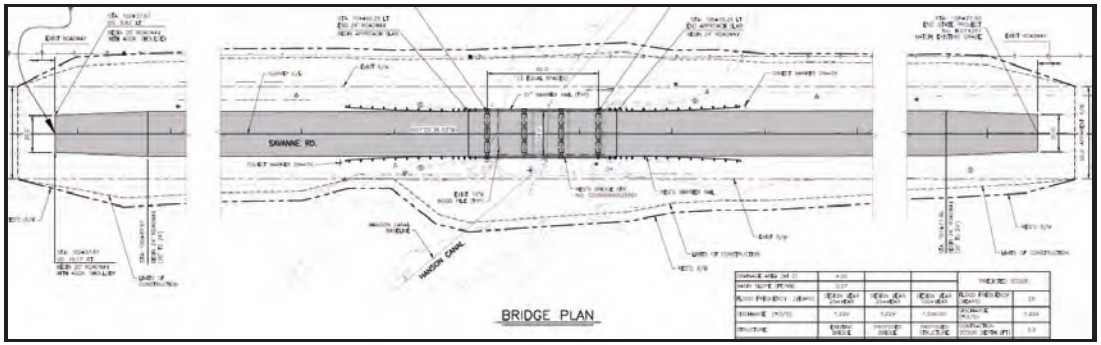
Contract for Off System Highway Bridge Program
Contract No. 4400025053

Infinity Engineering Consultants
Civil ∞ Structural ∞ Mechanical ∞ Electrical



Contract for Off System
Highway Bridge Program
Patricia Street Over
Chalmette Vista Canal

Contract No. 4400025053

Statement of Qualifications

Infinity Engineering Consultants, LLC.
4001 Division Street
Metairie, LA 70002

P: 504.304.0548
F: 504.355.0265

Raoul V. Chauvin, III, P.E.
Principal-in-Charge
rchauvin@infinityec.com

December 21, 2022

Infinity Engineering Consultants

Letter of Interest

Louisiana Registered Engineering Firm Number

Infinity Engineering Consultants, LLC.
EF. 0001309

Office Location

4001 Division Street
Metairie, LA 70002
p. (504) 304-0548

Contact Persons

Raoul V. Chauvin, III, P.E.
Principal Partner
rchauvin@infinityec.com

William J. Thomassie, P.E.
Principal Partner
wthomassie@infinityec.com

December 21, 2022

Department of Transportation & Development
Consultant Contracts Services
1201 Capitol Access Road, Room 405-E
Baton Rouge, LA 70802
DOTDConsultantAds80@la.gov

Re: Off System Highway Bridge Program Patricia Street Over Vista Canal Contract No. 4400025053

With reference to the above stated project, Infinity Engineering Consultants, LLC is pleased to present our statement of qualifications. Upon thoroughly reading the request for qualifications, we believe Infinity's team of engineers and designers meet and exceed the necessary qualifications to develop the preliminary engineering plans to replace an off-system bridge along Patricia Street over Chalmette Vista Canal in Chalmette, Louisiana.

Firm Qualifications and Understanding of Scope

Infinity Engineering Consultants is a Metairie, Louisiana based firm, located only twenty-five minutes from the proposed bridge site, that provides multi-disciplinary engineering services to both the public and private sectors. As a multi-discipline firm, comprising of civil, structural, mechanical, and electrical engineering, our firm is equipped to provided complete engineering design, from conception to commissioning, on transportation related projects.

Infinity's staff currently includes: (4) Structural Engineers, (6) Civil Engineers, (4) Electrical Engineers, (4) Mechanical Engineers, and (4) Resident Inspectors, all supported by (9) designers and drafters. Despite the recent periods of economic uncertainty, Infinity has been able to steadily expanded the company's staff and resources to better meet our clients' engineering consulting needs.

Across Infinity's 18-year company history, we hold extensive experience working with public agencies in the project manager role of prime consultant. Currently, we are enjoying a collaborative working relationship with the Louisiana Department of Transportation & Development as we are working to complete structural engineering designs for two off-system bridge replacement projects. Infinity has recently entered the construction bidding phase on two vehicular bridge projects, one for the City of Slidell on Magnolia Street and the other for vehicular access to a wharf at the Plaquemines Port. Additionally, we are approaching the end of the construction phase for one new vehicular bridge at Alvin Calendar Airfield in Belle Chasse, LA, as well as a water intake structure with vehicular bridge access in Plaquemine, LA. These project experiences make our team uniquely qualified for this project, as we not only hold the experience of designing DOTD off-system bridges, but also designing for the soil conditions found across Louisiana.

Infinity is proud of our reputation as being honest, reliable, and capable. As such, we have provided within our approach and methodology section snippets of reference letters that attest our work ethic. Pertinent resumes and project examples for the entire team are contained in the following DOTD 24-102 form.

We steadfastly confirm the following:

- Infinity Engineering Consultants, LLC. is within good standing
- The proposed team meets all of the minimum personnel requirements
  - Raoul V. Chauvin, P.E. and William Thomassie, P.E. are Infinity's principal partners who are registered professional engineers in the State of Louisiana in civil engineering
  - Louis Jackson, P.E. and Rachel Kenney, P.E. are responsible members of the Infinity team who are currently registered in the State of Louisiana as a professional engineer in civil engineering.
  - Ricardo Contreras, P.E. will serve as the project manager and holds over five years of experience in responsible charge of bridge design as a registered professional engineer in the State of Louisiana
  - Gary J. Lambert, Jr., PLS is BFM Corporation's professional land surveyor registered in Louisiana with over five years of experience
  - Chad Turner is Matrix New World Engineering's environmental professional with at least five years of experience in wetlands delineation
- The firm holds all licenses necessary to legally provide the related services in the State of Louisiana
- The lead professional for each category is a licensed professional in that area with a minimum of 10 years of experience in the category in which they will be the person in responsible charge.
- Infinity Engineering has not had a record of substandard work
- Infinity Engineering has never engaged in any unethical behavior
- Infinity is a state-certified DBE and Hudson Initiative certificate holder.

Documents Enclosed

- Letter of Interest
- Infinity DOTD 24-102 form
- DBE Certificates

Closing

Infinity takes pride in the skill-sets we have provided to public agencies throughout the State of Louisiana, especially when it comes to rebuilding vital infrastructures within our communities. We are confident that we have assembled a team of engineers and support personnel that can effectively and efficiently prepare topographic surveys, wetland delineation, and engineering designs for this off-system bridge project. We respectfully request that the LADOTD select Infinity Engineering Consultants for this bridge design project so we can continue to work to improve our neighboring communities. If you have any questions or require additional information, please call me at (504) 304-0548.

By signing this letter, the Respondent certifies that the signatory is authorized to bind the Respondent and certifies the content of this letter.

Sincerely,

Raoul V. Chauvin, III, P.E.
Infinity Engineering Consultants, LLC

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 Off System Highway Bridge Program Patricia Street Over Chalmette Vista Canal**
2. Contract number(s) as shown in the advertisement	4400025053
3. State Project Number(s), if shown in the advertisement	H.015017.5 F.A.P No. H015017
4. Prime consultant name (as registered with the Louisiana Secretary of State where such registration is required by law)	**Infinity Engineering Consultants, LLC.**
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.0003109
6. Prime consultant mailing address	4001 Division Street Metairie, LA 70002
7. Prime consultant physical address (existing or to be established, if location is used as an evaluation criteria)	Not Applicable
8. Name, title, phone number, and email address of prime consultant's contract point of contact	Raoul V. Chauvin, III, P.E. Principal rchauvin@infinityec.com 504-304-0548
9. Name, title, phone number, and email address of the official with signing authority for this proposal	Raoul V. Chauvin, III, P.E.

	Principal rchauvin@infinityec.com 504-304-0548
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.	Signature (shall be the same person as #9):  Date: 12/21/2022
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): Infinity Engineering Consultant, LLC Firm(s)' %: 65%

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)

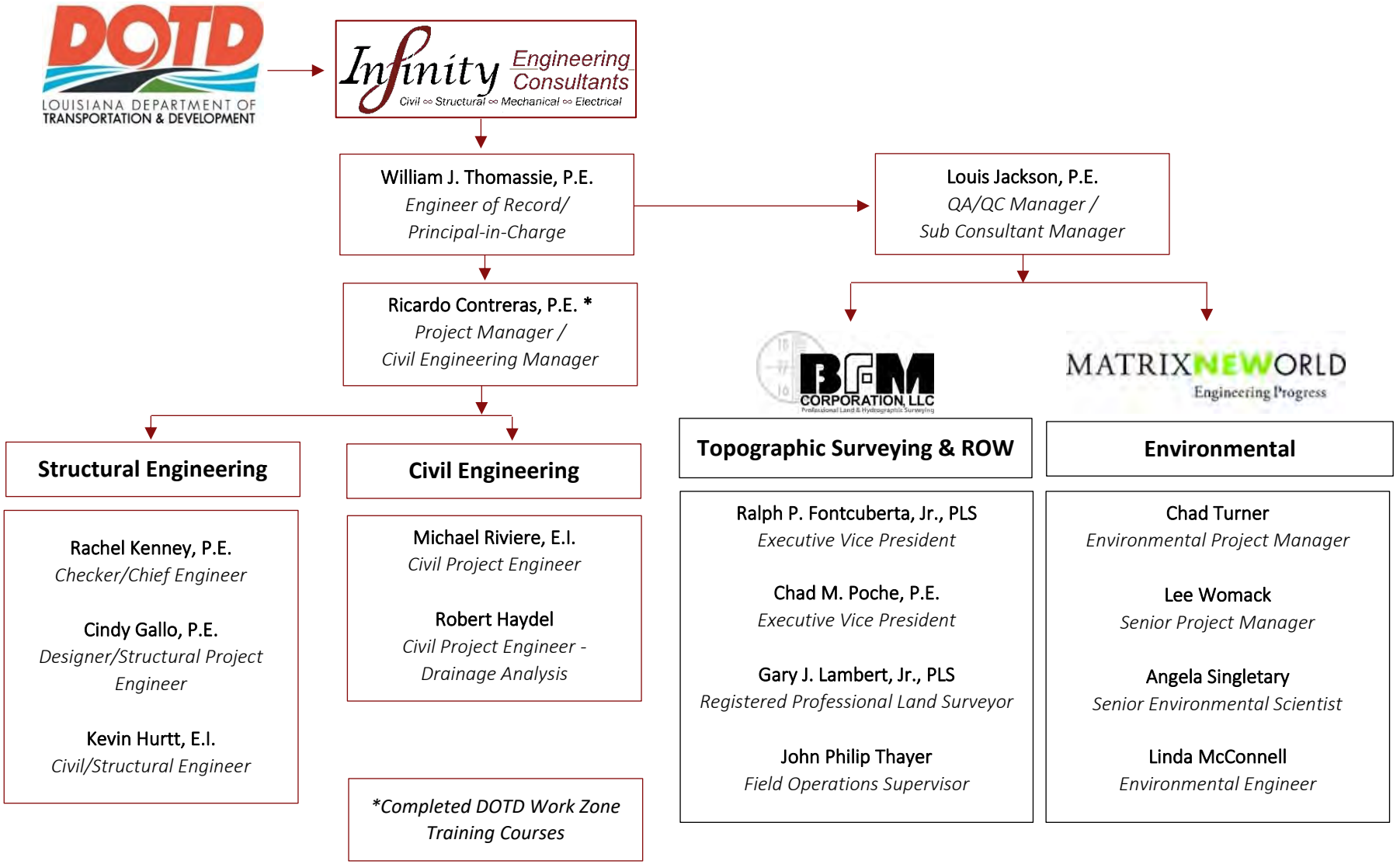
Evaluation Disciplines	% of Overall Contract	Infinity Engineering Consultants, LLC.	BFM Corporation, LLC.	Matrix New World Engineering	Firm D	Firm E	Firm F
Bridge	65%	100%	-	-			
Environmental	15%	-	-	100%			
Survey	10%	-	100%	-			
Right-of-Way	10%	-	100%	-			
Identify the percentage of work for the **overall contract** to be performed by the prime consultant and each sub-consultant.							
Percent of Contract	100%	65%	20%	15%			

 Prime consultant name: **Infinity Engineering Consultants, LLC.**

13. **Firm Size:**

Firm name	DOTD Job Classification	Number of personnel committed to this contract	Total number of personnel available in this DOTD Job Classification (if needed)
Infinity Engineering Consultants, LLC.	Principal	1	2
	Engineer	4	12
	Engineer Intern	1	5
	Drafter	1	3
	Designer	1	6
	Inspector - Bridge	1	3
	Project Office Manager	1	1
	Administrative	1	6
Matrix New World Engineering	Biologist/Wetlands	3	5
	Environmental Pro	2	7
BFM Corporation, LLC.	Administrative	1	3
	CADD-Operator	2	3
	Clerical	1	3
	Instrument Men	2	5
	Party Chief	2	4
	Principal	1	2
	Supervisor – Other	1	1
	Surveyor	2	2
	Technician	1	2

14. **Organizational Chart**:



 Prime consultant name: **Infinity Engineering Consultants, LLC.**

15. **Minimum Personnel Requirements:**

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	William J. Thomassie, P.E.	Infinity Engineering Consultants	Professional Engineer: No. 27421	LA	09/30/2023
2	Louis Jackson, P.E.	Infinity Engineering Consultants	Professional Engineer: No. 29314	LA	03/31/2023
3	Rachel Kenney, P.E.	Infinity Engineering Consultants	Professional Engineer: No. 37666	LA	09/30/2023
3	Ricardo Contreras, P.E.	Infinity Engineering Consultants	Professional Engineer: No. 28533	LA	09/30/2023
4	Ralph P. Fontcuberta, Jr., PLS	BFM Corporation, LLC.	Professional Land Surveyor No: 0004329	LA	09/30/2024
4	Gary J. Lambert, Jr., PLS	BFM Corporation, LLC.	Professional Land Surveyor No: 0005259	LA	03/31/2023
5	Chad Turner	Matrix New World Engineering	N/A	N/A	N/A
5	Lee Womack	Matrix New World Engineering	N/A	N/A	N/A
5	Angela Singletary	Matrix New World Engineering	N/A	N/A	N/A

16. **Staff Experience:**

Résumés shall be provided for all prime and sub-consultant personnel listed in Sections 14 and/or 15 of the proposal. Résumés of personnel not identified in Section 14 or Section 15 of the proposal should not be included and will not be evaluated. Résumés should be limited to 2 pages per person. Any certificates required by the advertisement are to be placed in Section 20.

Firm employed by	**Infinity Engineering Consultants, LLC.**			Meets MPR No. 1
Name	**William J. Thomassie, P.E.**		Years of relevant experience with this employer	18
Title	Principal		Years of relevant experience with other employer(s)	12
Degree(s) / Years / Specialization			Bachelor of Science / 1992 / Civil Engineering	
Active registration number / state / expiration date			No. 27421 / LA / 9/30/2023	
Year registered	1997	Discipline	Civil/Structural Engineering	
Contract role(s) / brief description of responsibilities			Engineer of Record/Principal-in-Charge As Principal Partner of Infinity Engineering Consultants, William J. Thomassie, P.E. is one of the registered Supervising Professionals for the firm and is responsible for the management of all engineering production. With many of Infinity's projects requiring up to $45,000,000 for installation or modifications, Mr. Thomassie's guidance and shaping of designs, along with construction support, has enabled project completion on schedule and with minimal adverse impact on commerce in the area. Additionally, Mr. Thomassie hold active professional engineering registration in fifteen states.	

Experience dates (mm/yy–mm/yy)	Experience and qualifications relevant to the proposed contract; *i.e.*, "designed drainage", "designed girders", "designed intersection", etc. Experience dates should cover the time specified in the applicable MPR(s).
10/2010 – 9/2012	**Entergy Evergreen Bridges –** Principal engineer for the design of two (2) vehicular bridges to replace aging timber bridges on the approach to Entergy's Evergreen Substation. Provided new bridge designs for steel reinforced piles, decking and reinforced retaining wall/abutment. Designs also included a load rating.
4/2020 – 3/2022	**Cornerstone Dock Damage Evaluation and Design -** Principal for the evaluation of damage caused by a ship collision with a dock and bridge on Cornerstone's site. Oversaw the collection of advanced measurements, including drone imagery, to assess the damages. Upon the completion of the surveying, a comprehensive analysis report was provided to Cornerstone, including cost estimation for repairs. Additionally, overseeing the completion of designs to repair dock and bridge.
4/2014 – 9/2017	**City of New Orleans Joe Brown Park Bridge Replacement –** Principal engineer for the design of the complete replacement of the Joe Brown Park Bridge. Infinity's condition inspection and bridge rating previously deemed the bridge needed replacement. The new bridge design also included a load rating.
3/2019 – Under Construction	**Regional Transit Authority Canal Street Ferry Terminal CMAR -** Principal for the engineering design of the demolition and redevelopment of the Canal Street Ferry Terminal on the Mississippi River in New Orleans for the RTA. The project includes the construction of a new terminal building, new bridge spanning (2) railroad tracks, reconfiguration of streetcar tracks, realignment of underground utilities, construction of a new wharf structure, and refurbishment and reconfiguration of a captive barge platform.

7/2006 – 7/2011	**Ollie Drainage Pumping Station Expansion and Bridge Design** - Principal for the Ollie Drainage District capacity evaluation and design project. Project included the evaluation of runoff characteristics for a 3,000-acre basin and the evaluation of the adequacy of an existing pumping station with 5 pumps. Project Manager for the design of the 600 cfs drainage stormwater pump station addition ($16,200,000 total construction cost). Responsible for overall project coordination and design. Supervised all civil and structural designs including deep foundations, concrete structures, steel building structures, dredging, vehicular bridges, roads, and canals.
4/2014 – 2/2015	**City of New Orleans Bridge Load Ratings –** Principal engineer for the structural analyses and load ratings for fourteen (14) off-system bridges around the City of New Orleans. The analyses determined that the majority of the bridges met the AASHTO load rating requirements, and proscribed remedial repairs or replacement for those that did not pass inspection.
3/2012 – 3/2012	**Scarsdale Bridge Rating –** Principal engineer for the engineering analysis and load rating of two bridges at the Plaquemines Parish Scarsdale Pumping Station. The inspection and analysis of the two (2) 25' wide x 150' timber pile foundation bridges with precast pre-stressed concrete decks were necessitated by a load rating for dump trucks using the site.
7/2016 – 9/2017	**City of New Orleans Bridge Inspections and Ratings –** Principal engineer for the field inspections and bridge load rating calculations of five (5) bridges throughout the City of New Orleans as a subconsultant to DEII.
6/2004 – 12/2004	**City of New Orleans Wisner Bridge Inspection –** Principal in charge for inspecting, evaluating, and reporting deficiencies in the 3/8-mile-long Wisner Bridge over I-610. The inspection was completed in accordance with LaDOTD requirements and a plan for rehabilitation was prepared.
11/2012 – 3/2021	**Mid-City Street Repairs and Repaving –** Principal Engineer for the identification and quantification of roadways, driveway aprons, sidewalks, curbs, and drainage structures repairs. Infinity developed a scoping report including the locations and justification of additional repairs for DPW to obtain funding from FEMA.
6/2011 – 5/2013	**City of Slidell Kostmayer Avenue Resurfacing and Drainage Improvements –** Lead Project Manager in the drainage design, material quantities, and cost estimating for the roadway repair and replacement design and all utility improvements. The project included the asphalt mill and overlay of 3,300 linear feet of street, including striping, drainage improvements, street alignment and handicap sidewalk ramps.
12/2009 – 9/2011	**City of New Orleans VA Medical Center Street Reconstruction** – Project Manager for the design of 3,000 lf of streets and utilities to correct deficiencies and support a new medical center.
3/2009 – 6/2011	**Louis Armstrong International Airport North Perimeter Road** – Project Manager for N. Perimeter Road at MSY Airport. The project includes the design of the new airport utility road extending approximately one mile around the facility.
8/2010 – 1/2013	**Regional Transit Authority Canal Street to UPT Streetcar Expansion** – Project Manager for the RTA expansion of the streetcar line, specifically involving the Loyola Avenue line that will connect Canal Street and the Union Passenger Terminal. Supervised construction drawings, record specifications, and identification of utility conflict and design.

Firm employed by	**Infinity Engineering Consultants, LLC.**		Meets MPR No. 2
Name	**Louis Jackson, P.E.**	Years of relevant experience with this employer	4
Title	Operations & Quality Control Manager	Years of relevant experience with other employer(s)	23

Degree(s) / Years / Specialization			Bachelor of Science / 2001 / Civil Engineering
Active registration number / state / expiration date			No. 29314 / Louisiana / 03/31/2023
Year registered	2001	Discipline	Civil/Structural Engineering
Contract role(s) / brief description of responsibilities			Quality Control Manager - Mr. Jackson has more than 25 years of engineering design, project management, and quality control experience. His project experience has led to expertise in the following areas: Subsurface Infrastructure; Stormwater Management; Grant and Program Management; Contract Negotiations; Multi-Disciplinary Project Team Leadership. As the Operations & QA/QC Manager, Mr. Jackson ensures all designs and deliverables achieve Infinity's high expectations of effective and efficient engineering.

7/19 – Ongoing Bidding Phase	**Magnolia Street Bridge –** Operations and Quality Control Manager for the replacement of Magnolia Street Bridge. Provided technical support and project coordination for the replacement of the existing bridge with a 2-4-ft x 6-ft reinforced aluminum box culvert and will replace approximately 60-LF of existing roadway and guardrails on each side of the roadway. Acted as liaison between Infinity and City of Slidell to ensure deliverables were received in a timely manner and were effective in their design.
4/19 – Ongoing Bidding Phase	**Ridgelake Drive Drainage Improvements** - Operations and Quality Control Manager for the engineering and design services for drainage improvements on Ridgelake Drive, including subsurface drainage, new 54-inch outfall, and lateral drainage connections. Provided design oversight as well as acted as liaison between Infinity and Jefferson Parish to ensure designs effectively met the goals of the scope of design.
8/19 – Ongoing Construction	**Canal Street Ferry Terminal CMAR** - Operations and Quality Control Manager for the development of the design most cost-effective design to build a new pedestrian ferry terminal. Ensured designs satisfy project and grant requirements. The project includes designs for a new steel pile supported wharf, steel framed terminal building, and two steel framed towers connected by a prefabricated two steel truss bridges spanning over railroad tracks.
11/19 - Present	**St. Roch North Roadway Repairs** - Operations and Quality Control Manager for the of designing of the complete street replacement in the St. Roch neighborhood. The project required replacement of roadways, sidewalks, and driveways with the addition of ADA compliant ramps. Oversaw detailed budget and contract negotiations with the City of New of New Orleans. Additionally, ensured timely delivery and effectiveness of engineering of designs.
3/12 – 5/13	**City of New Orleans Drainage Master Plan** - Served as the project manager for the $2M City of New Orleans Drainage Master Plan Project. Project Management responsibilities included development of a detailed budget for completion of the project along with development of a detailed project work plan which addressed a multitude of project aspects, including communications and coordination of efforts and quality management. Post project activities involved resulted in becoming a credible resource to both governmental and non-governmental organizations seeking to further stormwater management across the Gulf Coast Region.

Firm employed by	**Infinity Engineering Consultants, LLC.**		Meets MPR No. 3
Name	**Rachel Kenney, P.E.**	Years of relevant experience with this employer	13
Title	Chief Engineer	Years of relevant experience with other employer(s)	7

Degree(s) / Years / Specialization			Bachelor of Science / 2001 / Civil Engineering
Active registration number / state / expiration date			No. 37666 / Louisiana / 09/30/2023
Year registered	2013	Discipline	Civil/Structural Engineering
Contract role(s) / brief description of responsibilities			**Senior Bridge Designer & Checker -** As Infinity's Chief Engineer Ms. Kenney is responsible for overseeing all engineering projects for the firm. Ms. Kenney brings over twenty years of structural design and civil design engineering experience to the role. Throughout her career, Ms. Kenny has used her expertise to inspect and design a wide variety of structural projects, including bridges, municipality buildings, pumping stations, oil and gas facilities, and wastewater treatment plants.

1/2016 –1/2018	**Omega Refining Barge Dock and Vehicular Bridge -** Project Engineer for the design engineering for a new barge loading dock on the Mississippi. Project included the structural design of the steel dock framing and decking, the 225' pile supported, steel vehicular bridge, a hydraulic crane, 500' of piperack, and product piping from the facility to the dock, and electrical switchgear and lighting.
3/2018 – Present Under Construction	**Port Ship Service New Dock Design -** Managed project team to design relocated dock facility. The new dock design included a USACE levee crossing leading to an elevated platform as well as a 30' vehicular bridge with slope stabilization to the bank. Capture piles were provided for the relocated barge dock. Oversaw all pre-construction analysis and provided cost estimates.
3/2019 – Present Under Construction	**RTA Canal Street Ferry Terminal CMAR -** Managed a multidisciplined team of designers working with the Owner's Contractor to determine the most cost-effective design that would satisfy project and grant requirements. The project included: a steel pile supported wharf with concrete beams and hollow core concrete panels; a timber pile supported, steel framed terminal building; two steel framed stair/elevator towers connected by a prefabricated steel truss bridge spanning (2) railroad tracks; prefabricated 100' gangways; design of a half grand union with catenary system; captive barge dock; and temporary berth with steel platform, and temporary captive barge dock.
2/16 – 3/2021	**IMTT Geismar Dock 4 -** Managed a team of Structural, Mechanical and Electrical engineers to complete the design of a new ship and barge dock, including a new bridge connecting the new and existing dock. Performed structural design, of 60"-72" diameter ship and barge breasting monopiles, a 40'x80' steel platform supporting a 40'x20'x100' tall steel framed hose tower, 760' of piperack, and associated walkways, stairs, and auxiliary structures.
6/2012 – 8/2012	**I-10 Overpass Inspection -** Performed the traffic control and the pre and post inspection of Interstate 10 overpass and ramps in the vicinity of the Pallas Hotel Implosion. Reviewed LADOTD reports, established bent numbering in the field, performed pre and post inspections of deck surfaces and structures.
6/2004 –12/2004	**City of New Orleans Wisner Bridge Inspection -** Responsible for inspecting, evaluating, and reporting deficiencies in the 3/8-mile-long Wisner Bridge over I-610. The inspection was completed in accordance with LaDOTD requirements and a plan for rehabilitation was prepared.

Firm employed by	**Infinity Engineering Consultants, LLC.**			Meets MPR No. 3
Name	**Ricardo Contreras, P.E.**		Years of relevant experience with this employer	5
Title	Civil/Structural Engineering Manager		Years of relevant experience with other employer(s)	21
Degree(s) / Years / Specialization			Bachelor of Science / 1994 / Civil Engineering	
Active registration number / state / expiration date			No. 28533 / LA / 9/30/2023	
Year registered	1999	Discipline	Civil Engineering	
Contract role(s) / brief description of responsibilities			**Project Manager and Roadway Design –** With over 26 years of civil engineering and project management experience, Ricardo Contreras, P.E. brings the following relevant specialties to this project: roadway design, infrastructure assessment, multi-model complete street design, and roadway drainage design.	

3/2020 – Under Construction	**Alvin Calender Airfield Vehicular Bridge** - Provided technical assistance for the establishment of a new vehicular bridge that will span across a drainage canal that parallels Barrier Road. Upon completion, this bridge will be approximately 50 feet wide by 160 feet in length and will include approach spans at both ends. Designs call for the bridge to uniformly elevated to span the canal and align with target grades, which is slightly higher than existing ground surfaces.
7/2019 – Present	**Magnolia Street Bridge Replacement –** Civil Engineer responsible for site civil design and overall project development for the drainage improvements and replacement of the existing bridge on South Magnolia Street. The design tasks included the specification of an aluminum box culvert, the design of asphalt roadway replacement, and civil site design
2/2021 – 2/2023 (Est)	**Shintech Water Intake Platform and Vehicular Bridge** - Provided technical assistance for the design of a new water intake platform at plant. The platform consists of a multi-disciplinary design with coordination between Infinity's civil, structural, mechanical, and electrical teams. Responsible for the design of a heavy equipment concrete bridge to connect from the levee to the new platform. Additionally, project called for designs of the roadway for vehicular levee crossing.
5/2021 - Present	**Savanne Road DOTD Off-System Bridge Replacement** - Provided technical assistance for the replacement of an off-system bridge along Savanne Road crossing over Hanson Canal. Oversaw all structural/civil engineering designs for the bridge replacement as well as coordinated with land surveying and environmental service sub consultants.
12/2015 – 9/2017	**Joe Brown Park Bridge Rehabilitation** – Responsible for construction management of project. Duties included overseeing and managing construction progress and schedules, submittal reviews, review and approval of invoices, and project closeout.
8/2001 – 10/2005	**LaDOTD Peters Road On and Off Ramps For the Westbank Expressway** – Responsible for stage "0" feasibility study, prepared preliminary plans for new on and off ramps for Peters Road and the Harvey tunnel traffic, including relocation of existing on and off ramps to the Westbank Expressway and incidental roadway realignment.
11/2016 – Under Construction	**West Metairie Avenue Rehabilitation and Canal Stabilization -** Roadway and drainage improvements work included the removal and replacement of concrete paving panels and the repair and adjustment of select drainage outfalls, and implementation of stabilization measures to the embankments of the canal. Responsible for overall design, preparation of plans and specifications, provided cost estimation and coordinated all aspects of the project.

Firm employed by	**Infinity Engineering Consultants, LLC.**		Meets MPR No. 2
Name	**Cindy Gallo, P.E.**	Years of relevant experience with this employer	8
Title	Project Delivery Manager/Structural Engineer	Years of relevant experience with other employer(s)	0

Degree(s) / Years / Specialization			Bachelor of Science / 2015 / Civil Engineering
Active registration number / state / expiration date			No. 43357 / LA / 09/30/2023
Year registered	2019	Discipline	**Civil/Structural Engineering**
Contract role(s) / brief description of responsibilities			Project Delivery Manager/Structural Engineer - As Project Delivery Manager, Ms. Gallo leads Infinity's project management discipline, focusing on effective project completion and exceptional client satisfaction. Ms. Gallo brings over eight years of experience in project management and civil/structural and marine engineering design to this client-focused role., Ms. Gallo's structural engineering expertise has been lent to a diverse set of project types including maritime, bridge, and facility designs.

2/2021 – 2/2023 (Est)	Shintech Water Intake Platform and Vehicular Bridge - Project Manager of the engineering team responsible for the civil, structural, mechanical, electrical and instrumentation designs of a new river water intake platform. Project components included performing topographic and hydrographic surveys, as well as the design of the concrete intake platform and vehicular access bridge supported by steel pilings/substructures, levee crossing and modifications, piping layouts, pipe support design, hydraulic analyses, and power and instrumentation as required for the platform.
7/2019 – Present	Magnolia Street Bridge Replacement – Project Manager and Engineer of Record for the detailed design for drainage improvements and the replacement of the existing bridge on South Magnolia Street. The design tasks included the specification of an aluminum box culvert, the design of asphalt roadway replacement, and civil site design. Led Infinity's efforts in the preparation of construction documents, coordinated with design team and manufacturer representative.
2/2018 – 10/2018	City of New Orleans Joe Brown Park Bridge Rehabilitation – Project Manager responsible for organizing the preparation and delivery of a construction drawing and specification package, coordinating with the Owner and the Department of Parks and Parkways, and scheduling all design progress meetings. She was on the structural team that prepared the design for the new bridge and foundation. This project consisted of civil, structural, and electrical design for the removal and replacement of an existing vehicular bridge deemed to be in poor condition.
2/2015 – 10/2017	City of New Orleans Bridge Inspections and Load Ratings - Project manager of a team responsible for performing field inspections and load rating calculations on a total of twelve bridges. Performed superstructure and substructure calculations using the AASHTOWARE Bridge Rating Software (BrR, V6.8), MOVLOADS, and RAM Elements in combination with hand calculations. Assembled the final load rating reports to include the inspection forms, photos, and calculations for submittal.
3/2019 – Under Construction	Regional Transit Authority Canal Street Ferry Terminal CMAR – Part of the team responsible for the preparation of construction drawing and specification package related to the installation of new terminal building, wharf structures, and new bridge. Coordinated with the project lead, the Owner, and the architect to ensure the client's needs were addressed.

Firm employed by	**Infinity Engineering Consultants, LLC.**		
Name	**Robert Haydel**	Years of relevant experience with this employer	2
Title	Project Civil Engineer	Years of relevant experience with other employer(s)	13

Degree(s) / Years / Specialization			Bachelor of Science / 2005 / Physics Master of Science /2007 / Civil Engineering
Active registration number / state / expiration date			N/A
Year registered	N/A	Discipline	Civil Engineering
Contract role(s) / brief description of responsibilities			**Hydraulics & Hydrology/Civil Engineering Roadway Design** - Civil Project Engineer Roadway and Drainage Design - With over 15 years of civil engineering experience, Robert Haydel brings the following relevant specialties to this project: roadway design, infrastructure assessment, storm water system design, and urban hydraulics and hydrology modeling.

5/2021 - Present	Savanne Road Off-System Bridge Replacement – Task leader of the drainage evaluation, calculations, and design for a 3 Span 60-foot-long reinforced concrete bridge. Responsibilities included developing a HEC RAS model to complete a hydraulics & hydrology analysis of the project site. Developed the hydraulic report to fulfill LADOTD requirements for bridge replacement.
7/2021 - Present	North River Road Off-System Bridge Replacement – Task leader of the drainage evaluation, calculations, and design for a 3 Span 60-foot-long reinforced concrete bridge. Responsibilities included developing a HEC RAS model to complete a hydraulics & hydrology analysis of the project site. Developed the hydraulic report to fulfill LADOTD requirements for bridge replacement.
Jan. 2017 - April 2019	Dupre and S. Gayoso Street Improvements – Utilizing green infrastructure systems, responsible for developing new drainage conveyance and retention technologies to retain a ten-year storm event. Designed the pavement structures (asphalt roadway, porous concrete, sidewalks, driveways, ADA ramps) and managed the design of the sewer and water systems. This project is being used as a model for green infrastructure standards for improvements throughout the City of New Orleans.
Feb. 2015 - Dec. 2016	DPS 01 Watershed Drainage Upgrades and Green Infrastructure - Designed drainage conveyance and retention improvements, coordinated permitting design requirements, and designed bi-directional bike lanes. Completed multiple full roadway reconstruction designs (pavement, drainage, water, sewer) while introducing new stormwater management practices and enhanced pedestrian and cycle traffic.
10/2019 - Present	St. Roch North Roadway Repairs – Project Manager responsible for leading a team in designing the complete street replacement in the St. Roch neighborhood. The project required replacement of roadways, sidewalks, and driveways with the addition of ADA compliant ramps. Designs included roadway gradients to create positive cross-sectional and longitudinal drainage. Hydraulic design/analysis was also required for drainage system design.
Sept 2008 - July 2010	New Orleans Drainage Master Plan – As part of the City of New Orleans' effort to create a drainage master plan, develop a SWMM model of the drainage system. This model identified areas susceptible to a 10-year storm event and identified adjustments to improve the conveyance of stormwater at specific locations.

Firm employed by	**Infinity Engineering Consultants, LLC.**		
Name	**Michael Riviere, E.I.**	Years of relevant experience with this employer	11
Title	Project Civil Engineer	Years of relevant experience with other employer(s)	16

Degree(s) / Years / Specialization			Bachelor of Science / 1988 / Physics
Active registration number / state / expiration date			E.I. 0013329 / LA / 9/30/2023
Year registered	1989	Discipline	Civil Engineering
Contract role(s) / brief description of responsibilities			**Construction Engineer**- As Infinity's Civil/Structural Construction Engineer, Mr. Riviere has experience in inspection, design, construction and repair of roads, bridges, and port facilities. Relevant Expertise Includes: bridge design, traffic flow access management, multi-model complete street design, green infrastructure, adding roadway capacity.

10/2021 – 10/2022	**Hurricane Ida Damage Bridge Assessments -** Performed storm damage assessments of 12 off-system bridges and 18 culvert locations suspected of storm damage. Each structure was inspected and documented with respect to storm related damage. Individual reports with photographs were completed and submitted to the Parish Officials.
6/2012-8/2012	**I-10 Overpass Inspection** – Project Engineer responsible for performing the pre and post inspection of Interstate 10 overpass and ramps in the vicinity of the Pallas Hotel Implosion. Reviewed LADOTD reports, established bent numbering in the field, performed pre and post inspections of deck surfaces and structures, and documented a written and digital report.
8/2016 -6/2017	**City of New Orleans Bridge Inspection and Ratings** – Project Engineer for local bridge inspection and load rating project. Assembled the final load rating reports to include the inspection forms, photos, and calculations for Infinity's submittal. This project consisted of performing a condition inspection and evaluation of twelve (12) bridges around the City of New Orleans.
3/2005-3/2009	**Phases 1, 2 & 3 Screening of Scour Susceptible Bridges for LADOTD - Phase 1** – performed preliminary analysis on 589 bridges using the state's criteria to prioritize the structures requiring additional study in Phase 2. In Phase 2, performed site inspections on each bridge to gather data necessary for hydrologic and hydraulic analysis. Hydraulic modeling program WSPRO and HEC-18 were used to determine the anticipated scour depths and to compare with the existing bridge foundations to determine if the bridge is scour critical. Additionally, prepared reports on the findings. In Phase 3, performed structural load calculations on the critical piers to determine required pile capacity.
2/2003-10/2003	**Army Corps of Engineers Vicksburg District Bridge Replacement** – As QC/QA System Manager and Project Engineer, supervised all work on the replacement of a 360' swing span with a 306' vertical lift bridge for the Union Pacific R.R. as part of the Red River Waterway Improvement Program in Alexandria, LA.
2/2009-12/2009	**U.S. HWY 67 Relocation, Craighead and Lawrence County, Arkansas for AHTD** – Responsible for design of bridge decks, concrete approach slabs and type special approach gutters and elastomeric bearings in accordance with AASHTO specifications. Also performed structural quantity takeoffs.
2/2010-9/2011	**I-69 Connector, Lincoln, Jefferson and Cleveland Counties, Arkansas for AHTD** – Performed bridge layout, sub-structural and structural design using Merlin-Dash and RC Pier programs.

Firm employed by **Infinity Engineering Consultants, LLC.**			
Name **Kevin Hurtt, E.I.**		Years of relevant experience with this employer	2
Title Project Civil Engineer		Years of relevant experience with other employer(s)	5
Degree(s) / Years / Specialization		Bachelor of Science / 2001 / Civil Engineering	
Active registration number / state / expiration date		E.I. 0034403 / LA / 9/30/2024	
Year registered	2020	Discipline	Civil Engineering
Contract role(s) / brief description of responsibilities			

5/2021 - Present	**Savanne Road Off-System Bridge Replacement** – Project engineer for the replacement of the Savanne Road off-system bridge crossing over Hanson Canal. Provided structural/civil engineering designs for the bridge replacement as well as project management responsibilities during final design phase.
2/2021 – 2/2023 (Est)	**Shintech Water Intake Platform and Vehicular Bridge** - Designed a vehicular bridge with attached pipe rack to access a proposed water intake platform in the Mississippi river. The bridge was designed to accommodate a 41,000 lb. crane with a 30,000 lb. load or HL-93 loading. The pipe rack was designed to support a thirty-inch water line, miscellaneous smaller pipes, and three cable trays. The design was completed using RISA-3D software.
4/2020 – 3/2022	**Cornerstone Ship Berth and Vehicular Bridge Design Repairs -** Assisted in repair of Cornerstone's berth on the Mississippi after an alision that destroyed a caisson supporting a hose tower and damaged a vehicle access bridge. Responsibilities included designing a control room support structure cantilevered off an existing structure and a vehicle bridge to replace the damaged portion. The project required close coordination with mechanical and electrical engineering disciplines. Design was completed using Bentley's RAM Elements software, Tension Technology International's Optimoor software, and traditional hand calculations.
7/2020 - Present	**Lakeshore Group C Street Reconstruction** – Assessed existing drainage conditions and designed new pipe layout to improve drainage and meet current Orleans parish requirements. Assessed existing street and sidewalk conditions and made recommendations for repair or replacement.
12/2018 – 6/2022	**Whitney Avenue Bike Lane –** Assisted in the design of a two-way bike lane including the repurposing of existing vehicle lanes, conversion of existing sidewalks, and construction of a median path. Prepared cost estimates and designed lane striping.
11/2020 - 9/2021	**VAA Marine Dock Peer Review –** Assisted in reviewing and assessing construction drawings for a marine dock designed by VAA to be constructed on the Mississippi river. The proposed dock included barge and ship berthing and unloading equipment. Tasks included reviewing drawings for accuracy and consistency and checking barge berthing assumptions and calculations. The proposed barge beathing structure was also analyzed using Bentley's RAM Elements software.
7/2019 - Under Construction	**Plaquemines Parish Harbor of Refuge -** Assisted in design of improvement to an existing harbor facility. Tasks included design of column base plates and a structure to house oil disposal containers. The structure included a reinforced concrete slab, a spill control and secondary containment wall, and a roof. Design was completed using Bentley's RAM Elements software and traditional hand calculations.

Firm employed by Matrix New World Engineering					
Name	Chad Turner			Years of relevant experience with this employer	7
Title	Environmental Project Manager			Years of relevant experience with other employer(s)	6
Degree(s) / Years / Specialization			BS, Biological Sciences, Louisiana State University, 2008		
Active registration number / state / expiration date					
Year registered		Discipline			
Contract role(s) / brief description of responsibilities			Environmental Pro and Biologist/Wetlands for Solicitation of Views and Categorical Exclusion/Environmental Clearance and Wetland Studies		

Experience dates (mm/yy–mm/yy)	Experience and qualifications relevant to the proposed contract; *i.e.*, "designed drainage", "designed girders", "designed intersection", etc. Experience dates should cover the time specified in the applicable MPR(s).
05/09-06/13	While employed as an Environmental Impact Specialist with the DOTD Environmental Section: - Conducted wetland delineations and compiled Categorical Exclusion documentation for 29 off-system bridges throughout Louisiana - Prepared all NEPA documentation and secured approval of Categorical Exclusions for 25+ on-system projects throughout Louisiana, including three bridges over Louisiana Natural and Scenic Rivers - Conducted 100+ on-site field surveys (wetlands and threatened and endangered species) and subsequent reporting for use in United States Army Corps of Engineers jurisdictional determinations (JDs) and Section 10/404 permit applications
04/14-07/14	Provided wetland delineations and USACE permitting compliance assistance for 7 off-system bridge replacements in East Baton Rouge Parish, LA: - Port Hudson Pride Road Bridge over Little Sandy Creek (City-Parish Project No. 13-BR-LA 0013) - Milldale Road Bridge over Beaver Bayou (City-Parish Project No. 13-BR-LA 0023) - Morvant Road Bridge (1) and (2) over Drainage Bayou (City-Parish Project Nos. 13-BR-LA 00(09-10) - Albert Drive Bridge over Drainage Canal (City-Parish Project No. 13-BR-LA 0003) - Claycut Road Bridge over Ward Creek (City-Parish Project No. 13-BR-LA 0014) - Mollylea Drive Bridge over Jones Creek (City-Parish Project No. 13-BR-LA 0012)
08/14-09/14	Assisted in the wetland delineation and threatened and endangered species survey for the proposed construction of an approximate 9.39-mile, six-inch-diameter pipeline to convey natural gas liquids from Norco, St. Charles Parish, LA to an interconnect along an existing ten-inch-diameter pipeline northeast of LaPlace, St. John the Baptist Parish, LA. Route crossed various sensitive/protected habitats, including Maurepas Swamp WMA, Bonnett Carre Spillway, and Bayou Trepagnier, which is designated as a Louisiana Natural and Scenic River.
11/14-01/16	Provided wetland delineations and USACE permitting compliance for 383 acres of potential plant locations, a proposed cryogenic plant, approximately 16 miles of associated pipeline rights-of-way and supporting meter

	stations, and an electrical substation near Arcadia, LA. Delineation habitats included existing maintained rights-of-way, pine plantation, active cattle pasture, bottomland hardwood depressions, and riparian hardwoods.
06/15-07/15	Provided the wetland delineation and managed GIS responsibilities for construction of an interchange at I-10 and Pecue Lane (DOTD Project No. 700-17-0221, Federal Aid Project No. IM-1709(507)). In addition to the interchange, the project included the replacement of a two-lane overpass bridge and Pecue Lane/Wards Creek bridge, as well as an extension to Reiger Road.
10/15-Ongoing	Conducted a wetland delineation and threatened and endangered species survey for a 593.09-acre tract along the Amite River for use as a gravel mining operation in East Feliciana Parish, LA. Assisted in preparation of USACE Section 10/404 individual permit application, LDWF Scenic Rivers permit application, LDEQ Minor Source Air Permit application, LDEQ Construction and Operational Storm Water Discharge Permit applications, and Phase 1 Environmental Site Assessment.
08/16-01/2019	Provided/managed the wetland delineation and secured JDs for over 8,700 acres for the expansion of the Gum Swamp Mitigation Bank and the subsequent development of the Pontchartrain Umbrella Mitigation Bank in Livingston Parish, LA. Delineation habitats included pine plantation, riparian hardwoods, and bottomland hardwood depressions. In addition to the field work, responsible for wetland data report production and coordination with the USACE during the JD review process, as well as management of all GIS responsibilities.
05/20-Ongoing	Project manager responsible for the wetland delineations and USACE permitting for 5 MOVEBR projects in East Baton Rouge Parish: - Old Hammond Highway Segment 1, Phases A and B (City-Parish Project No. 19-CP-HC-0034) - Bluebonnet Boulevard (Perkins Road to Picardy Boulevard) (City-Parish Project No. 19-CP-HC-0034) - Highland Road at Siegen Lane Intersection (City-Parish Project No. 20-CP-HC-0004) - Sherwood Forest Extension (Greenwell Springs Road to Joor Road) (City-Parish Project No. 20-CP-HC-0014)
03/21-08/21	Conducted a wetland delineation and threatened and endangered species survey for the proposed expansion of the VG Calcasieu Pass LNG Terminal. Survey area encompassed 812 acres of pasture and marsh habitats, as well as 177 acres of marsh and uplands on Monkey Island. During field efforts, assessed and mapped potential habitat for the threatened eastern black rail determined indicated by the presence of *Spartina spartinae* and sea oxeye daisy.

Firm employed by Matrix New World Engineering					
Name	Lee Womack			Years of relevant experience with this employer	7
Title	Senior Project Manager			Years of relevant experience with other employer(s)	9
Degree(s) / Years / Specialization			MS, Wildlife, Louisiana State University, 2006 BS, Wildlife and Fisheries Conservation, Louisiana State University, 2004		
Active registration number / state / expiration date			N/A		
Year registered	N/A	Discipline	N/A		
Contract role(s) / brief description of responsibilities			Biologist/Wetlands for Wetland Studies		

Experience dates (mm/yy–mm/yy)	Experience and qualifications relevant to the proposed contract; *i.e.*, "designed drainage", "designed girders", "designed intersection", etc. Experience dates should cover the time specified in the applicable MPR(s).
01/08-01/10	Provided multiple wetland delineations and associated regulatory permitting as part of the DOTD Environmental Permitting Retainer Contract, Task Orders 1-3, State Project No. 700-99-0439, Federal Aid Project No. STP-9907 (526) / IM-1709(507), Louisiana Department of Transportation and Development, Statewide, LA. Project tasks included conducting 34 wetland delineations, four threatened and endangered species surveys, and obtaining state and federal permits for 63 individual bridge and road improvement projects throughout Louisiana. Each of three task orders under this retainer contract included: USACE Section 10/104 permitting; LDNR, Office of Coastal Management, Coastal Use Permitting; U.S. Coast Guard bridge permitting; LDWF Louisiana Natural and Scenic River System permitting; LDEQ water quality certifications; levee permits from various levee boards; and parish permits.
05/08-12/09	Provided wetland delineations and associated regulatory permitting for the DOTD Fort Buhlow Bridges and Approaches, Route US 71 to US 165, State Project No. 840-43-0001, Task 1: 701-65-1002, Rapides Parish, LA. Project consisted of the replacement of the O.K. Allen Bridge over Lake Buhlow, the KCS Railroad Bridge, and widening/reconstruction of 1.3 miles of roadway approaches. Project tasks included wetlands delineation, USACE Section 10/404, U.S. Coast Guard Bridge, and Red River, Atchafalaya, and Bayou Boeuf Levee District permitting.
10/08-05/09	Provided a wetland delineation and associated regulatory permitting for DOTD, Caminada Bay Bridge Replacement, State Project No. 064-01-0040, Task 1: 701-65-1002, Jefferson Parish, LA. Project consisted of the replacement of Caminada Bay Bridge on LA 1 near Grand Isle. Project tasks included a wetland delineation, LDNR Coastal Use, USACE, and U.S. Coast Guard Bridge permitting, in addition to coordination with LDWF regarding state water bottom dredging.
11/08-03/10	Provided a wetland delineation and associated regulatory permitting for the DOTD LA 3156 Bayou Teche Bridge Replacement, State Project No. 823-42-0005, Task 1: 701-65-1002, Iberia Parish, LA. Project consisted of the replacement of the Jefferson Street Bridge over Bayou Teche on LA 3156. Project tasks included a wetland delineation and USACE Section 10/404 permitting.

01/09-08/12	Provided a wetland delineation and associated regulatory permitting for the DOTD LA 1088 Interchange, State Project No. 454-04-0038, Task 1: 701-65-1002, St. Tammany Parish, LA. Project consisted of the construction of a "clover-leaf" interchange at LA 1088 and Interstate 12. Controversial project due to extent of wetlands impacts and the opening up of a prime corridor for development into the Florida parishes, which state and federal agencies historically rejected. Project tasks included Coastal Use, and USACE permitting, and a threatened and endangered species survey (red-cockaded woodpecker) per USFWS requirements.
10/10-11/12	Provided USACE Section 404 permitting and associated regulatory permitting support (LDEQ, LDWF Natural and Scenic Rivers) for the DOTD Amite River Bridge @ Magnolia, LA 64, State Project No. 262-31-0016, Task 2: 701-65-1231, Livingston Parish, LA.
04/14-07/14	Managed the wetland delineations and USACE permitting compliance assistance for 7 off-system bridge replacements in East Baton Rouge Parish, LA: - Port Hudson Pride Road Bridge over Little Sandy Creek (City-Parish Project No. 13-BR-LA 0013) - Milldale Road Bridge over Beaver Bayou (City-Parish Project No. 13-BR-LA 0023) - Morvant Road Bridge (1) and (2) over Drainage Bayou (City-Parish Project Nos. 13-BR-LA 00(09-10) - Albert Drive Bridge over Drainage Canal (City-Parish Project No. 13-BR-LA 0003) - Claycut Road Bridge over Ward Creek (City-Parish Project No. 13-BR-LA 0014) - Mollylea Drive Bridge over Jones Creek (City-Parish Project No. 13-BR-LA 0012)
06/15-07/15	Managed the wetland delineation for construction of an interchange at I-10 and Pecue Lane (DOTD Project No. 700-17-0221, Federal Aid Project No. IM-1709(507)). In addition to the interchange, the project included the replacement of a two-lane overpass bridge and Pecue Lane/Wards Creek bridge, as well as an extension to Reiger Road.
12/17-Ongoing	Project manager and regulatory specialist for the 5,200-foot horizontal directional drill of the West Pearl River in St. Tammany Parish, Louisiana. Responsibilities included U.S. Army Corps of Engineers Section 10/404 permitting assistance; U.S. Coast Guard permitting assistance; U.S. Fish and Wildlife Service, Bouge Chitto National Wildlife Refuge, Special Use Permitting assistance; LDWF Louisiana Natural and Scenic Rivers Program permitting assistance; and Louisiana Department of Transportation and Development permitting assistance. Currently providing planting and monitoring oversight for the re-vegetation of temporary workspaces within Bogue Chitto NWR.
05/20-07/21	Assisted in wetland delineation for the MOVEBR project Sherwood Forest Extension (Greenwell Springs Road to Joor Road) (City-Parish Project No. 20-CP-HC-0014) in East Baton Rouge Parish, LA. Project consisted of a new two-lane roadway connecting Sherwood Forest to Joor Road, with a new bridge spanning the Comite River

Firm employed by Matrix New World Engineering			
Name	Angela Singletary	Years of relevant experience with this employer	4
Title	Senior Environmental Scientist	Years of relevant experience with other employer(s)	5

Degree(s) / Years / Specialization			B.A., Geography (Environmental Analysis), University of New Orleans, 2010
Active registration number / state / expiration date			N/A
Year registered	N/A	Discipline	N/A
Contract role(s) / brief description of responsibilities			Biologist/Wetlands for Wetland Studies

Experience dates (mm/yy–mm/yy)	Experience and qualifications relevant to the proposed contract; *i.e.*, "designed drainage", "designed girders", "designed intersection", etc. Experience dates should cover the time specified in the applicable MPR(s).
04/14-07/14	Assisted in wetland delineations and USACE permitting compliance assistance for 7 off-system bridge replacements in East Baton Rouge Parish, LA: - Port Hudson Pride Road Bridge over Little Sandy Creek (City-Parish Project No. 13-BR-LA 0013) - Milldale Road Bridge over Beaver Bayou (City-Parish Project No. 13-BR-LA 0023) - Morvant Road Bridge (1) and (2) over Drainage Bayou (City-Parish Project Nos. 13-BR-LA 00(09-10) - Albert Drive Bridge over Drainage Canal (City-Parish Project No. 13-BR-LA 0003) - Claycut Road Bridge over Ward Creek (City-Parish Project No. 13-BR-LA 0014) - Mollylea Drive Bridge over Jones Creek (City-Parish Project No. 13-BR-LA 0012)
06/15-07/15	Assisted in wetland delineations for construction of an interchange at I-10 and Pecue Lane (DOTD Project No. 700-17-0221, Federal Aid Project No. IM-1709(507)). In addition to the interchange, the project included the replacement of a two-lane overpass bridge and Pecue Lane/Wards Creek bridge, as well as an extension to Reiger Road. In addition to the field work, responsible for data form and photo exhibit production.
01/18-02/19	Assisted in wetland delineations for a 3,098.17-acre tract for the Hickory Branch Mitigation Bank in Calcasieu Parish, LA. Delineation habitats included pine plantation, riparian hardwoods, and bottomland hardwood depressions. Tract consisted largely of pimple mound topography, which necessitated the use of transects during the delineation. In addition to the field work, responsible for data form and photo exhibit production.
11/18-05/19	Assisted in wetland delineations for a 5,960.52-acre tract for the Pontchartrain Basin Umbrella Mitigation Bank in Livingston Parish, LA. Delineation habitats included pine plantation, riparian hardwoods, and bottomland hardwood depressions. In addition to the field work, responsible for data form and photo exhibit production.
07/19-01/21	Assisted in wetland delineations and threatened and endangered species surveys for 12 tracts totaling 71.93 acres for a proposed petrochemical facility expansion in Ascension Parish, LA. Scope of work was spread across four separate mobilizations, resulting in three JDs issued. In addition to the field work, responsible for data form and photo exhibit production.

12/17-Ongoing	Wetland ecologist for the 5,200-foot horizontal directional drill of the West Pearl River in St. Tammany Parish, Louisiana. Responsibilities included U.S. Army Corps of Engineers Section 10/404 permitting assistance; U.S. Coast Guard permitting assistance; U.S. Fish and Wildlife Service, Bouge Chitto National Wildlife Refuge, Special Use Permitting assistance; LDWF Louisiana Natural and Scenic Rivers Program permitting assistance; and Louisiana Department of Transportation and Development permitting assistance. Currently providing planting and monitoring oversight for the re-vegetation of temporary workspaces within Bogue Chitto NWR.
05/20-Ongoing	Assisted in wetland delineations, and will assist in permitting, for 5 MOVEBR projects in East Baton Rouge Parish: - Old Hammond Highway Segment 1, Phases A and B (City-Parish Project No. 19-CP-HC-0034) • Widening from 4 to 6 lanes, with a roundabout at Flannery Rd. and additional pedestrian facilities; total length of 1.25 miles - Bluebonnet Boulevard (Perkins Road to Picardy Boulevard) (City-Parish Project No. 19-CP-HC-0034) • Widening from 4 to 6 lanes, with additional pedestrian facilities; total length of 0.7 mile - Highland Road at Siegen Lane Intersection (City-Parish Project No. 20-CP-HC-0004) • Intersection improvements potentially consisting of a roundabout or additional/longer turn lanes - Sherwood Forest Extension (Greenwell Springs Road to Joor Road) (City-Parish Project No. 20-CP-HC-0014) • New two-lane roadway connecting Sherwood Forest to Joor Road, with a new bridge spanning the Comite River
03/21-08/21	Assisted in a wetland delineation and threatened and endangered species survey for the proposed expansion of the VG Calcasieu Pass LNG Terminal. Survey area encompassed 812 acres of pasture and marsh habitats, as well as 177 acres of marsh and uplands on Monkey Island. During field efforts, assessed and mapped potential habitat for the threatened eastern black rail determined indicated by the presence of *Spartina spartinae* and sea oxeye daisy.

Firm employed by Matrix New World Engineering					
Name	Linda McConnell			Years of relevant experience with this employer	3
Title	Environmental Engineer			Years of relevant experience with other employer(s)	32
Degree(s) / Years / Specialization			BS, Mathematics, Louisiana State University 1972		
Active registration number / state / expiration date			PE 0020434/LA/3-31-23		
Year registered	1/25/1983	Discipline	Civil Engineer		
Contract role(s) / brief description of responsibilities			Environmental Pro for Solicitation of Views and Categorical Exclusion/Environmental Clearance		

Experience dates (mm/yy–mm/yy)	Experience and qualifications relevant to the proposed contract; *i.e.*, "designed drainage", "designed girders", "designed intersection", etc. Experience dates should cover the time specified in the applicable MPR(s).
01/85 - 03/87	Project Engineer: FEMA, Flood Insurance Studies, Southwest LA. Project Engineer for several Flood Insurance Studies in southwestern Louisiana. Participated in numerous other flood study and channel design projects. Studies included field surveys and data collection, report preparation, participation in public meetings, modeling of hydrology and hydraulics, determination of base flood elevations, floodway boundaries, etc.
01/06 – 12/08	Project Manager, FERC 7(c) Pipeline Certification; Tarpon Gas Storage; Houston, TX Preparation of environmental resource reports for the Federal Energy Regulatory Commission 7(c) permits. Managed environmental investigations and preparation of NEPA documents for FERC. Work included oversight of field investigations and report preparation for fish, wildlife, and vegetation reports; coordination and/or preparation of reports on land use, recreation, and aesthetics, alternatives, cultural resources, soils, and geological resources, as well as summary of NEPA potential impacts.
01/09 – 12/11	Project Manager: St. James Rail Terminal, New Rail Terminal Permitting, St. James, Louisiana. Managed environmental services, including permitting, for a new rail terminal providing unit train delivery of crude oil. The project also included a pipeline from the offloading pipe rack to the receiving terminal, on an adjacent property. Work included initial Environmental Site Assessment of property, Phase II Baseline Assessment, wetlands delineation, Joint Application to the Louisiana Department of Natural Resources, Office of Coastal Management, for a Coastal Use Permit, and to the Corps of Engineers, New Orleans District, for a Nationwide General Permit 3; application to the Louisiana Department of Environmental Quality for Water Quality Certification; preparation of a Stormwater Pollution Prevention Plan and Spill Prevention, Control, and Countermeasures Plan; coordination of application to the State Fire Marshal for construction permit approval.
01/10 – 12/11	Project Manager: Port Eads Reconstruction Project, Plaquemines Parish, LA. – On behalf of Plaquemines Parish Government, conducted environmental reviews and applied for and obtained permits related to the reconstruction of Port Eads in the aftermath of Hurricane Katrina. Permits/approvals included Louisiana Department of Natural Resources, Office of Coastal Management, Coastal Use Permit (P20100263), Corps of Engineers Permit (MVN-2010-0966-EPP), Louisiana Department of Environmental Quality Water Quality Certification (WQC 100521-01/AI 171168/CER 20100001), and other related consultations.

09/12 – 04/14	East Baton Rouge City-Parish, Environmental Reviews for FONSI for Old Hammond Highway Improvements, Baton Rouge, LA. Managed environmental investigations and prepared Findings for FONSI (Finding of No Significant Impact) for expansion of Old Hammond Highway (LA 426) from Boulevard de Province to Millerville Road (Phase II). Studies included Phase I ESA, evaluation of wetlands and other water bodies, threatened and endangered species, and cultural resources, as well noise survey and modeling for impact assessment and evaluation of impact to air.
05/16 – 07/17	Project Manager: Livingston Parish, NEPA Environmental Reviews for Cook Road Improvements and extension, Livingston Parish, LA. Managed environmental investigations and prepared documents for NEPA EA.
10/14 – 12/18	Project Manager: East Baton Rouge City-Parish, Environmental Assessment for Old Hammond Highway Improvements, Baton Rouge, LA. Managed environmental investigations and completed NEPA Environmental Assessment (EA) for expansion of Old Hammond Highway (LA 426) from Boulevard de Province to Millerville Road (Phase II), City/Parish Project No.: 12-CS-HC-0045, State Project No.: H.007970, F.A.P. No.: H007970, Baton Rouge, East Baton Rouge Parish, Louisiana. The EA included Phase I ESA, evaluation of wetlands and other water bodies, threatened and endangered species, and cultural resources, as well noise survey and modeling for impact assessment and evaluation of impact to air.

Firm employed by **BFM CORPORATION, LLC**			
Name	Ralph P. Fontcuberta, Jr., PLS	Years of relevant experience with this employer	40
Title	Executive Vice President Registered Professional Land Surveyor	Years of relevant experience with other employer(s)	15

Degree(s) / Years / Specialization			N/A
Active registration number / state / expiration date			4329 / LA / Sept 30 2024
Year registered	1974	Discipline	Registered Professional Land Surveyor
Contract role(s) / brief description of responsibilities			Registered Professional Land Surveyor

Experience dates (mm/yy–mm/yy)	Experience and qualifications relevant to the proposed contract; *i.e.*, "designed drainage", "designed girders", "designed intersection", etc. Experience dates should cover the time specified in the applicable MPR(s).
06/20 - ONGOING	**Almonaster Avenue Bridge Rehabilitation Project (DOTD H.014530), New Orleans, LA**. The existing Almonaster Avenue Bridge over the Inner Harbor – Navigation Canal (IH-NC) is a movable Strauss-heel trunnion bridge built circa 1920 and is owned and operated by the Board of Commissioners of the Port of New Orleans. The bridge carries two railroad tracks owned by CSX Transportation, Inc., and one vehicular lane in each direction; however, the vehicular lanes are closed. The Board, in conjunction with the Louisiana DOTD and the City of New Orleans, wishes to modify the bridge and approach roadways. BFM was contracted to provide surveying services for multiple phases of the overall project, including topographic surveying, GPS static control, and survey line. Drone surveying is a key element. Mr. Fontcuberta was the PLS of Record for the project, overseeing all surveying services and final deliverables. ($46,550 (fee); ongoing)
11/14 - 04/15	**Kenner 2030 Program: Duncan Canal at West Esplanade Bridge Replacement Project, City of Kenner, LA**. BFM provided topographic surveying services for this Bridge Replacement Project, part of the Kenner 2030 Program, which involved replacement of the West Esplanade Bridge at the Duncan Canal. Mr. Fontcuberta was the PLS of Record for the project, overseeing all surveying services and final deliverables. ($23,710 (fee); 2015)
12/21 - 01/22	**LA Highway 39 (East Judge Perez Drive) 3D Survey Scan, Port of New Orleans, St. Bernard Parish, LA**. BFM Corporation was selected by the Port of New Orleans to prepare a 3D Scan Survey for the project located near the Violet Canal. The survey included a 3D Scan underneath the elevated portion of LA Hwy 39, beginning approximately 525 feet southeast of the centerline of Violet Canal and continuing southeast; approximately 700 liner feet. The project included surveying the underside of the elevated roadway only; there was no topographic survey of the roadway surface. Mr. Fontcuberta was the PLS of Record for the project, overseeing all surveying services and final deliverables. ($19,624 (fee); 2022)
06/20 - 02/21	**Almonaster Railroad Bridge 3D Scan Services, Inner Harbor Navigational Canal, New Orleans, LA**. BFM was selected to execute a 3-D Scan Survey of the Almonaster Railroad Bridge; the Scope of Services involved locating points on the Operating Strut. Subsequent points were taken with the bascule in the lowered, seated position. A second seat of shots were taken with the bascule span in the fully open position. BFM worked with the New Orleans Public Belt to set scheduling to execute the survey, as notice needed to be given to establish when

	the bridge could be raised and lowered to facilitate elements of the scanning process. Deliverables included a CSV file containing (a) Northing, (b) Easting, (c) Elevation, and (d) Description. Mr. Fontcuberta was the PLS of Record for the project, overseeing all surveying services and final deliverables. ($14,500 (fee); 2021)
02/19 - 09/20	**Lapalco Boulevard Bridge at Harvey Canal, (PW 2017-046-RBP; DOTD H.004396), Jefferson Parish, LA**. BFM Corporation provided extensive surveying services for a topographic survey and right-of-way (R/W) determination for the project. Project elements included setting GPS Static Control (5 permanent control points), traversing a proposed survey line, and land topography surveying. Additional phases include hydrographic topography/bathymetric surveying of the project area, the right-of-way determination, and subsurface utility engineering (SUE). Drone Surveying was utilized throughout the project. A Route Topographic Survey was also included as part of the scope, as was Subsurface Utility Engineering (SUE). Mr. Fontcuberta was the PLS of Record for the project, overseeing all surveying services and final deliverables. ($478,744 (fee); 2020)
06/19 - 09/20	**Causeway Boulevard Overpass (over Airline Drive), Jefferson Parish, LA**. BFM's surveying services included Route Topographic and Boundary Survey for the project, which was located at the Causeway Boulevard Overpass of Airline Drive. This was designated as Phase 3 of the Rehabilitation Project, which included Ramps 4, 5, and the Traffic Circle. Drone Surveying services were also included. Mr. Fontcuberta was the PLS of Record for the project, overseeing all surveying services and final deliverables. ($68,090 (fee); 2020)
08/18 - 10/19	**DOTD H.013494, Louisiana Highway 52 (Phase 1; Blueberry Hill to Angus Drive), St. Charles Parish, LA**. BFM executed a Route Topographic Survey for the project; the full scope plan & profile included all services, utilities, properties, elevations and items necessary to perform any and all engineering and construction work. Project work in this multi-phase undertaking included GPS Static Control (Phase I; establishing the Survey Line and setting control points), Survey Line Traverse (Phase II; referencing 3-point ties, State Plane Coordinate System, and DOTD review), and Topography (Phase III; all topographic surveying elements, including location of utilities, cross sections, referencing drainage map, established record drawings referencing). Extensive records research was a key element of the project. Mr. Fontcuberta was the PLS of Record for the project, overseeing all surveying services and final deliverables. ($87,710 (fee); 2019)

Firm employed by **BFM CORPORATION, LLC**					
Name	Chad M. Poché, P.E.			Years of relevant experience with this employer	5
Title	Executive Vice President			Years of relevant experience with other employer(s)	24
Degree(s) / Years / Specialization			M.S. / 1998 / Civil Engineering (UNO) B.S. / 1993 / Civil Engineering (LSU)		
Active registration number / state / expiration date			27667 / LA / Sept 30 2022		
Year registered	1998	Discipline	Registered Professional Civil Engineer (Geotechnical)		
Contract role(s) / brief description of responsibilities			Principal / Engineering Liaison		

Experience dates (mm/yy–mm/yy)	Experience and qualifications relevant to the proposed contract; *i.e.*, "designed drainage", "designed girders", "designed intersection", etc. Experience dates should cover the time specified in the applicable MPR(s).
02/19 - 09/20	**Lapalco Boulevard Bridge at Harvey Canal, (PW 2017-046-RBP; DOTD H.004396), Jefferson Parish, LA.** BFM Corporation provided extensive surveying services for a topographic survey and right-of-way (R/W) determination for the project. Project elements included setting GPS Static Control (5 permanent control points), traversing a proposed survey line, and land topography surveying. Additional phases include hydrographic topography/bathymetric surveying of the project area, the right-of-way determination, and subsurface utility engineering (SUE). Drone Surveying was utilized throughout the project. A Route Topographic Survey was also included as part of the scope, as was Subsurface Utility Engineering (SUE). ($478,744 (fee); 2020)
01/17 - 08/19	**DOTD H.010570, LA 49, Williams Boulevard from West Metairie Avenue to the I-10 East Ramp, Kenner, Jefferson Parish, LA**. BFM's surveying services for the project included topographic surveying along Williams Boulevard (LA 49) from 200 feet south of West Metairie Avenue to the I-10 East Ramp. Project involved multiple visits on an as-needed basis over several years. Mr. Poché served as the Engineering Liaison for BFM, interacting directly with the engineering firm as necessary. ($117,732 (fee); 2019)
08/18 - 10/19	**DOTD H.013494, Louisiana Highway 52 (Phase 1; Blueberry Hill to Angus Drive), St. Charles Parish, LA**. BFM executed a Route Topographic Survey for the project; the full scope plan & profile included all services, utilities, properties, elevations and items necessary to perform any and all engineering and construction work. Project work in this multi-phase undertaking included GPS Static Control (Phase I; establishing the Survey Line and setting control points), Survey Line Traverse (Phase II; referencing 3-point ties, State Plane Coordinate System, and DOTD review), and Topography (Phase III; all topographic surveying elements, including location of utilities, cross sections, referencing drainage map, established record drawings referencing). Extensive records research was a key element of the project. Mr. Poché served as the Engineering Liaison for BFM, interacting directly with the engineering firm as necessary. ($87,710 (fee); 2019)
06/20 – 09/22	**Almonaster Avenue Bridge Rehabilitation Project (DOTD H.014530), New Orleans, LA**. The existing Almonaster Avenue Bridge over the Inner Harbor – Navigation Canal (IH-NC) is a movable Strauss-heel trunnion bridge built circa 1920 and is owned and operated by the Board of Commissioners of the Port of New Orleans. The bridge carries two railroad tracks owned by CSX Transportation, Inc., and one vehicular lane in each direction;

	however, the vehicular lanes are closed. The Board, in conjunction with the Louisiana Department of Transportation and Development (LADOTD) and the City of New Orleans, wishes to modify the bridge and approach roadways. BFM was contracted to provide surveying services for multiple phases of the overall project, including topographic surveying, GPS static control, and survey line. Drone surveying is a key element. Mr. Poché served as the Engineering Liaison for BFM, interacting directly with the engineering firm as necessary. ($46,550 (fee); ongoing)
12/21 - 01/22	**LA Highway 39 (East Judge Perez Drive) 3D Survey Scan, Port of New Orleans, St. Bernard Parish, LA**. BFM Corporation was selected by the Port of New Orleans to prepare a 3D Scan Survey for the project located near the Violet Canal. The survey included a 3D Scan underneath the elevated portion of LA Hwy 39, beginning approximately 525 feet southeast of the centerline of Violet Canal and continuing southeast; approximately 700 liner feet. The project included surveying the underside of the elevated roadway only; there was no topographic survey of the roadway surface. Mr. Poché served as the Engineering Liaison for BFM, interacting directly with the engineering firm as necessary. ($19,624 (fee); 2022)
06/20 - 02/21	**Almonaster Railroad Bridge 3D Scan Services, Inner Harbor Navigational Canal, New Orleans, LA**. BFM Corporation was selected to execute a 3-D Scan Survey of the Almonaster Railroad Bridge; the Scope of Services involved locating points on the Operating Strut. Subsequent points were taken with the bascule in the lowered, seated position. A second seat of shots were taken with the bascule span in the fully open position. BFM worked with the New Orleans Public Belt to set scheduling to execute the survey, as notice needed to be given to establish when the bridge could be raised and lowered to facilitate elements of the scanning process. Deliverables included a CSV file containing (a) Northing, (b) Easting, (c) Elevation, and (d) Description. Mr. Poché served as the Engineering Liaison for BFM, interacting directly with the engineering firm as necessary. ($14,500 (fee); 2021)

Firm employed by **BFM CORPORATION, LLC**			
Name	Gary J. Lambert, Jr., PLS	Years of relevant experience with this employer	4
Title	Registered Professional Land Surveyor	Years of relevant experience with other employer(s)	7

Degree(s) / Years / Specialization			B.S. / 2018 / Geomatics (Nicholls State University) B.S. / 2014 / Construction Management (Louisiana State University)
Active registration number / state / expiration date			0005259 / Louisiana / March 31 2023
Year registered	2021	Discipline	Registered Professional Land Surveyor
Contract role(s) / brief description of responsibilities			Project Manager/Drafting Supervisor

Experience dates (mm/yy–mm/yy)	Experience and qualifications relevant to the proposed contract; *i.e.*, "designed drainage", "designed girders", "designed intersection", etc. Experience dates should cover the time specified in the applicable MPR(s).
06/19 - 09/20	**Causeway Boulevard Overpass (over Airline Drive), Jefferson Parish, LA**. BFM's surveying services included Route Topographic and Boundary Survey for the project, which was located at the Causeway Boulevard Overpass of Airline Drive. This was designated as Phase 3 of the Rehabilitation Project, which included Ramps 4, 5, and the Traffic Circle. Drone Surveying services were also included. Mr. Lambert provided surveying services and oversaw drafting department work for the project. ($68,090 (fee); 2020)
06/20 – 09/22	**Almonaster Avenue Bridge Rehabilitation Project (DOTD H.014530), New Orleans, LA**. The existing Almonaster Avenue Bridge over the Inner Harbor – Navigation Canal (IH-NC) is a movable Strauss-heel trunnion bridge built circa 1920 and is owned and operated by the Board of Commissioners of the Port of New Orleans. The bridge carries two railroad tracks owned by CSX Transportation, Inc., and one vehicular lane in each direction; however, the vehicular lanes are closed. The Board, in conjunction with the Louisiana Department of Transportation and Development (LADOTD) and the City of New Orleans, wishes to modify the bridge and approach roadways. BFM was contracted to provide surveying services for multiple phases of the overall project, including topographic surveying, GPS static control, and survey line. Drone surveying is a key element. Mr. Lambert provided surveying services and oversaw drafting department work for the project. ($46,550 (fee); ongoing)
12/21 - 01/22	**LA Highway 39 (East Judge Perez Drive) 3D Survey Scan, Port of New Orleans, St. Bernard Parish, LA.** BFM Corporation was selected by the Port of New Orleans to prepare a 3D Scan Survey for the project located near the Violet Canal. The survey included a 3D Scan underneath the elevated portion of LA Hwy 39, beginning approximately 525 feet southeast of the centerline of Violet Canal and continuing southeast; approximately 700 liner feet. The project included surveying the underside of the elevated roadway only; there was no topographic survey of the roadway surface. Mr. Lambert provided surveying services and oversaw drafting department work for the project. ($19,624 (fee); 2022)
	Lapalco Boulevard Bridge at Harvey Canal, (PW 2017-046-RBP; DOTD H.004396), Jefferson Parish, LA. BFM Corporation provided extensive surveying services for a topographic survey and right-of-way (R/W) determination for the project. Project elements included setting GPS Static Control (5 permanent control points),

02/19 - 09/20	traversing a proposed survey line, and land topography surveying. Additional phases include hydrographic topography/bathymetric surveying of the project area, the right-of-way determination, and subsurface utility engineering (SUE). Drone Surveying was utilized throughout the project. A Route Topographic Survey was also included as part of the scope, as was Subsurface Utility Engineering (SUE). Mr. Lambert provided surveying services and oversaw drafting department work for the project. ($478,744 (fee); 2020)
03/19 - 05/19	**Metairie Road Smart Growth: Causeway Boulevard and Metairie Road, Metairie, Jefferson Parish, LA**. BFM prepared a topographic survey of the project site for the Metairie Road Smart Growth Program. This included Metairie Road beneath the Causeway Boulevard Overpass. BFM established a baseline parallel to Metairie Road, set up two temporary benchmarks (TBMs), and located all existing improvements. Cross sections for the project area were taken on a 25 ft. grid within established limits. Mr. Lambert provided surveying services and oversaw drafting department work for the project. ($12,660 (fee); 2019)
12/21 - 01/22	**LA Highway 39 (East Judge Perez Drive) 3D Survey Scan, Port of New Orleans, St. Bernard Parish, LA**. BFM Corporation was selected by the Port of New Orleans to prepare a 3D Scan Survey for the project located near the Violet Canal. The survey included a 3D Scan underneath the elevated portion of LA Hwy 39, beginning approximately 525 feet southeast of the centerline of Violet Canal and continuing southeast; approximately 700 liner feet. The project included surveying the underside of the elevated roadway only; there was no topographic survey of the roadway surface. Mr. Lambert provided surveying services and oversaw drafting department work for the project. ($19,624 (fee); 2022)

Firm employed by **BFM CORPORATION, LLC**			
Name	John Philip Thayer	Years of relevant experience with this employer	14
Title	Field Operations Supervisor	Years of relevant experience with other employer(s)	1

Degree(s) / Years / Specialization			Certificate / 2015 / Land Surveying Services B.S. / 2007 / Physical Education (Trevecca Nazarene University)
Active registration number / state / expiration date			N/A
Year registered	N/A	Discipline	N/A
Contract role(s) / brief description of responsibilities			Field Operations Supervisor

Experience dates (mm/yy–mm/yy)	Experience and qualifications relevant to the proposed contract; *i.e.*, "designed drainage", "designed girders", "designed intersection", etc. Experience dates should cover the time specified in the applicable MPR(s).
01/17 - 06/17	**Leo Lane at Bridge Washout Location, Tangipahoa Parish, LA**. BFM provided a Route Topographic Survey (FEMA) for the project; the full scope plan & profile included all services, utilities, properties, elevations and items necessary to perform any and all engineering and construction work. As Field Operations Supervisor, Mr. Thayer oversaw field work and execution of all field services associated with the project. ($9,330 (fee); 2017)
06/19 - 09/20	**Causeway Boulevard Overpass (over Airline Drive), Jefferson Parish, LA**. Provision of Route Topographic and Boundary Survey for the project, which was located at the Causeway Boulevard Overpass of Airline Drive. This was designated as Phase 3 of the Rehabilitation Project, which included Ramps 4, 5, and the Traffic Circle. Drone Surveying services were also included. As Field Operations Supervisor, Mr. Thayer oversaw field work and execution of all field services associated with the project. ($68,090 (fee); 2020)
12/21 - 01/22	**LA Highway 39 (East Judge Perez Drive) 3D Survey Scan, Port of New Orleans, St. Bernard Parish, LA**. The survey included a 3D Scan underneath the elevated portion of LA Hwy 39, beginning approximately 525 feet southeast of the centerline of Violet Canal and continuing southeast; approximately 700 liner feet. The project included surveying the underside of the elevated roadway only; there was no topographic survey of the roadway surface. As Field Operations Supervisor, Mr. Thayer oversaw field work and execution of all field services associated with the project. ($19,624 (fee); 2022)
02/10 - 11/13	**Wisner Boulevard Bridge over I-610 Reconstruction, New Orleans, LA**. BFM's services included measuring existing bridge panels and supports for replacement. BFM also surveyed underground utilities, rights of way, and servitudes for new bridge location. As Field Operations Supervisor, Mr. Thayer oversaw field work and execution of all field services associated with the project. ($15,232 (fee); 2013)
01/17 – 08/19	**DOTD H.010570, LA 49, Williams Boulevard from West Metairie Avenue to the I-10 East Ramp, Kenner, Jefferson Parish, LA**. BFM's surveying services for the project included topographic surveying along Williams Boulevard (LA 49) from 200 feet south of West Metairie Avenue to the I-10 East Ramp. Project involved multiple visits on an as-needed basis over several years. As Field Operations Supervisor, Mr. Thayer oversaw field work and execution of all field services associated with the project. ($117,732 (fee); 2019)

01/17 – 06/17	**Troy Spears Road at Bridge Washout Location, Tangipahoa Parish, LA**. BFM provided a Route Topographic Survey (FEMA) for the project; the full scope plan & profile included all services, utilities, properties, elevations and items necessary to perform any and all engineering and construction work. As Field Operations Supervisor, Mr. Thayer oversaw field work and execution of all field services associated with the project. ($11,730 (fee); 2017)
02/19 – 09/20	**Lapalco Boulevard Bridge at Harvey Canal, (PW 2017-046-RBP; DOTD H.004396), Jefferson Parish, LA**. BFM Corporation provided extensive surveying services for a topographic survey and right-of-way (R/W) determination for the project. Project elements included setting GPS Static Control (5 permanent control points), traversing a proposed survey line, and land topography surveying. Additional phases include hydrographic topography/bathymetric surveying of the project area, the right-of-way determination, and subsurface utility engineering (SUE). Drone Surveying was utilized throughout the project. A Route Topographic Survey was also included as part of the scope, as was Subsurface Utility Engineering (SUE). Mr. Thayer oversaw field work and execution of all field services associated with the project. ($478,744 (fee); 2020)
08/18 - 10/19	**DOTD H.013494, Louisiana Highway 52 (Phase 1; Blueberry Hill to Angus Drive), St. Charles Parish, LA**. BFM executed a Route Topographic Survey for the project; the full scope plan & profile included all services, utilities, properties, elevations and items necessary to perform any and all engineering and construction work. Project work in this multi-phase undertaking included GPS Static Control (Phase I; establishing the Survey Line and setting control points), Survey Line Traverse (Phase II; referencing 3-point ties, State Plane Coordinate System, and DOTD review), and Topography (Phase III; all topographic surveying elements, including location of utilities, cross sections, referencing drainage map, established record drawings referencing). Extensive records research was a key element of the project. Mr. Thayer oversaw field work and execution of all field services associated with the project. ($87,710 (fee); 2019)

17. **Firm Experience:**

Identify the team's project experience **most relevant** to the scope in the advertisement. **The projects should be limited to a total of 20, with no more than 5 projects being represented by the prime consultant and with no more than 3 projects represented by each sub-consultant on the team. If more than 5 projects are identified for the prime consultant, all projects identified after the first 5 will not be evaluated. If more than 3 projects are identified for a single sub-consultant, all projects identified after the first 3 from that sub-consultant will not be evaluated.** Include no more than one page per project. Projects identified shall only include work performed by firms on the team. The projects identified do not necessarily need to have been DOTD projects.

Firm name	**Infinity Engineering Consultants, LLC.**		Past Performance Evaluation Discipline(s)*	Bridge	
Project name	Joe Brown Park Bridge Replacement		Firm responsibility (prime or sub?)	Prime	
Project number	IEC-15-009	Owner's name	City of New Orleans		
Project location	New Orleans, LA		Owner's Project Manager	James Kapesis	
Owner's address, phone, email	1300 Perdido St., RM 6W03, NOLA 70112; jrkapesis@nola.gov; 504-658-8041				
Services commenced by this firm (mm/yy)	2/2015	Total consultant contract cost ($1,000's)		$73	
Services completed by this firm (mm/yy)	10/2017	Cost of consultant services provided by this firm ($1,000's)		$73	

Infinity performed the above and below deck condition inspection and evaluation of fourteen (14) bridges around the City of New Orleans. The fourteen bridges located throughout New Orleans consisted of a variety of materials, including concrete, timber, and steel.

The City of New Orleans required that these bridges be inspected and that structural analyses be performed in order to assign load ratings as per AASHTO requirements. Infinity determined that the majority of the bridges met the AASHTO load rating requirements, and proscribed remedial repairs or replacement for those that did not. Among these bridges were three in Joe Brown Park in New Orleans East. One bridge was found to be in poor condition such that it was Infinity's official recommendation for the bridge to be removed from service.

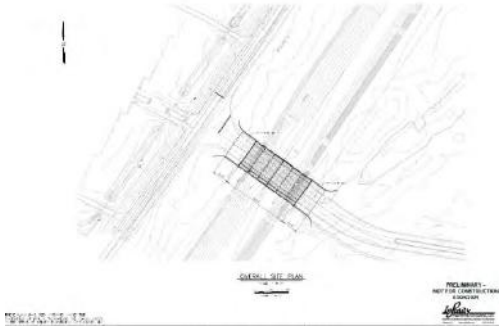
After careful analysis of the bridge inspection, Infinity recommended to the City of New Orleans for a bridge to be replaced in Joe Brown Park. Infinity provided the engineering designs for a complete replacement of the bridge. The project included the demolition of the old bridge, its support piers, abutments, and approach paving; installation of new pilings and caps; installation of new deck panels, new abutments, and new approach slabs; and the establishment of new traffic markings and striping within the limits of construction.

Infinity engineers involved with project: William Thomassie, P.E; Rachel Kenney, P.E.; Ricardo Contreras, P.E.

17. **Firm Experience:**

Firm name	**Infinity Engineering Consultants, LLC.**		Past Performance Evaluation Category(ies)*	Bridge	
Project name	Alvin Calendar Airfield Vehicular Bridge		Firm responsibility (prime or sub?)	Sub	
Project number	IEC-20-019	Owner's name	STOA Architects		
Project location	Belle Chase, LA		Owner's Project Manager	Robert McClendon	
Owner's address, phone, email	121 E. Government St, Pensacola, FL 32502; 850-432-1912; mcclendon@stoaarchitects.com				
Services commenced by this firm (mm/yy)	9/20	Total consultant contract cost ($1,000's)		N/A	
Services completed by this firm (mm/yy)	2/2023 (E)	Cost of consultant services provided by this firm ($1,000's)		$86	

Infinity is providing structural designs for this naval air station project. The structural designs include the establishment of a new vehicular bridge that will span across a drainage canal that parallels Barrier Road. Upon completion, this bridge will be approximately 50 feet wide by 160 feet in length and will include approach spans at both ends.



While the bridge is essentially level, the designs call for the bridge to uniformly elevated to span the canal and align with target grades, which is slightly higher than existing ground surfaces. Initial designs called for the bridge to be two lanes; however, it has been revised to be a four-lane bridge with concrete spans. Infinity has created structural designs for the reinforced abutment, pile support, lateral retaining walls, wing walls, and bridge deck. All bridge designs were developed in accordance with ASHTO guidelines.

The detailed designs for the bridge include the following:

- Pile Selection and Specification
- Pile Cap Design
- Abutment Design Including Lateral Retaining Walls
- Bridge Deck Design

Infinity engineers involved with project: William Thomassie, P.E; Rachel Kenney, P.E.; Ricardo Contreras, P.E.; Louis Jackson, P.E.

17. **Firm Experience:**

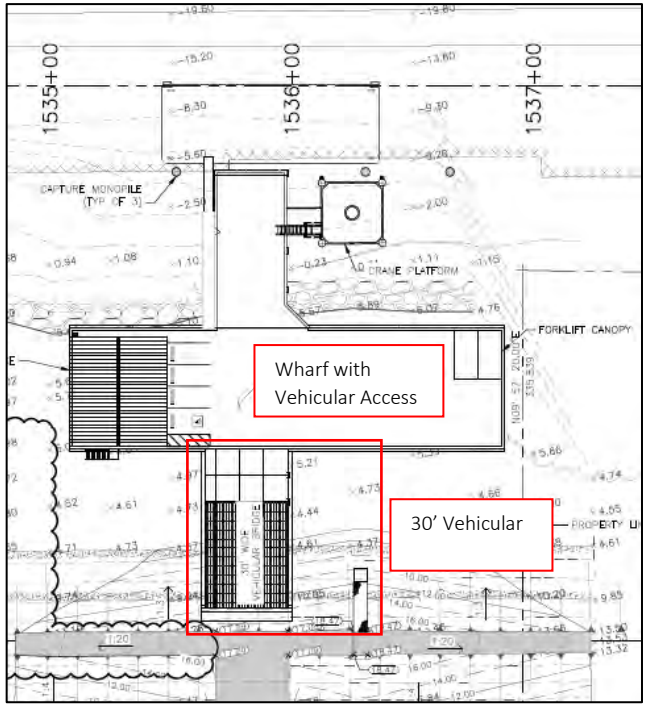
Firm name	**Infinity Engineering Consultants, LLC.**			Past Performance Evaluation Category(ies)*	Bridge
Project name	Port Ship Service Bridge Design			Firm responsibility (prime or sub?)	Prime
Project number	IEC 18-022	Owner's name	Plaquemines Parish Port & Terminal		
Project location	Myrtle Grove, LA		Owner's Project Manager	Paul Matthews	
Owner's address, phone, email	8056 Highway 23, 3rd Floor, Belle Chasse, LA 70037; 504-682-7920 ; pmattews@pphtd.com				
Services commenced by this firm (mm/yy)	05/19	Total consultant contract cost ($1,000's)		$203	
Services completed by this firm (mm/yy)	Bidding Phase	Cost of consultant services provided by this firm ($1,000's)		$203	

Infinity is the prime consultant for the design and construction a new facility for the Port Ship Service Myrtle Grove within the Plaquemines Parish Port & Terminal. The current facility site is being allocated for new development, which necessitated the building of a new wharf structure and office building with vehicular and machine access. Infinity is providing civil, structural, mechanical, and electrical design services.

The civil/structural design components include the following:

- Relocation of the floating barge dock, including capture piles and yokes
- 30' vehicular bridge with slope stabilization to the bank
- Concrete wharf structure with vehicular access
- Road extension access to Highway 23 with lane stripping
- 25' x 50' steel framed loading platform with concrete abutment
- 25' x 25' steel framed crane platform
- All designs were developed in accordance with ASHTO guidelines

Infinity engineers involved with project: William Thomassie, P.E; Rachel Kenney, P.E.; Louis Jackson, P.E.



17. **Firm Experience:**

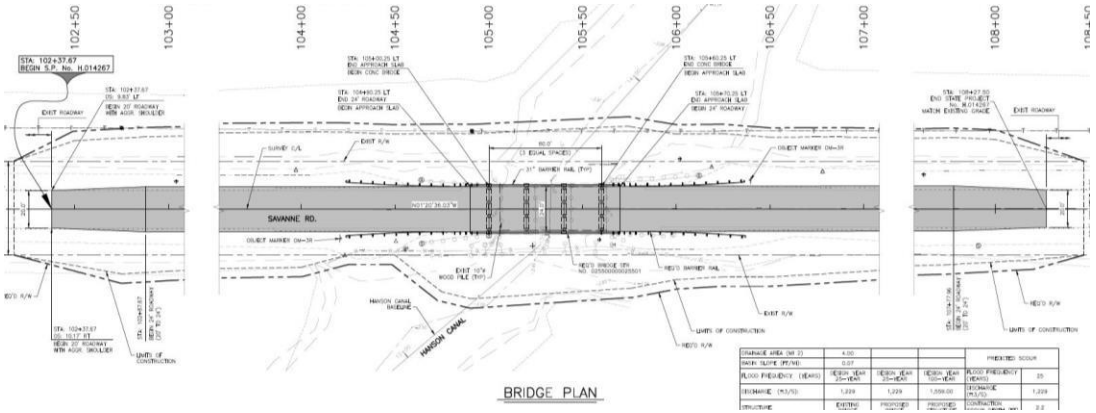
Firm name	**Infinity Engineering Consultants, LLC.**		Past Performance Evaluation Category(ies)*	Bridge	
Project name	Off-System Highway Bridge Program Savanne Road Over Hanson Canal		Firm responsibility (prime or sub?)	Prime	
Project number	Contract No. 4400019314	Owner's name	Louisiana Department of Transportation & Development		
Project location	Houma, LA		Owner's Project Manager	Barbara Ostuno, P.E.	
Owner's address, phone, email	1201 Capitol Access Road, Baton Rouge, LA 70802; 225-379-1047; Barbara.ostuno.la.gov				
Services commenced by this firm (mm/yy)	5/21	Total consultant contract cost ($1,000's)		$55	
Services completed by this firm (mm/yy)	Est. 5/23	Cost of consultant services provided by this firm ($1,000's)		$32	

As part of the Louisiana DOTD Off-System Highway Bridge program, Infinity Engineering has commenced engineering design work on the replacement of the bridge along Savanne Road crossing over Hanson Canal in Houma, Louisiana. As the prime, Infinity will provide all structural/civil engineering designs for the bridge replacement as well as coordinate all land surveying and environmental services. Infinity has ensured all proper safety measures for flagging and traffic control are followed during site visits, surveying, and measurements.

For the preliminary plans of the project, a hydraulic design was performed to the specified DOTD Hydraulics manual to ascertain all viable drainage design options for the bridge. Additionally, Infinity coordinated with ELOS Environmental to identify and properly delineated all impacted wetlands to the Corps of Engineers guidelines.

If called upon Infinity's engineers have the capabilities to see this project through final design and construction administration.

Infinity engineers involved with project: Ricardo Contreras, P.E.; Louis Jackson, P.E.; Kevin Hurtt, E.I.



17. **Firm Experience:**

Firm name	**Infinity Engineering Consultants, LLC.**	Past Performance Evaluation Category(ies)*	Bridge
Project name	Shintec Water Intake Vehicular Bridge and Platform	Firm responsibility (prime or sub?)	Prime
Project number	IEC-21-009	Owner's name	Shintech Louisiana
Project location	Plaquemine, LA	Owner's Project Manager	Nathan Ferrington
Owner's address, phone, email	LA-1, Plaquemine, LA 70764 225-684-2105; nferrington@shin-tech.com		
Services commenced by this firm (mm/yy)	04/21	Total consultant contract cost ($1,000's)	$249
Services completed by this firm (mm/yy)	3/2023 (E)	Cost of consultant services provided by this firm ($1,000's)	$249

Infinity has been tasked with providing engineering services related to the design of a new water intake platform for Shintech's SPP3 plant in Plaquemine, LA. This is a multi-disciplinary design consisting of field services, civil, structural, mechanical, electrical and instrumentation.

The civil and structural scope consists of the design of the following:

- Heavy equipment concrete bridge to the new platform
- Vehicular levee crossing
- Piling and concrete foundations
- Steel platform and drift deflector

Additionally, Infinity is tasked with specifying a jib crane and designing the platform to accommodate the crane loads. Finally, Infinity is to update the calculations for the existing structure to include a load analysis of proposed piping. The mechanical tasks include the design of the above ground piping from the pump station to the piperack bridge at the levee. This includes preparing ortho drawings, a comprehensive 3D model, isometric drawings, pipe support details, and general arrangements of the equipment. Infinity is to perform a pipe stress calculation, a hydraulic analysis, and participate in HAZOP. The electrical and instrumentation scope primarily included the design of the power distribution and grounding components of the electrical system and the instrumentation components of the project.

The field services scope contained performing hydrographic and topographic surveys of the existing site conditions as well as capturing the conditions with drone photography and videography.

Infinity engineers involved with project: Cindy Gallo, P.E.; Louis Jackson, P.E.; Ricardo Contreras, P.E

17. **Firm Experience:**

Firm name	Matrix New World Engineering	Past Performance Evaluation Discipline(s)*	Environmental
Project name	Sherwood Forest Extension (Greenwell Springs Road to Joor Road)	Firm responsibility (prime or sub?)	Prime
Project number	20-CP-HC-0014	Owner's name	City of Baton, Parish of East Baton Rouge
Project location	Sherwood Forest Extension (Greenwell Springs Road to Joor Road)	Owner's Project Manager	Tom Stephens
Owner's address, phone, email	3773 Harding Boulevard, Baton Rouge, (225) 389-3000, tstephens@brla.gov		
Services commenced by this firm (mm/yy)	09/20	Total consultant contract cost ($1,000's)	$27
Services completed by this firm (mm/yy)	Ongoing	Cost of consultant services provided by this firm ($1,000's)	$27

Matrix New World Engineering (Matrix) was selected by the City of Baton Rouge and Parish of East Baton Rouge to conduct wetland delineation fieldwork, wetland data reports and jurisdictional determination requests for the MOVEBR project Sherwood Forest Extension (Greenwell Springs Road to Joor Road). The proposed project consists of a new bridge crossing the Comite River.

Matrix staff (Chad Turner, Angela Singletary, and Lee Womack) were responsible for conducting the wetland delineation and obtaining a preliminary jurisdictional determination for the proposed project corridor. The proposed project consisted of a new two-lane roadway connecting Sherwood Forest to Joor Road, with a new bridge spanning the Comite River. The limits of delineation for the proposed project totaled 246.31 acres. During the field work, Matrix staff encountered multiple land uses/habitats, including an active construction landfill, a co-located pipeline and powerline right-of-way, abandoned sewage disposal ponds, and native hardwood forests typical of the Comite River floodplain. Matrix staff documented and mapped 62.67 acres of jurisdictional wetlands. Additionally, 52.70 acres of non-wetland waters were documented. Of that total, 49.98 acres were Section 10 waters, which are areas determined to be within the mean high water mark of the Comite River. This determination was made based on observed evidence of high water marks in the field, as well as calculated mean high water elevations based on water gages and point cloud LIDAR data. The preliminary jurisdictional determination was received on 5/18/2021 without requiring a site visit with the USACE.

Additionally, Matrix will be providing assistance to Atlas Technical Consultants during the Preliminary Design phase. During this phase, Atlas will develop multiple corridor alignment alternatives, analyzing impacts on key analysis criteria such as environmental, wetlands, drainage, and traffic impacts. Matrix will provide assistance on tasks including, but not limited to, preliminary corridor survey, design constraints corridor, design study, alternatives analysis, alignment selection, wetland/floodplain impact analysis, East Baton Rouge Parish fill mitigation ordinance, cost/benefit analysis, green infrastructure planning, and wetland mitigation cost analysis.

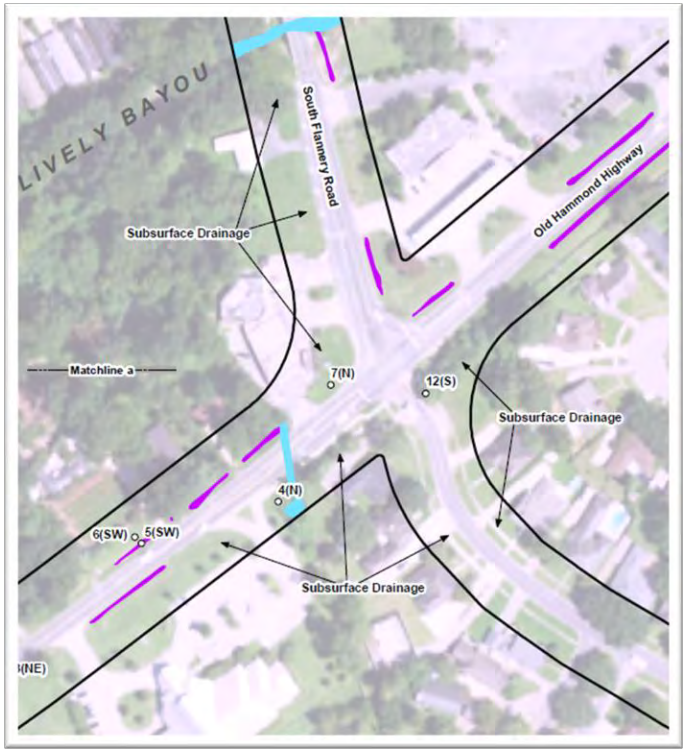
17. **Firm Experience:**

Firm name	Matrix New World Engineering		Past Performance Evaluation Discipline(s)*	Environmental	
Project name	Old Hammond Highway, Segment 1, Phases A & B		Firm responsibility (prime or sub?)	Prime	
Project number	06-CS-HC-0028	Owner's name	City of Baton Rouge		
Project location	East Baton Rouge Parish, LA		Owner's Project Manager	Tom Stephens	
Owner's address, phone, email	3773 Harding Boulevard, Baton Rouge, (225)389-3000, tstephens@la.gov				
Services commenced by this firm (mm/yy)	02/20	Total consultant contract cost ($1,000's)		$27	
Services completed by this firm (mm/yy)	Ongoing	Cost of consultant services provided by this firm ($1,000's)		$27	

Matrix New World Engineering (Matrix) was selected by the City of Baton Rouge and Parish of East Baton Rouge to conduct wetland delineation fieldwork, wetland data reports and jurisdictional determination requests, and U.S. Army Corps of Engineers permitting for two MOVEBR Projects, Old Hammond Highway, Segment 1, Phases A and B.

Matrix staff (Chad Turner and Angela Singletary) were responsible for conducting the wetland delineation and obtaining an Approved Jurisdictional Determination (under the newly promulgated Navigable Waters Protection Rule) for the proposed project corridor. The proposed project consisted of widening Old Hammond Highway from 4 to 6 lanes, with a roundabout at Flannery Rd. and additional pedestrian facilities. The project corridor, totaling 1.25 miles in length, encompassed one bridge over Lively Bayou and multiple cross culverts. Matrix staff collected thorough and sufficient field data to determine that 0.41 acres of wetlands and 1.41 acres of non-wetland waters were non-jurisdictional under the Navigable Waters Protection Rule. Two separate approved jurisdictional determination were received for the projects: on 11/17/2020 for Phase A and 5/13/2021 for Phase B.

Currently, Matrix is preparing Pre-Construction Notifications for Nationwide Permit 14 for submittal to the USACE New Orleans District, Central Evaluation Section.



17. **Firm Experience:**

Firm name	Matrix New World Engineering		Past Performance Evaluation Discipline(s)*	Environmental	
Project name	Bluebonnet Boulevard (Perkins Road to Picardy Boulevard)		Firm responsibility (prime or sub?)	Prime	
Project number	20-CP-HC-0034	Owner's name	City of Baton Rouge		
Project location	East Baton Rouge Parish, LA		Owner's Project Manager	Tom Stephens	
Owner's address, phone, email	3773 Harding Boulevard, Baton Rouge, (225)389-3000, tstephens@la.gov				
Services commenced by this firm (mm/yy)	02/20	Total consultant contract cost ($1,000's)		$14	
Services completed by this firm (mm/yy)	Ongoing	Cost of consultant services provided by this firm ($1,000's)		$14	

Matrix New World Engineering (Matrix) was selected by the City of Baton Rouge and Parish of East Baton Rouge to conduct wetland delineation fieldwork, wetland data reports and jurisdictional determination requests, and U.S. Army Corps of Engineers permitting for the MOVEBR project Bluebonnet Boulevard (Perkins Road to Picardy Boulevard).

Matrix staff (Chad Turner and Angela Singletary) were responsible for conducting the wetland delineation and obtaining a preliminary jurisdictional determination for the proposed project corridor. The proposed project consisted of widening Bluebonnet Boulevard from 4 to 6 lanes, with the addition of new pedestrian facilities. The project corridor totaled 0.96 mile in length, and included the existing concrete girder bridge over Dawson Creek. Matrix staff documented and mapped 0.27 acre of wetlands and 0.24 acre of non-wetland waters. The preliminary jurisdictional determination was received on 9/25/2020.

Upon receipt of design plans from MOVEBR, Matrix will prepare the appropriate USACE permit application and drawings for submittal to the New Orleans District, Central Evaluation Section. It is anticipated that this project would qualify for coverage under Nationwide Permit 14.

17. **Firm Experience:**

Firm name	BFM CORPORATION, LLC		Past Performance Evaluation Discipline(s)*	Survey	
Project name	Lapalco Boulevard Bridge at Harvey Canal		Firm responsibility (prime or sub?)	SUB	
Project number	DOTD H.004396 JPPW 2017-046-RBP	Owner's name	Hardesty & Hanover		
Project location	Jefferson Parish, Louisiana		Owner's Project Manager	Dr. Babak Naghavi, P.E.	
Owner's address, phone, email	3850 N Causeway Blvd Ste 1850, Metairie LA 70002, 504-962-9212, bnaghavi@hardestyhanover.com				
Services commenced by this firm (mm/yy)	02/19	Total consultant contract cost ($1,000's)	N/A		
Services completed by this firm (mm/yy)	09/20	Cost of consultant services provided by this firm ($1,000's)	$478.7		

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

BFM Corporation provided extensive surveying services for a topographic survey and right-of-way (R/W) determination for the project. Project elements included setting GPS Static Control (5 permanent control points), traversing a proposed survey line, and land topography surveying. Additional phases include hydrographic topography/bathymetric surveying of the project area, the right-of-way determination, and subsurface utility engineering (SUE). Drone Surveying was utilized throughout the project. A Route Topographic Survey was also included as part of the scope, as was Subsurface Utility Engineering (SUE).

BFM firm members featured in this proposal included Ralph P Fontcuberta, Jr, PLS; Chad M. Poché, P.E.; John Philip Thayer, and; Gary J. Lambert, Jr., LSI.

17. **Firm Experience:**

Firm name	BFM CORPORATION, LLC		Past Performance Evaluation Discipline(s)*	Survey	
Project name	Almonaster Avenue Bridge Rehabilitation Project		Firm responsibility (prime or sub?)	SUB	
Project number	DOTD H.014530	Owner's name	Hardesty & Hanover		
Project location	New Orleans, Louisiana		Owner's Project Manager	Dr. Babak Naghavi, P.E.	
Owner's address, phone, email	3850 N Causeway Blvd Ste 1850, Metairie LA 70002 504-962-9212, bnaghavi@hardestyhanover.com				
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)	9/22	Cost of consultant services provided by this firm ($1,000's)		$46.6	

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

The existing Almonaster Avenue Bridge over the Inner Harbor – Navigation Canal (IH-NC) is a movable Strauss-heel trunnion bridge built circa 1920 and is owned and operated by the Board of Commissioners of the Port of New Orleans. The bridge carries two railroad tracks owned by CSX Transportation, Inc., and one vehicular lane in each direction; however, the vehicular lanes are closed.

The Board, in conjunction with the Louisiana Department of Transportation and Development (LADOTD) and the City of New Orleans, wishes to modify the bridge and approach roadways. BFM was contracted to provide surveying services for multiple phases of the overall project, including topographic surveying, GPS static control, and survey line. Drone surveying is a key element

BFM firm members featured in this proposal included Ralph P Fontcuberta, Jr, PLS; Chad M. Poché, P.E.; John Philip Thayer, and; Gary J. Lambert, Jr., LSI.

17. **Firm Experience:**

Firm name	BFM CORPORATION, LLC		Past Performance Evaluation Discipline(s)*	Survey	
Project name	Almonaster Railroad Bridge 3D Scan Services		Firm responsibility (prime or sub?)	SUB	
Project number	N/A	Owner's name	Hardesty & Hanover		
Project location	Inner Harbor Navigational Canal, New Orleans, Louisiana		Owner's Project Manager	Dr. Babak Naghavi, P.E.	
Owner's address, phone, email	3850 N Causeway Blvd Ste 1850, Metairie LA 70002 504-962-9212, bnaghavi@hardestyhanover.com				
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)	02/21	Cost of consultant services provided by this firm ($1,000's)		$14.5	

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

BFM Corporation was selected to execute a 3-D Scan Survey of the Almonaster Railroad Bridge; the Scope of Services involved locating points on the Operating Strut. Subsequent points were taken with the bascule in the lowered, seated position. A second seat of shots were taken with the bascule span in the fully open position. BFM worked with the New Orleans Public Belt to set scheduling to execute the survey, as notice needed to be given to establish when the bridge could be raised and lowered to facilitate elements of the scanning process. Deliverables included a CSV file containing (a) Northing, (b) Easting, (c) Elevation, and (d) Description

BFM firm members featured in this proposal included Ralph P Fontcuberta, Jr, PLS; Chad M. Poché, P.E.; John Philip Thayer, and; Gary J. Lambert, Jr., LSI.

18. **Approach and Methodology:**

It is our understanding that the LADOTD seeks to develop preliminary engineering plans for the replacement of a bridge along a two-lane roadway in Chalmette, Louisiana. Infinity Engineering Consultants is a Metairie, Louisiana-based firm, located just twenty-five minutes from the project site. With Infinity's unique multi-disciplinary skill sets and structural engineering experience, the firm is well positioned to project manage the preliminary, Stage 3, design phase of the proposed off-system bridge replacement.

We have reviewed the background information provided in the RFQ documents and took time to study the geography surrounding the bridge. The Patricia Street bridge provides one of three entry points into a densely populated residential neighborhood. Patricia Street provides access to serval commercial entities, including the local Walmart and The Home Depot. While there are other roadways providing access to the surrounding residential neighborhood, studying traffic patterns will prove important in assessing the best timing for roadway closures. Additionally, with the surrounding residential properties, verifying the slope stability of the canal embankments near the replacement bridge will be crucial.

Patricia Street Over Chalmette Vista Canal

As outlined in the scope of services, beyond engineering design, this contract requires topographic survey, right of way sketches, and environmental reporting to be performed. To perform this project, Infinity has assembled a talented team of professionals, all familiar with the local site conditions and experience in preparing supporting information for the design of a new bridge. The responsibilities of each team member are as follows:

INFINITY ENGINEERING CONSULTANTS, LLC:

- Project Management, Civil Engineering, Structural Engineering, Cost Estimating

BFM Corporation, LLC.:

- Topographic, Right-of-Way Sketches

Matrix New World Engineering:

- Wetland Identification and Delineation, Wetlands Finding Report, Environmental Clearance

Infinity Engineering has been integrally involved with the engineering design and reconstruction of several public and private bridge projects. Among those similar to this RFQ were the design packages for the LADOTD off-system bridge replacement of bridges along Savanne Road in Houma, LA and North River Road in Tangipahoa Parish. The design packages Infinity prepared included engineering and environmental regulatory permitting for the preliminary designs for the replacement of these off-system bridges. Therefore, Infinity Engineering is familiar with the standards and practices required when designing an off-system bridge for LADOTD, including flagger safety and cybersecurity training protocols. As a company, we commit to continuing to follow those standards of providing quality design solutions.

PRELIMINARY PHASE

For the Patricia Street bridge replacement project, Infinity's method of execution will include several deliberate steps. We envision that during the preliminary phase we will explore several proven concepts to address the unique design conditions that ultimately led to the poor rating of the previous bridge structures. These will potentially include designing for conditions that may result from scouring, including armoring and reverting

the waterway bottom and providing positive groundwater drainage. These are design concepts that will be fully vetted out.

Some may prove feasible and beneficial, and other concepts may be added as the process evolves. Upon conclusion of the preliminary phase, Infinity will present our findings and recommendations in a report that we will review with DOTD. We intend for the design process to be a collaborative effort between our team and the Owner. With a mutually agreeable concept, we will move forward to the next phase.

The Preliminary Phase will be critical as it will serve to firmly identify and quantify the special design conditions that the replacement bridge project must entail. To determine the most logical and feasible solution, during this phase we intend to:

1. Meet with the Owner's representatives to collect record information for the sites; such as:
    a. Typical bridge traffic type, frequency, and magnitude
    b. Previous construction plans, surveys, and geotechnical studies
2. Obtain data regarding the drainage, and historical flow data as it pertains to the site.
3. Review previous geotechnical reports that are on file.
    a. Review the geologic history of the region and site.
    b. Devise conceptual solutions for a replacement bridge structure as it pertains to soil matters.
    c. Develop a field exploration plan and obtaining new soil borings for the site.
4. Coordinate with the surveyor (SJB Group) and the design team to:
    a. Perform a topographic survey of the existing waterway, embankment, and roadway near the bridge to identify and study the surface profiles of the site.
    b. Perform a topographic survey to locate existing features
    c. Prepare a Right of Way sketch.
5. Perform a hydraulic design to determine drainage alternatives.
6. Prepare documentation for solicitation of views and categorical exclusion.
7. Prepare permit drawings for use in obtaining COE Environmental Clearance permits (ELOS), as required.
8. Prepare a Wetland Study (ELOS)
    a. Conduct ground level investigation to verify the right of way.
    b. Locate wetlands on a quadrangle sheet and layout map.
    c. Document soil samples.
    d. Prepare Wetland Determination Data Form with GPS sample point locations.
9. Develop a preliminary design for the replacement bridges based on the data collected and research performed in the preceding steps.
10. Prepare an estimated construction cost estimate for the proposed design.
11. Prepare a preliminary report summarizing the above documentation and preliminary plan.

SCHEDULE

The overall time for the completion of the scope of services listed in the RFQ is (4) years. Upon notice to proceed and executed contract, we anticipate

the final submittal of deliverables to occur within 4 years, or sooner. This is also contingent upon timely receipt of comments and information from DOTD and barring any unforeseen conditions outside of our control.

Environmental Clearance & Wetland Delineation

Solicitation of Views and Categorical Exclusion/Environmental Clearance

Immediately following approval of the replacement structures, Matrix will distribute Solicitation of Views to the appropriate parish mailing list as provided by the DOTD Environmental Section. The Solicitation of Views packet will contain a concise project description and appropriate project location maps. Comments received from the Solicitation of Views will be complied, and the appropriate Categorical Exclusion Clearance Documentation will be prepared, including the environmental checklist and appropriate permit drawings. It is anticipated that the Categorical Exclusion Clearance Documentation can be completed within 90 days of notice to proceed.

Wetland Studies

Matrix biologists will review available aerial imagery, topographic maps, soils data, and elevation data prior to field surveys to determine anticipated ground conditions. Once the Limits of Construction are determined, Matrix will mobilize qualified biologists to perform a wetland delineation, collecting field data on the three wetland parameters (soils, vegetation, and hydrology) in accordance with the Corps of Engineers Wetlands Delineation Manual (U.S. Army Corps of Engineers, Waterways Experiment Station 1987) and the Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Atlantic and Gulf Coastal Plain Region (U.S. Army Corps of Engineers, Wetland Regulatory Assistance Program 2010), as well as subsequent New Orleans District wetland delineation requirements. Wetland and waters boundaries, along with sampling point locations, will be mapped using sub-centimeter-accuracy Global Positioning System (GPS) units.

The Wetland Findings Reports will contain concise narratives on the three wetland parameters, (routine wetland determination forms, copies of high-resolution site photographs, soils information, and maps showing areas of potential jurisdictional wetlands and other waters of the United States (i.e., non-wetland waters). The Wetland Findings Reports will also contain all appropriate maps/figures, including but not limited to, a vicinity (street) map, site location (topographic) map, site plan, wetland habitat map, soils map, LIDAR map, infrared aerial map(s), and true color aerial map(s). It is anticipated that field visits can be scheduled within 10 business days of determining the limits of construction, and that field data collection will take 1 day. The Wetland Findings Report can be provided to the DOTD Environmental Section for review within 10 business days of completion of the field surveys.

ADDITIONAL PROJECT REQUIERMENTS

Cyber Security: As a company, Infinity understands the importance of keeping public/private clients' information confidential and safe. Maintaining sound practices and education in cyber security is the best way to keep digital documents safe from potential cyber threats. Infinity has a program in place to deliver monthly employee information seminars that cover a wide range of best practices to ensure workplace safety. These seminars have touched on the subjects of cyber security. If called upon for this contract, Infinity will ensure additional cyber security training will be provided to the Infinity employees who have access to DOTD systems and information.

Work Zone Training: Infinity is committed to maintaining safe working conditions. Currently, Project Manager, Ricardo Contreras, P.E., is certified in Traffic Control Technician and Traffic Control Supervisor courses. Mr. Contreras will be present onsite when fieldwork is conducted by Infinity engineers. If called upon, Infinity will ensure additional members of the field engineering team to become certified in traffic control processes

State Funding: Infinity recognizes that the project will be subject to State and federal funding guidelines. To date, Infinity has completed multitudes of projects that were state and/or federally funded through DOTD, LED, FTA, FEMA, Community Development Block Grants, etc. Our staff is familiar with providing the documentation and communication necessary to meet the requirements of these agencies.

Public Agencies: Infinity Engineering has extensive experience working with Public agencies, in the role of prime consultant, successfully completing projects exclusively with our own forces, managing teams of several consultants, or as a subconsultant. We are familiar with typical procedures for design and contractual policies. We carry professional and general liability insurance that often exceeds that required by public agencies.

Capacity: Because we do not currently have a significant backlog of work beyond 2023's 1st quarter, if selected for this contract, Infinity is well positioned to focus on the needs of LADOTD. With (10) Civil/Structural engineers on staff, we will have roughly 12,000 of potential engineering man-hours available going into 2023. This does not include the added depth of our subconsultants and our drafting staff.

Reputation and References: Infinity has been in business for 18 years. We pride ourselves on customer satisfaction and this is typically accomplished by producing good work for projects we are contracted to complete. As consultants, the most important element of our existence is our reputation. A good reputation takes years to develop, but when established, allows for promoting the company to be that much easier. Often, new projects are acquired from past performance or from referrals. Infinity has a great track record for repeat customers and referrals and shares a favorable reputation in the local engineering and business community. As evidence of that, it is best to point to the kind words written on our behalf in both the public and private sector that speak to Infinity's professionalism, quality of work, respect for cost and budget, and schedule.

Mark Harrell, COO-Livingston Parish "This was Infinity's first-time performing engineering design services for the Parish and I am writing today to say we are beyond pleased with the results."

Tim Mathison, Former CAO, City of Slidell "Both of these roadway projects were completed on time and within budget. Infinity's employees were professional, knowledgeable, and a pleasure to work with. They were responsible with the budget and cognizant of the needs of the City throughout both projects. I would recommend Infinity for their design capabilities, as well as their professional approach to project management."

Minimum Personnel Requirements: Infinity has ensured our team outlined in the proceeding 24-102 form meets and exceeds the minimum personnel requirements as outlined in LADOTD's project advertisement. The individuals who satisfy those minimum personnel requirements include:

- Raoul V. Chauvin, P.E. and William Thomassie, P.E. are Infinity's principal partners who are registered professional engineers in the State of Louisiana
- Louis Jackson, P.E. and Rachel Kenney, P.E. are responsible members of the Infinity team who are currently registered in the State of Louisiana as a professional engineer in civil engineering.
- Ricardo Contreras, P.E. will serve as the project manager and holds over five years of experience in responsible charge of bridge design as a registered professional engineer in the State of Louisiana
- Gary Lambert, Jr., PLS is BFM Corporation's professional land surveyor registered in Louisiana with over five years of experience
- Chard Turner is Matrix New World's environmental professional with at least five years of experience in wetlands delineation

DBE Certification: Infinity is a registered Disadvantaged Business Enterprise (DBE) certified with the City of New Orleans, Sewerage and Water Board, and the Louisiana Certification Program (LAUCP). Infinity Engineering has also been certified by the Louisiana Department of Economic Development as a Small and Emerging Business Enterprise (SEBD).

19. **Workload:**

For all contracts where a firm on the team is a prime consultant or sub-consultant and where a) the consultant selection was made by DOTD, and b) a contract was executed by the consultant and the contracting entity by the date the advertisement for this proposal was posted, list all work meeting the following criteria:

1) one of the team's firms is responsible for the performance of the work;
2) authorization to perform the work has been provided, as provided in the contract between the consultant and the contracting entity;
3) the work has not yet been performed and invoiced; and
4) the work is not currently suspended for an indefinite period of time.

For indefinite delivery/indefinite quantity (IDIQ) contracts, list open Task Orders individually.
List only the portion of the fees attributable to firms on the team.

Firm(s)	Past Performance Evaluation Discipline(s) *	State project number	Project name	Remaining Unpaid Balance**
Infinity Engineering Consultants, LLC.	Bridge	H.014267.5	Off-System Highway Bridge Program Savanne Road Over Hanson Canal	$45,096
Infinity Engineering Consultants, LLC.	Bridge	H.014265.5	Off-System Highway Bridge Program North River Road Over Irving Branch	$45,096
Matrix New World Engineering	Not Applicable	Not Applicable	Not Applicable	Not Applicable
BFM Corporation, LLC	Not Applicable	Not Applicable	Not Applicable	Not Applicable

(Add rows as needed) DO NOT SUM

* 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. If a firm has more than one past performance evaluation discipline for any single project, the firm can use multiple rows to express the remaining unpaid balance per evaluation discipline.

** Round to the nearest dollar. **Do not** round to the nearest thousands. If there are no active contracts with a remaining unpaid balance, place N/A in the Remaining Unpaid Balance column. LEAVING THE "REMAINING UNPAID BALANCE" COLUMN BLANK IS NOT ACCEPTABLE.

20. **Certifications/Licenses:**

If the advertisement requires submission of licenses and/or certificates, include them here. Otherwise, leave this section blank.

ATSSA TRAINED

PROOF OF TRAINING

THIS CERTIFICATE HEREBY RECOGNIZES THAT

Ricardo Contreras
has attended
Traffic Control Technician-LA State Specific
Training Course

4/28/2020 to 4/28/2020
Date

Baton Rouge, LA
Location

Vice President of Member Services

President, CEO

ATSSA American Traffic Safety Services Association ATSSA.com

ATSSA TRAINED

PROOF OF TRAINING

THIS CERTIFICATE HEREBY RECOGNIZES THAT

Ricardo Contreras
has attended
Traffic Control Supervisor-LA State Specific
Training Course

4/29/2020 to 4/30/2020
Date

Location

Vice President of Member Services

President, CEO

ATSSA American Traffic Safety Services Association ATSSA.com

LED LOUISIANA ECONOMIC DEVELOPMENT

DIVISION OF SMALL BUSINESS SERVICES

This certification acknowledges that

Infinity Engineering Consultants, LLC

is Certified-Active as a Small Entrepreneurship with Louisiana Economic Development's Hudson Initiative.

This certification is valid from 7/22/2022 to 7/22/2023

Certification No. 8402

Stephanie Hartman,
Director, Small Business Services

The Louisiana Professional Engineering and Land Surveying Board has the following information on file:

Name:	Public Address:
Infinity Engineering Consultants, LLC	Mr. William Thomassie4001 Division Street Metairie, Louisiana 70002

License/Certificate Information w/ Supervision

License	Status	First Issuance Date	Expiration Date	Supervisor(s)
EF.0003109	Active	03/09/2004	09/30/2024	Mr. William John Thomassie # PE.0027421 ; Mr. Raoul Vincent Chauvin III # PE.0028272

Matrix New World Engineering

The Louisiana Professional Engineering and Land Surveying Board has the following information on file:

Name:	Public Address:
Matrix New World Engineering, Land Surveying and Landscape Architecture, P.C., A Professional Corporation	2798 Oneal Lane, Bldg. F Baton Rouge, Louisiana 70816-3407

License/Certificate Information w/ Supervision

License	Status	First Issuance Date	Expiration Date	Supervisor(s)
EF.0004961	Active	12/02/2011	03/31/2024	Ms. Jayne Margaret Warne # PE.0036635 ; Mr. Paul Timothy Calabrese # PE.0040367

BFM Corporation, LLC.

The Louisiana Professional Engineering and Land Surveying Board has the following information on file:

Name:	Public Address:
BFM Corporation, LLC	15 Veterans Memorial Boulevard Kenner, Louisiana 70062

License/Certificate Information w/ Supervision

License	Status	First Issuance Date	Expiration Date	Supervisor(s)
VF.0000008	Active	09/11/1984	09/30/2023	Mr. Ralph P. Fontcuberta Jr. # PLS.0004329

LED LOUISIANA ECONOMIC DEVELOPMENT

Division of Small and Emerging Business Development

SEBD CERTIFICATION

BFM CORPORATION, LLC

is hereby certified as a Small and Emerging Business Enterprise.

This certification is valid beginning 7/19/2019 and supersedes any registration or listing previously issued. At any time there is a change in ownership or control of the firm, notification must be made immediately to the Division of Small and Emerging Business Development.

Issued at Baton Rouge, Louisiana 7/19/2019

This certification expires on: 7/19/2029

Certification No. 9551

John W. Matthews, Jr.
Executive Director, Entrepreneurial Services

LED LOUISIANA ECONOMIC DEVELOPMENT

DIVISION OF SMALL BUSINESS SERVICES

This certification acknowledges that

BFM CORPORATION, LLC

is Certified Active as a Small Entrepreneurship with Louisiana Economic Development's Hudson Initiative.

This certification is valid from 10/12/2022 to 10/12/2023

Certification No.: 9551

Stephanie Hartman,
Director, Small Business Services

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.

Section 1 - Introduction

1.1 Defining Plan Quality

The dictionary defines Quality Control as the inspection, analysis and action required to ensure quality of output; the operational techniques and the activities used to fulfill and verify requirements of quality; a procedure for keeping quality of inputs or outputs to specifications.

In accordance with LaDOTD expectations, the quality plan shall strive to shape and guide the product, and be measured against the following characteristics:

Complete:

1) The plans will be an accurate and thorough representation of the existing project site and terrain features.
2) The plans will be an accurate and thorough representation of the proposed project features and details to be constructed.
3) The plans will be supported by a thorough and detailed documented development process.
4) The plans will be developed with the active involvement of all affected parties and developmental stage owners throughout all stages of development.

- **Consistent**: The plans will be consistent with other plans developed for LADOTD and will comply with all standards and guidelines set by the LADOTD design manuals, AASHTO design guidelines and electronic standards.
- **Clear:** Instructions provided in the plans and specifications will leave little room for subjectivity.
- **Correct:** Preparation of the plans such that the delay, postponement, or cancellation of the project letting is avoided.
- **Constructible:** The plans will present a project that can be constructed and will not require change orders attributable to the designer.

It is Infinity's responsibility to maintain and enforce the quality plan as described in this document.

1.2 Definition of Terms and Abbreviations

The use of some key terms used in this document will be understood to have the following meanings:

Quality Control (QC)

Quality Control is defined as the operational techniques and the activities used to keep the quality of inputs or outputs to specifications; to fulfill and verify requirements of quality.

Quality Assurance (QA)

Quality Assurance refers to those actions, procedures, and methods employed at the management and senior technical levels to observe and ensure that prudent quality procedures are in place and are being carried out and that the desired result of a quality product is achieved.

Designer

The designer is the engineer directly responsible for the development of design calculations, drawings, special provisions including Non-Standard items, and cost estimate. The designer will be licensed by the State of Louisiana as a professional engineer or certified as an engineer intern. The detailer is the individual directly responsible for the creation of CAD drawings. During the design process, the designer must follow the design criteria established for the project. Bridge type, size, and location (T, S &L) must be developed first and approved by the supervisor or team leader prior to proceeding with the design of structural components.

The design calculations shall be organized and maintained in a standard calculation book format. The calculation book checklist is included in Appendix B of ***LADOTD Bridge Design and Evaluation Manual (BDEM)***. The designer must communicate with the detailer and supervise the detailing work to ensure that the drawings adequately and accurately present the design information. Both the designer and the detailer shall check their own work and minimize errors.

Checker

The design checker is the engineer responsible for performing a full technical review of the design calculations, drawings, special provisions including Non-Standard items, and cost estimate. The design checker must be licensed by the State of Louisiana a professional engineer or certified as an engineer intern; however, if the designer is an engineer intern, the design checker must be a professional engineer. The detail checker is the individual responsible for performing a full review of the CAD drawings.

The detail checker can be a designer or a detailer. The design checker and detail checker shall not be the ones who perform the original design and detailing. During the design check process, the design checker must verify the accuracy of the designer's calculations, pay items, quantities, special provisions including Non-Standard items, and cost estimate. The design checker may perform a redline check of the designer's calculations or produce an independent set of calculations and compare the results; the supervisor or team leader shall determine which method to use depending on the complexity of the project. Regardless of the checking method employed, the designer's calculations are the calculations of record and must be updated to correct any errors or omissions discovered by the design checker. The calculations of the design checker should also become a part of the calculation of record when independent checking calculations are produced. The design checker should also ensure that the drawings adequately and accurately present the design information.

Reviewer

The reviewer is the engineer responsible for ensuring that the QC process as described in Step 4 is complete and the design calculations, drawings, special provisions, and cost estimate are in accordance with LADOTD Bridge Design practices, policies, and procedures. The reviewer must be licensed by the State of Louisiana as a professional engineer and must have substantial experience in the design of similar structures. During the quality assurance process, the reviewer shall perform a cursory review of all documents in the QA information package submitted by the designer. This review should focus on the constructability of the plan details; areas of critical structural importance; areas where, based on the reviewer's experience, mistakes may be typically found; and areas that may be new to the design practice. The reviewer may, but need not, produce independent calculations to verify submitted information. The reviewer shall provide feedback to the designer and resolve all issues. Upon completion of the QA process, which shall be no later than the 98% final plans stage, the design calculations, plan details, special provisions, and cost estimate shall be considered as final. At this point, the QC/QA certification as included in Appendix D shall be signed by the designer, design checker, detailer, detail checker, and reviewer.

Engineer of Record (EOR)

The EOR is the engineer responsible for supervision and/or preparation of plans, sealing calculations, plans, and special provisions if required. The EOR must be licensed by the State of Louisiana as a professional engineer and must have commensurate experience in the design of similar structures. The EOR can be the designer, the design checker, the reviewer, or the supervisor/team leader who is directly involved in the project design activities. The responsibilities of the EOR are as follows:

1) Ensure the QC/QA certification is signed by all responsible parties. Ensure the geotechnical design information shown on bridge plans is co-stamped by a Geotechnical Engineer and the hydraulic information shown on bridge plans is co-stamped by a Hydraulic Engineer. If practical, the hydraulic information and geotechnical information should be presented on separate sheets to reduce the engineering stamps on a sheet. When more than one engineering stamp is required on a sheet, the responsibilities for each engineering stamp shall be clearly defined.
2) Assemble design calculations from all designers including the final geotechnical analysis report and the hydraulic report from the geotechnical engineer and the hydraulic engineer, finalize the calculation book, and seal the cover sheet of the calculation book.
3) Ensure the names of the designer, design checker, detailer, detail checker, and reviewer are correctly shown on the title block of each plan sheet. Stamp all plan sheets or designate a designer, design checker, or reviewer who shall be licensed by the State of Louisiana as a professional engineer to stamp the sheets developed under their supervision. The EOR must stamp the general notes sheets.
4) Ensure all special provisions are accurately shown on the construction proposal. The special provisions are typically stamped by the Specification Engineer as part of the construction proposal; however, if the Specification Engineer is not qualified or not willing to stamp the special provisions, the EOR must stamp these provisions.

Phase Review

Phase Review refers to the formal review by various disciplines at various stages of the plan development process.

Project Manager (PM)

The PM is the person responsible for the planning, coordination and controlling of a project from inception to completion, meeting the project's requirements and ensuring that each project is completed on time, within budget, within scope and to required quality standards.

Project Quality Control Plan

The methods and processes defined in this manual will serve as the Project Quality Control Plan (PQCP) for each project.

Quality Assurance Certification

Quality Assurance Certification refers to a signed statement by the Project Manager certifying that a written, pre-approved Project Quality Control Plan is in place and has been adhered to.

1.3 Purpose

This Quality Control / Quality Assurance Manual is intended to establish a benchmark for effective development of quality control and to assure that quality control has been effectively implemented. The manual provides for coordinated processes which will assist project development by providing mechanisms for:

1) Identifying design considerations which DOTD experience has shown repeatedly require specific attention.
2) Providing helpful checklists developed by each major discipline for each phase of project development.
3) Providing sufficiency checklists which enumerate the items and the documents required to be submitted with phase submittals. Completion and submittal of the checklists required with each phase review is the responsibility of the designer.

The ***LADOTD Bridge Design and Evaluation Manual (BDEM)*** has the objective of obtaining uniformity and establishing standard policies and procedures in the preparation of engineering and construction plans for bridge and highway structures in Louisiana. The BDEM will be followed for all LADOTD projects regardless of project delivery methods (Design-Bid-Built, Design-Built, or other methods). Any proposed deviations from the BDEM will require approval of the LADOTD Bridge Design Engineer Administrator before implementation. Detail justifications will be submitted along with the request. Approved deviations from BDEM shall be noted on the design criteria of the project and contract plans as appropriate.

1.4 Objective

The main objective of the Quality Control process for design projects is to provide a mechanism by which all construction plans can be subject to a systematic and consistent review. The outcome of the review should create a set of quality project plans, which should be substantially error free.

A secondary objective of the Quality Control process is to provide for a well-documented "trail" of the design process. A properly documented project file should be a by-product of the quality control process. Another secondary objective of the Quality Control process is to provide information feedback from reviews to the designers.

1.5 Quality Control Processes

The Quality Control process includes:

1) Quality planning, training
2) Providing clear decisions and directions
3) Constant supervision
4) Immediate review of completed activities for accuracy and completeness
5) Documenting all decisions, assumptions, and recommendations.

In the construction plan development process, it is the clear responsibility of the designer to ensure all project elements are economical, accurate, properly prepared, coordinated, checked, and completed.

All designers and reviewers must recognize that quality is the result of several processes. It requires many individuals performing many appropriate activities at the right time during the plan's development process. Quality Control does not solely consist of a review after a product is completed. Design personnel shall follow established design policies, procedures, standards and guidelines in the preparation and review of all design products.

Section 2 - Project Quality Control Requirements

The methods and processes defined in this manual will serve as the Project Quality Control Plan (PQCP) for each project. The Project Quality Control Plan details the proposed methods or processes of providing quality control for all work products. The plan shall include, but is not limited to, the

following areas:

1) Organization
2) Quality Control Reviews
3) Proposed method of documentation of comments, coordination responses and quality assurance records; and
4) Quality Assurance Certification

2.1 Plans Development Requirements for Review

Properly completed QA Checklists for all applicable disciplines, signed and dated by the checker, will be submitted with the review prints to demonstrate that all items were checked.

2.2 Conformance to CAD Standards

All plans must meet the CAD/Drafting standards as specified in the engineering contract.

2.3 Plans Reviews

In addition to plans checking, the designer will conduct a design review of all documents prior to submitting the documents to the LADOTD. This review shall include, as a minimum, the following activities:

1) Compliance with project requirements
2) Technical accuracy and adequacy
3) Compatibility with other associated project documents
4) Compliance with previous review comments

2.4 Design Documentation Requirements

To facilitate QC reviews of each project, the designer will prepare a written "Project Design Criteria Report" at the onset of the work.

Section 3 - Organization

3.1 Process

The team must be committed to the QC/QA process to ensure a quality product. The reviewing sections and individuals have specific responsibilities as part of the process.

3.2 Quality Control Responsibilities

The Project Manager is the person responsible for the planning, coordination and controlling of a project from inception to completion, meeting the project's requirements and ensuring that each project is completed on time, within budget and to required quality standards. The PM ensures that all phase reviews have occurred and have been completed, that all comments have been satisfactorily addressed and that all forms and checklists have been completed by the appropriate personnel. The PM is ultimately responsible for each project’s adherence to the quality control plan.

The Engineer of Record is responsible for accuracy and completeness of the plans and related designs prepared for the project. The designer is responsible for the quality of work of each person involved in the efforts to bring individual projects to production readiness.

Section 4 - Quality Control Reviews

4.1 Design Review Requirements

Design review checklists included in this guideline are intended to assist the designer in preparing an adequate submittal. The sufficiency checklists included in the guideline establishes the submittal requirements which must be met to satisfy the documentation requirements for each project.

4.2 General

The reviewer will be an experienced engineer who was not actively involved in the preparation of the product.

4.3 Phase reviews

4.3.1 Review process

At each submittal stage, the Project Manager will review the submittal for the degree of completeness required by that phase. Plans will be returned to the designer if they are incomplete, which could cause delays to the project's schedule.

4.3.2 Review Reports

Comments from phase reviews can be in the form of marked-up plans, meeting minutes (as in a plan-in-hand review meeting) or review memoranda. It is the responsibility of each reviewer to ensure that their comments are submitted to and recorded with the Project Manager. It is the Project Manager's responsibility to compile comments, document the comments and distribute the comments to the designer and others if necessary. It is then the designer's responsibility, in consultation with the Project Manager, to review the comments and to determine how each comment will be addressed. The designer will prepare a formal response to the PM stating how the comment will be addressed. The Project Manager will forward these responses to the appropriate reviewer and will ensure that all comments and responses have been documented in the project files. It is the designer's responsibility to ensure that comments are incorporated into the construction plans as appropriate.

4.3.3 Checking Drawings

Drawings are prepared under the direction of an assigned designer. They are developed progressively by an interactive process using sources of information such as survey data, reports, record data, preliminary sketches, samples, official maps, etc., in conformance with the requirements, design criteria, and standards and guidelines required by DOTD.

Section 5 - Method of Documentation of Comments, Coordination and Responses

5.1 Documentation of Comments and Responses

All comments made by phase reviewers shall be recorded either by copy of memos, e-mail, letters and/or marked plans received from the reviewers. In the event that comments are received through meetings with reviewers, there shall be minutes prepared that summarize the comments received. Copies of all comments and responses shall be kept in the project files.

5.2 Requests for Changes to the Scope

The PM and the designer shall evaluate comments or requests that are not covered in the "Final Project Scope."

Section 6 - Quality Assurance

6.1 General

QA does not include only periodic reviews to ensure compliance with the QC process, but also includes review of several other established processes. The Project Manager shall ensure that appropriate levels of review (and cooperativeness in the review process) have occurred for:

1) Constructability
2) Bidability
3) Value Engineering
4) Project Documentation

QA also incorporates a general review of personnel to ensure an acceptable level of expertise is maintained for quality design products. Communication is also a vital element in all processes. QA includes the review of the level and quality of communications and documentation accomplished during the various processes.

References

Louisiana Department of Transportation and Development *"Construction Plans Quality Control/Quality Assurance Manual"*

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**
Matric New World Engineering	2798 O'Neal Lane, Building F Baton Rouge, LA 70816	Chad Turner, cturner@mnwe.com	337-349-7755
BFM Corporation, LLC.	15 Veterans Blvd. Kenner, LA 70062	Chad Poche, P.E. cpoche@gulfsoutheng.com	504-468-8800

(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.

Not Applicable.