageSensing systems

Precision decisions.

The American Traffic Safety Services Association

Hereby recognizes that

Justin Gaspard

has attended

Traffic Control Supervisor-LA State Specific

Training Course

7/11/2019 to 7/12/2019
Date

New Orleans, LA
Location

ATSSA
SAFER ROADS SAVE LIVES

Jessica Schneider
Training & Products Dept. Director

Ryan A. Wentz
President, CEO

The American Traffic Safety Services Association

Hereby recognizes that

Justin Gaspard

has attended

Traffic Control Technician-LA State Specific

Training Course

7/10/2019 to 7/10/2019
Date

New Orleans, LA
Location

ATSSA
SAFER ROADS SAVE LIVES

Jessica Schneider
Training & Products Dept. Director

Ryan A. Wentz
President, CEO

ATSSA TRAINED

PROOF OF TRAINING

THIS CERTIFICATE HEREBY RECOGNIZES THAT

Joshua Daigrepout

has attended

Traffic Control Supervisor Refresher-LA State Specific

Training Course

11/12/2021 to 11/12/2025
Training Valid Through

Baton Rouge, LA
Location

Director of Training

President, CEO

ATSSA provides training and certification but neither constitutes employment by ATSSA.

American Traffic Safety Services Association ATSSA.com

CERTIFIED PUBLIC SAFETY TECHNICIAN
IMSA

597 Haverty Court, Suite 100
Rockledge, FL 32955
321-392-0500 www.IMSAsafety.org

Name: Joshua Todd Daigrepont
IMIS ID: 127521
Section: Southwestern
Signature:

Conforms to PennDOT Pub 408 Section 901.3(y)

Certification and Expire Date

Traffic Signal Field Technician Level II - 9/18/2022
Traffic Signal Technician Level I - 9/18/2022

COMTRAIN

Tower Climbing Safety & Rescue
Basic Course Certification Card
(RE-TRAINING REQUIRED EVERY 24 MONTHS)

AUTHORIZED CLIMBER & RESCUER

www.comtrainusa.com
512-275-6600

Copyright © ComTrain Texas, LLC

4th Edition

This certificate acknowledges that
Joshua T. Daigrepont of
Arcadis
was certified as an Authorized
Climber/Rescuer on
5/28/2020 in
Butte La Rose, LA

Certificate #
22540-57481-57
Cody Lemoine
Comtrain Certified Instructor
Certification expires 24 months from the date of training.

Transportation Professional Certification Board Inc.

certifies that

Akhilendra Singh Chauhan

has met all of the requirements established by the Certification Board to use the title of

PROFESSIONAL TRAFFIC OPERATIONS ENGINEER

Unless withdrawn by the Certification Board this certificate number 2544 issued in Washington, D.C. is subject to the provisions for renewal

November 24, 2008

Steven D. Hofener
Chair

PTOE
PROFESSIONAL TRAFFIC OPERATIONS ENGINEER

Executive Director

Cut Here

LOUISIANA PROFESSIONAL ENGINEERING & LAND SURVEYING BOARD (LAPELS)
9643 Brookline Avenue, Suite 121
Baton Rouge, LA 70809
Phone (225) 925-6291
www.lapels.com

Mr. Akhilendra Singh Chauhan

License/Certificate Type - Number	Expiration Date
PE.0033703	09/30/2022

Status: Active

Fold Here

Please be advised that your license must be in "Active" status in order for you to (a) provide or offer to provide engineering or land surveying services in Louisiana or (b) use the words "engineer", "engineering", "land surveyor", "land surveying" or any modification or derivative thereof in your name or in connection with your business or activities in Louisiana. Licensees whose licenses are in "Retired", "Inactive", or "Expired" status are prohibited from engaging in the activities described above in items (a) and (b).

LA R. S. 37:689 requires firms practicing or offering to practice engineering or land surveying in the state of Louisiana to be licensed by the Board prior to offering such services.

Print and keep the following information for your record or verification. The pocket card may also be printed on card stock or laminated to keep with you as license/certificate verification.

Project Management Institute

THIS IS TO CERTIFY THAT

Akhilendra S Chauhan

HAS BEEN FORMALLY EVALUATED FOR DEMONSTRATED EXPERIENCE, KNOWLEDGE AND SKILLS TO LEAD AND DIRECT PROJECT TEAMS AND IS HEREBY BESTOWED THE GLOBAL CREDENTIAL

Project Management Professional

IN TESTIMONY WHEREOF, WE HAVE SUBSCRIBED OUR SIGNATURES UNDER THE SEAL OF THE INSTITUTE.

Beth Partleton · Chair, Board of Directors

Mark A. Langley · President and Chief Executive Officer

PROJECT MANAGEMENT INSTITUTE CORPORATE SEAL 1969 PENNSYLVANIA

PMP® Number **1444676**

PMP® Original Grant Date **16 August 2011**

PMP® Expiration Date **15 August 2014**

PMI Project Management Institute

Transportation Professional Certification Board Inc.

certifies that

Akhilendra Singh Chauhan

has met all of the requirements established by the Certification Board to use the title of

PROFESSIONAL TRANSPORTATION PLANNER

Unless withdrawn by the Certification Board, this certificate number 246 issued in Washington, D.C. is subject to the provisions for renewal

December 1, 2009

Steven D. Hofener
Chair

PTP PROFESSIONAL TRANSPORTATION PLANNER

Executive Director

Certificate of Completion

presented to

Akhil Chauhan

for completing the

Traffic Engineering Analysis Process & Report
Module 1

Date: June 4, 2018
Location: Baton Rouge, Louisiana

Professional Development Hours (PDHs) Awarded: 4

Authorized Instructor | *Authorized Instructor* | *Authorized instructor*

DOTD
LOUISIANA DEPARTMENT OF TRANSPORTATION & DEVELOPMENT

Certificate of Completion

presented to

Akhil Chauhan

for completing the

Traffic Engineering Analysis Process & Report
Module 2

Date: June 11, 2018
Location: Baton Rouge, Louisiana

Professional Development Hours (PDHs) Awarded: 4

Authorized Instructor | *Authorized Instructor* | *Authorized instructor*

DOTD
LOUISIANA DEPARTMENT OF TRANSPORTATION & DEVELOPMENT

Certificate of Completion

presented to

Akhil Chauhan

for completing the

Traffic Engineering Analysis Process & Report
Module 3

Date: September 10, 2018
Location: Baton Rouge, Louisiana

Professional Development Hours (PDHs) Awarded: 3

Authorized Instructor | *Authorized Instructor* | *Authorized instructor*

DOTD
LOUISIANA DEPARTMENT OF TRANSPORTATION & DEVELOPMENT

Certificate of Completion

FIBER INSTRUMENT SALES, INC.

Advanced Fiber Optic Training Course

This certifies that

Jeff Jones

has successfully completed the
Fiber Instrument Sales, Inc.
Advanced Fiber Optic Training Course
on June 9th , 2011.

BICSI CECs
RCDD - 5
Installer - 5
Technician - 5
Certified Trainer - 5

John C. Bruno
Training Specialist

ATSSA

AMERICAN TRAFFIC SAFETY SERVICES ASSOCIATION

SLOW

This is to affirm that

JEFF JONES

has satisfied the requirements to be designated as a

REGISTERED FLAGGER

Expiration Date 8-17-24 State Issued in LA

Application available by calling 1-877-642-4867 or at http://www.flagger.com

---

Helios

COHU HD

CERTIFICATE

Jeffery Jones

Of ARCADIS US, INC

IS A

Cohu Electronics Certified

Installer

Closed-Circuit Television CCTV

Date Certified: April 13, 2015

William McPheeters Service Manager

Certificate of Completion

FIBER INSTRUMENT SALES, INC.

Fiber Optic Training Course

This certifies that

Jeff Jones

has successfully completed the
Fiber Instrument Sales, Inc.
Fiber Optic Training Course
on June 8th , 2011.

BICSI CECs:
RCDD - 6
Installer - 6
Technician - 6
Certified Trainer - 6

John C. Bruno
Training Specialist

CERTIFIED PUBLIC SAFETY TECHNICIAN
IMSA

Jeff A. Jones

is hereby certified as a

Traffic Signal Technician Level I

by completing all requirements and examination for certification
on 8/23/2021

Valid thru 8/23/2024
Certification #AA_112604

CERTIFIED PUBLIC SAFETY TECHNICIAN
IMSA

Jeff A. Jones

is hereby certified as a

Traffic Signal Field Technician Level II

by completing all requirements and examination for certification
on 8/23/2021

Valid thru 8/23/2024
Certification #BE_112604

State of Louisiana

State Licensing Board for Contractors

This is to Certify that: ARCADIS U.S., INC
Attn: Kim Lasnicki
110 West Fayette St., Suite 300
Syracuse, NY 13202

is duly licensed and entitled to practice the following classifications

ELECTRICAL WORK (STATEWIDE); SPECIALTY: HAZARDOUS MATERIALS SITE REMEDIATION; SPECIALTY: SIGNS, SCOREBOARDS, DISPLAYS, BILLBOARDS (ELECTRICAL & NON-ELECTRICAL); SPECIALTY: TELECOMMUNICATIONS; SPECIALTY: TELECOMMUNICATIONS (EXCLUDING PROPERTY PROTECTION AND LIFE SAFETY SYSTEMS); SPECIALTY: TOWER CONSTRUCTION

STATE OF LOUISIANA UNION JUSTICE CONFIDENCE

Witness our hand and seal of the Board dated,
Baton Rouge, LA 21st day of June 2016

Director Chairman Treasurer

Expiration Date: June 20, 2019

License No: 34050

This License Is Not Transferrable

UNITED STATES OF AMERICA XI

DEPARTMENT OF TRANSPORTATION • FEDERAL AVIATION ADMINISTRATION

IV NAME
JEFFERY ALAN JONES

V ADDRESS [redacted]

VI NATIONALITY USA

SEX	HEIGHT	WEIGHT	HAIR	EYES
M	72	205	BROWN	BROWN

IVa D.O.B. [redacted]

IX HAS BEEN FOUND PROPERLY QUALIFIED TO EXERCISE THE PRIVILEGES OF

II REMOTE PILOT

III CERTIFICATE NUMBER 4411792

X DATE OF ISSUE 30 JUL 2020

XIV

VIII ADMINISTRATOR

Training Certificate

P R E S E N T E D T O

Jeff Jones

for successful completion of a webinar presentation on

Traffic Controller (Naztec TS1 & TS2) and Streetwise Training Course

September 5, 2013

8 PDH's

Michael Trueblood, PE, PTOE
Facilitator

Trafficware UNIVERSITY

LAPELS Continuing Professional Development Provider - CPD.0000281

OSHA Occupational Safety and Health Administration

36-005330879

This card acknowledges that the recipient has successfully completed a 10-hour Occupational Safety and Health Training Course in **Construction Safety and Health**

JEFF JONES

Marie Athey
(Trainer name – print or type)

6/16/2015
(Course end date)

The American Traffic Safety Services Association

Hereby recognizes that

Jeff Jones
has attended
Traffic Control Design Specialist - 1 day
Training Course

06/22/2015
Date

Baton Rouge, LA
Location

Training & Products Dept. Director

President, CEO

ATSSA
SAFER ROADS SAVE LIVES

ATSSA TRAINED

PROOF OF TRAINING

THIS CERTIFICATE HEREBY RECOGNIZES THAT

Jeff Jones
has attended
Traffic Control Supervisor Refresher-LA State Specific
Training Course

1/25/2022 to 1/25/2026
Training Valid Through

Baton Rouge, LA
Location

Director of Training

President, CEO

ATSSA provides training and certification but neither constitutes employment by ATSSA.

This certificate provides proof of training, not certification.

ATSSA America's Traffic Safety Services Association ATSSA.com

LOUISIANA PROFESSIONAL ENGINEERING AND LAND SURVEYING BOARD

As of 6/10/2022 the Louisiana Professional Engineering and Land Surveying Board (LAPELS) has the following information on file:

Cut Here

LOUISIANA PROFESSIONAL ENGINEERING & LAND SURVEYING BOARD (LAPELS)
9643 Brookline Avenue, Suite 121
Baton Rouge, LA 70809
Phone (225) 925-6291
www.lapels.com

Ms. Laura Evans Hartley

License/Certificate Type - Number	Expiration Date
PE.0039030	09/30/2022

Status: Active

Fold Here

Please be advised that your license must be in "Active" status in order for you to (a) provide or offer to provide engineering or land surveying services in Louisiana or (b) use the words "engineer", "engineering", "land surveyor", "land surveying" or any modification or derivative thereof in your name or in connection with your business or activities in Louisiana. Licensees whose licenses are in "Retired", "Inactive", or "Expired" status are prohibited from engaging in the activities described above in items (a) and (b).

LA R. S. 37:689 requires firms practicing or offering to practice engineering or land surveying in the state of Louisiana to be licensed by the Board prior to offering such services.

Print and keep the following information for your record or verification. The pocket card may also be printed on card stock or laminated to keep with you as license/certificate verification.

Disclaimer
All information provided by LAPELS on this web page, and on its other web pages and internet sites, is made available to provide immediate access for the convenience of interested persons. While LAPELS believes the information to be reliable, human or mechanical error remains a possibility, as does delay in the posting or updating of information. Therefore, LAPELS makes no guarantee as to the accuracy, completeness, timeliness, currency, or correct sequencing of the information. Neither LAPELS, nor any of the sources of the information, shall be responsible for any errors or omissions, or for the use or results obtained from the use of this information. Other specific cautionary notices may be included on other web pages maintained by LAPELS.

LOUISIANA PROFESSIONAL ENGINEERING AND LAND SURVEYING BOARD

As of 6/10/2022 the Louisiana Professional Engineering and Land Surveying Board (LAPELS) has the following information on file:

Cut Here

LOUISIANA PROFESSIONAL ENGINEERING & LAND SURVEYING BOARD (LAPELS)
9643 Brookline Avenue, Suite 121
Baton Rouge, LA 70809
Phone (225) 925-6291
www.lapels.com

Mr. Ranzy Loedward Whiticker

License/Certificate Type - Number	Expiration Date
PE.0034132	03/31/2023

Status: Active

Fold Here

Please be advised that your license must be in "Active" status in order for you to (a) provide or offer to provide engineering or land surveying services in Louisiana or (b) use the words "engineer", "engineering", "land surveyor", "land surveying" or any modification or derivative thereof in your name or in connection with your business or activities in Louisiana. Licensees whose licenses are in "Retired", "Inactive", or "Expired" status are prohibited from engaging in the activities described above in items (a) and (b).

LA R. S. 37:689 requires firms practicing or offering to practice engineering or land surveying in the state of Louisiana to be licensed by the Board prior to offering such services.

Print and keep the following information for your record or verification. The pocket card may also be printed on card stock or laminated to keep with you as license/certificate verification.

Disclaimer
All information provided by LAPELS on this web page, and on its other web pages and internet sites, is made available to provide immediate access for the convenience of interested persons. While LAPELS believes the information to be reliable, human or mechanical error remains a possibility, as does delay in the posting or updating of information. Therefore, LAPELS makes no guarantee as to the accuracy, completeness, timeliness, currency, or correct sequencing of the information. Neither LAPELS, nor any of the sources of the information, shall be responsible for any errors or omissions, or for the use or results obtained from the use of this information. Other specific cautionary notices may be included on other web pages maintained by LAPELS.

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LOUISIANA PROFESSIONAL ENGINEERING & LAND SURVEYING BOARD (LAPELS)
9643 Brookline Avenue, Suite 121
Baton Rouge, LA 70809
Phone (225) 925-6291
www.lapels.com

Mr. Thomas Jude Montz Jr.

License/Certificate Type - Number	Expiration Date
PE.0039128	09/30/2022

Status: Active

Fold Here

Please be advised that your license must be in "Active" status in order for you to (a) provide or offer to provide engineering or land surveying services in Louisiana or (b) use the words "engineer", "engineering", "land surveyor", "land surveying" or any modification or derivative thereof in your name or in connection with your business or activities in Louisiana. Licensees whose licenses are in "Retired", "Inactive", or "Expired" status are prohibited from engaging in the activities described above in items (a) and (b).

LA R. S. 37:689 requires firms practicing or offering to practice engineering or land surveying in the state of Louisiana to be licensed by the Board prior to offering such services.

Print and keep the following information for your record or verification. The pocket card may also be printed on card stock or laminated to keep with you as license/certificate verification.

Transportation Professional Certification Board, Inc.

certifies that

Thomas Jude Montz, Jr.

has met all of the requirements established by the Certification Board to use the title of

Professional Traffic Operations Engineer

unless withdrawn by the Certification Board and subject to the provisions for renewal.
Certificate number 4093 issued in Washington, DC, USA
7/18/2016

Kenneth W. Ackeret
Chair

PTOE
PROFESSIONAL TRAFFIC OPERATIONS ENGINEER
TRANSPORTATION PROFESSIONAL CERTIFICATION BOARD, INC.

Jeffrey F. Paniati
Executive Director

Certificate of Completion

presented to

Thomas Montz

for completing the

Traffic Engineering Analysis Process & Report
Module 1

Date: July 16, 2018
Location: Baton Rouge, Louisiana

Professional Development Hours (PDHs) Awarded: 2

Authorized Instructor | *Authorized Instructor* | *Authorized instructor*

DOTD
LOUISIANA DEPARTMENT OF TRANSPORTATION & DEVELOPMENT

Certificate of Completion

presented to

Thomas Montz

for completing the

Traffic Engineering Analysis Process & Report
Module 2

Date: July 23, 2018
Location: Baton Rouge, Louisiana

Professional Development Hours (PDHs) Awarded: 3

Authorized Instructor | *Authorized Instructor* | *Authorized instructor*

DOTD
LOUISIANA DEPARTMENT OF TRANSPORTATION & DEVELOPMENT

Certificate of Completion

presented to

Thomas Montz

for completing the

Traffic Engineering Analysis Process & Report
Module 3

Date: December 3, 2018
Location: Baton Rouge, Louisiana

Professional Development Hours (PDHs) Awarded: 3

Authorized Instructor | *Authorized Instructor* | *Authorized instructor*

DOTD
LOUISIANA DEPARTMENT OF TRANSPORTATION & DEVELOPMENT

The American Traffic Safety Services Association

Hereby recognizes that

Elun Hsu

has attended

Traffic Control Technician-LA State Specific

Training Course

02/07/2017
Date

Baton Rouge, LA
Location

ATSSA
SAFER ROADS SAVE LIVES

Donna M. Clark
Training & Products Dept. Director

Ryan A. Wentz
President, CEO

The American Traffic Safety Services Association

Hereby recognizes that

Elun Hsu

has attended

Traffic Control Supervisor-LA State Specific

Training Course

02/08/2017
Date

Baton Rouge, LA
Location

ATSSA
SAFER ROADS SAVE LIVES

Donna M. Clark
Training & Products Dept. Director

Ryan A. Wentz
President, CEO

ATSSA
SAFER ROADS SAVE LIVES

AMERICAN TRAFFIC SAFETY SERVICES ASSOCIATION

SLOW

This is to affirm that

PAUL HSU

has satisfied the requirements to be designated as a

REGISTERED FLAGGER

Expiration Date Feb. 9, 2021 *State Issued in* LA

Instructor Signature

Verification available by calling 1-877-642-4632 or at http://www.flagger.com

AACE INTERNATIONAL

This certifies that

Eric Schatz

having given satisfactory evidence of qualifications
and fitness, is hereby certified as a

Certified Forensic Claims Consultant

Originally certified: December 3, 2021 ▪ Certificate Number: 00121

Debra L. Lally, CAE
Executive Director/CEO

COUNCIL OF ENGINEERING AND SCIENTIFIC SPECIALTY BOARDS
CESB
1990

Charles E. Bolyard, Jr., CFCC PSP FAACE Hon. Life
Chair, Certification Board

Issue Date December 3, 2021
In Witness Whereof Our Hand and Seal
This Certificate Expires: December 3, 2024
AACE ID: 66376

AACE CERTIFIED

AASHTO ACCREDITED

CERTIFICATE OF ACCREDITATION

AMERICAN ASSOCIATION OF STATE HIGHWAY AND TRANSPORTATION OFFICIALS
AASHTO

APS Design and Testing, L.L.C.

in

Baton Rouge, Louisiana, USA

has demonstrated proficiency for the testing of construction materials and has conformed to the requirements established in AASHTO R 18 and the AASHTO Accreditation policies established by the AASHTO Committee on Materials and Pavements.

The scope of accreditation can be viewed on the Directory of AASHTO Accredited Laboratories (aashtoresource.org).

Jim Tymon,
AASHTO Executive Director

Moe Jamshidi,
AASHTO COMP Chair

This certificate was generated on 01/29/2020 at 9:37 AM Eastern Time. Please confirm the current accreditation status of this laboratory at aashtoresource.org/aap/accreditation-directory

SCOPE OF AASHTO ACCREDITATION FOR:

APS Design and Testing, L.L.C.
in Baton Rouge, Louisiana, USA

Quality Management System

Standard:	Accredited Since:
R18 Establishing and Implementing a Quality System for Construction Materials Testing Laboratories	08/19/2019

This certificate was generated on 01/29/2020 at 9:37 AM Eastern Time. Please confirm the current accreditation status of this laboratory at aashtoresource.org/aap/accreditation-directory

SCOPE OF AASHTO ACCREDITATION FOR:

APS Design and Testing, L.L.C.

in Baton Rouge, Louisiana, USA

Soil

Standard:	Accredited Since:
T100 Specific Gravity of Soils	08/19/2019
D421 Dry Preparation of Disturbed Soil and Soil Aggregate Samples for Test	08/19/2019
D422 Particle Size Analysis of Soils by Hydrometer	**Suspended**
D698 The Moisture-Density Relations of Soils Using a 5.5 lb [2.5 kg] Rammer and a 12 in. [305 mm] Drop	08/19/2019
D1140 Amount of Material in Soils Finer than the No. 200 (75-µm) Sieve	08/19/2019
D1557 Moisture-Density Relations of Soils Using a 10 lb [4.54 kg] Rammer and an 18 in. [457 mm] Drop	08/19/2019
D2166 Unconfined Compressive Strength of Cohesive Soil	08/19/2019
D2216 Laboratory Determination of Moisture Content of Soils	08/19/2019
D2435 One-Dimensional Consolidation Properties of Soils Using Incremental Loading	08/19/2019
D2850 Unconsolidated, Undrained Compressive Strength of Cohesive Soils in Triaxial Compression	08/19/2019
D4318 Determining the Liquid Limit of Soils (Atterberg Limits)	08/19/2019
D4318 Plastic Limit of Soils (Atterberg Limits)	08/19/2019
D4546 One-Dimensional Swell or Settlement Potential of Cohesive Soils	08/19/2019

This certificate was generated on 01/29/2020 at 9:37 AM Eastern Time. Please confirm the current accreditation status of this laboratory at aashtoresource.org/aap/accreditation-directory

MTC
MATERIALS TESTING CENTER

USACE CERTIFICATE OF LABORATORY VALIDATION

APS

1645 Nicholson Drive
Baton Rouge, LA,
Sergio Aviles
(225) 456-5714

has demonstrated, by abbreviated audit of its AASHTO accreditation, or by inspection of required records, equipment, procedures, facilities, and/or final reports, its proficiency to perform testing of construction materials, as established by the quality standards of AASHTO R 18 guidance and the requirements of the applicable ASTM standards.

THIS USACE CERTIFICATE OF LABORATORY VALIDATION IS ACCURATE AS OF ITS DATE AND TIME OF GENERATION:
09 MAY 2022 AT 15:40 HOURS

ALL METHODS LISTED ON THIS CERTIFICATE OF VALIDATION WILL EXPIRE ON 12/01/2023

PLEASE CONFIRM THE CURRENT VALIDATION STATUS OF THIS LABORATORY USING THE SEARCH FEATURE ON OUR PUBLIC WEBSITE: https://mtc.erdc.dren.mil

Chad A. Gartrell, PE, Director
USACE Materials Testing Center
Vicksburg, Mississippi, USA

SOILS

Soils - D 422 - Req - Particle Size Analysis
Soils - D 698 - Req - Compaction Characteristics by Standard Effort
Soils - D 854 - Req - Specific Gravity of Soils
Soils - D 1140 - Req - Material Finer than 75 m (No. 200) Sieve
Soils - D 2216 - Req - Water Content
Soils - D 2435 - Req - One-Dimensional Consolidation Properties
Soils - D 2487 - Req - Classification of Soils
Soils - D 2488 - Req - Description & Identification of Soils (Visual-Manual Procedure)
Soils - D 2850 - Req - Unconsolidated, Undrained Strength in Triaxial Compression
Soils - D 2974 - Req - Moisture, Ash, & Organic Matter of Peat & Other Organic Soils
Soils - D 3080 - Req - Direct Shear Test in Consolidated Drained Conditions

CERTIFICATE IS AWARDED TO

SERGIO AVILES

Has successfully completed a flagger training course meeting the requirement of the

LOUISIANA DEPARTMENT OF TRANSPORTATION & DEVELOPMENT

on the following date

SEP 07, 2018

Valid for 4 years from completion date.

Expires SEP 07, 2022

This temporary/backup certificate is valid with a government issued photo ID.

Verify this certificate against the information online use the code below to view or print duplicate certificates

1253-1061-25541

Enter the code to verify this certificate is an original at

https://process.onlineflagger.com/duplicate

LOUISIANA ASSOCIATED GENERAL CONTRACTORS, INC.
666 North Street – Baton Rouge, LA 70802
Phone: 225/344-0432 * Fax: 225/344-0458
www.lagc.org

January 7, 2019

To Whom It May Concern,

This is to verify that the below listed employee of APS Engineering & Testing has completed LADOTD required ATSSA traffic control training. We are currently awaiting the results of his exam.

LA Specific Traffic Control Supervisor Refresher – December 7, 2018 – Sergio Aviles

If there are any questions regarding this issue, please contact Mr. Barry Lacy, P.E. of LADOTD at Headquarters in Baton Rouge, LA (225-379-1584) or Michael Demouy at the above captioned address.

Best Regards,

Michael Demouy – LAGC Manager

The American Traffic Safety Services Association

Hereby recognizes that

Paul Fulcher

has attended

Traffic Control Technician-LA State Specific

Training Course

07/24/2018
Date

Baton Rouge, LA
Location

Training & Products Dept. Director

President, CEO

SAFER ROADS SAVE LIVES

21. QA/QC Plan and/or Work Plan:

If the advertisement requires submission of a QA/QC plan or Work plan, include them here. Otherwise, leave this section blank.

Sections 22-23

Arcadis provided superior project management throughout the duration of the project and exceeded my expectations. Arcadis provided the project schedule, weekly and monthly status reports regarding completed and scheduled work in a timely manner.
Their invoices are on-time and with almost no errors (invoices are extremely large and complicated). Exceptional performance in communications, cooperation, and follow-up with all stakeholders."

- Erik Smith, LADOTD ITS ME&I Project Manager

Arcadis inspector documenting DMS cantilever truss nigh time installation New Orleans DMS.

22: Sub-consultant information

If one or more sub-consultants will be used, provide the name, address, point of contact and phone number for each. Otherwise, leave this section blank.

Firm Name (as registered with Louisiana's Secretary of State)	Address	Point of Contact and email address	Phone Number
GEC	8282 Goodwood Blvd. Baton Rouge, LA 70806	Brian Buckel, P.E. bbuckel@gecinc.com	225 612 4260
APS Engineering and Testing (DBE/SBE)	1645 Nicholson Drive, BR, LA 70802	Sergio Aviles sergio@aps-testing.com	225 456 5714

(Add rows as needed)

23. Location:

If location is an evaluation criterion for this advertisement and the prime consultant intends to establish a local presence, describe the plan for doing so. Otherwise, leave this section blank.

Arcadis
10352 Plaza Americana Drive
Baton Rouge, LA 70816
T 225 292 1004
www.arcadis.com

www.arcadis.com
Arcadis
Arcadis North America
@ARCADIS_US