PROFESSIONAL SERVICES CONTRACT BETWEEN
THE CITY OF HUNTINGTON BEACH AND
ARDURRA GROUP, INC.
FOR
ON-CALL CIVIL ENGINEERING
& PROFESSIONAL CONSULTING SERVICES

THIS AGREEMENT ("Agreement") is made and entered into by and between the City of Huntington Beach, a municipal corporation of the State of California, hereinafter referred to as "CITY," and ARDURRA GROUP, INC., a California Corporation hereinafter referred to as "CONSULTANT."

WHEREAS, CITY desires to engage the services of a consultant to provide On-Call Civil Engineering & Professional Consulting Services; and

Pursuant to documentation on file in the office of the City Clerk, the provisions of the Huntington Beach Municipal Code, Chapter 3.03, relating to procurement of professional service contracts have been complied with; and

CONSULTANT has been selected to perform these services,

NOW, THEREFORE, it is agreed by CITY and CONSULTANT as follows:

1. SCOPE OF SERVICES

CONSULTANT shall provide all services as described in **Exhibit "A,"** which is attached hereto and incorporated into this Agreement by this reference. These services shall sometimes hereinafter be referred to as the "PROJECT."

CONSULTANT hereby designates Carmen Kasner who shall represent it and be its sole contact and agent in all consultations with CITY during the performance of this Agreement.

2. CITY STAFF ASSISTANCE

CITY shall assign a staff coordinator to work directly with CONSULTANT in the performance of this Agreement.

3. TERM; TIME OF PERFORMANCE

Time is of the essence of this Agreement. The services of CONSULTANT are to commence on _____, 20____ (the "Commencement Date"). This Agreement shall automatically terminate three (3) years from the Commencement Date, unless extended or sooner terminated as provided herein. All tasks specified in **Exhibit "A"** shall be completed no later than three (3) years from the Commencement Date. The time for performance of the tasks identified in **Exhibit "A"** are generally to be shown in **Exhibit "A."** This schedule may be amended to benefit the PROJECT if mutually agreed to in writing by CITY and CONSULTANT.

In the event the Commencement Date precedes the Effective Date, CONSULTANT shall be bound by all terms and conditions as provided herein.

4. COMPENSATION

In consideration of the performance of the services described herein, CITY agrees to pay CONSULTANT on a time and materials basis at the rates specified in **Exhibit "B,"** which is attached hereto and incorporated by reference into this Agreement, a fee, including all costs and expenses, not to exceed Two Million Dollars ($2,000,000.00).

5. EXTRA WORK

In the event CITY requires additional services not included in **Exhibit "A"** or changes in the scope of services described in **Exhibit "A,"** CONSULTANT will undertake such work only after receiving written authorization from CITY. Additional compensation for such extra work shall be allowed only if the prior written approval of CITY is obtained.

6. METHOD OF PAYMENT

CONSULTANT shall be paid pursuant to the terms of **Exhibit "B."**

7. DISPOSITION OF PLANS, ESTIMATES AND OTHER DOCUMENTS

CONSULTANT agrees that title to all materials prepared hereunder, including, without limitation, all original drawings, designs, reports, both field and office notices, calculations, computer code, language, data or programs, maps, memoranda, letters and other documents, shall belong to CITY, and CONSULTANT shall turn these materials over to CITY upon expiration or termination of this Agreement or upon PROJECT completion, whichever shall occur first. These materials may be used by CITY as it sees fit.

8. HOLD HARMLESS

A. CONSULTANT hereby agrees to protect, defend, indemnify and hold harmless CITY, its officers, elected or appointed officials, employees, agents and volunteers from and against any and all claims, damages, losses, expenses, judgments, demands and defense costs (including, without limitation, costs and fees of litigation of every nature or liability of any kind or nature) arising out of or in connection with CONSULTANT's (or CONSULTANT's subcontractors, if any) negligent (or alleged negligent) performance of this Agreement or its failure to comply with any of its obligations contained in this Agreement by CONSULTANT, its officers, agents or employees except such loss or damage which was caused by the sole negligence or willful misconduct of CITY. CONSULTANT will conduct all defense at its sole cost and expense and CITY shall approve selection of CONSULTANT's counsel. This indemnity shall apply to all claims and liability regardless of whether any insurance policies are applicable. The policy limits do not act as limitation upon the amount of indemnification to be provided by CONSULTANT.

B. To the extent that CONSULTANT performs "Design Professional Services" within the meaning of Civil Code Section 2782.8, then the following Hold Harmless provision applies in place of subsection A above:

"CONSULTANT hereby agrees to protect, defend, indemnify and hold harmless CITY and its officers, elected or appointed officials, employees, agents and volunteers, from and against any and all claims, damages, losses, expenses, demands and defense costs (including, without limitation, costs and fees of litigation of every nature or liability of any kind or nature) to the extent that the claims against CONSULTANT arise out of, pertain to, or relate to the negligence, recklessness, or willful misconduct of CONSULTANT. In no event shall the cost to defend charged to CONSULTANT exceed CONSULTANT's proportionate percentage of fault. However, notwithstanding the previous sentence, in the event one or more other defendants to the claims and/or litigation is unable to pay its share of defense costs due to bankruptcy or dissolution of the business, CONSULTANT shall meet and confer with CITY and other defendants regarding unpaid defense costs. The duty to indemnify, including the duty and the cost to defend, is limited as provided in California Civil Code Section 2782.8.

C. Regardless of whether subparagraph A or B applies, CITY shall be reimbursed by CONSULTANT for all costs and attorney's fees incurred by CITY in enforcing this obligation. This indemnity shall apply to all claims and liability regardless of whether any insurance policies are applicable. The policy limits do not act as a limitation upon the amount of indemnification to be provided by CONSULTANT.

9. PROFESSIONAL LIABILITY INSURANCE

CONSULTANT shall obtain and furnish to CITY a professional liability insurance policy covering the work performed by it hereunder. This policy shall provide coverage for CONSULTANT's professional liability in an amount not less than One Million Dollars ($1,000,000.00) per occurrence and in the aggregate. The above-mentioned insurance shall not contain a self-insured retention without the express written consent of CITY; however an insurance

policy "deductible" of Ten Thousand Dollars ($10,000.00) or less is permitted. A claims-made policy shall be acceptable if the policy further provides that:

A. The policy retroactive date coincides with or precedes the initiation of the scope of work (including subsequent policies purchased as renewals or replacements).

B. CONSULTANT shall notify CITY of circumstances or incidents that might give rise to future claims.

CONSULTANT will make every effort to maintain similar insurance during the required extended period of coverage following PROJECT completion. If insurance is terminated for any reason, CONSULTANT agrees to purchase an extended reporting provision of at least two (2) years to report claims arising from work performed in connection with this Agreement.

If CONSULTANT fails or refuses to produce or maintain the insurance required by this section or fails or refuses to furnish the CITY with required proof that insurance has been procured and is in force and paid for, the CITY shall have the right, at the CITY's election, to forthwith terminate this Agreement. Such termination shall not effect Consultant's right to be paid for its time and materials expended prior to notification of termination. CONSULTANT waives the right to receive compensation and agrees to indemnify the CITY for any work performed prior to approval of insurance by the CITY.

10. CERTIFICATE OF INSURANCE

Prior to commencing performance of the work hereunder, CONSULTANT shall furnish to CITY a certificate of insurance subject to approval of the City Attorney evidencing the foregoing insurance coverage as required by this Agreement; the certificate shall:

A. provide the name and policy number of each carrier and policy;

B. state that the policy is currently in force; and

C. shall promise that such policy shall not be suspended, voided or canceled by either party, reduced in coverage or in limits except after thirty (30) days' prior written notice; however, ten (10) days' prior written notice in the event of cancellation for nonpayment of premium.

CONSULTANT shall maintain the foregoing insurance coverage in force until the work under this Agreement is fully completed and accepted by CITY.

The requirement for carrying the foregoing insurance coverage shall not derogate from CONSULTANT's defense, hold harmless and indemnification obligations as set forth in this Agreement. CITY or its representative shall at all times have the right to demand the original or a copy of the policy of insurance. CONSULTANT shall pay, in a prompt and timely manner, the premiums on the insurance hereinabove required.

11. INDEPENDENT CONTRACTOR

CONSULTANT is, and shall be, acting at all times in the performance of this Agreement as an independent contractor herein and not as an employee of CITY. CONSULTANT shall secure at its own cost and expense, and be responsible for any and all payment of all taxes, social security, state disability insurance compensation, unemployment compensation and other payroll deductions for CONSULTANT and its officers, agents and employees and all business licenses, if any, in connection with the PROJECT and/or the services to be performed hereunder.

12. TERMINATION OF AGREEMENT

All work required hereunder shall be performed in a good and workmanlike manner. CITY may terminate CONSULTANT's services hereunder at any time with or without cause, and whether or not the PROJECT is fully complete. Any termination of this Agreement by CITY shall be made in writing, notice of which shall be delivered to CONSULTANT as provided herein. In the

event of termination, all finished and unfinished documents, exhibits, report, and evidence shall, at the option of CITY, become its property and shall be promptly delivered to it by CONSULTANT.

13. ASSIGNMENT AND DELEGATION

This Agreement is a personal service contract and the work hereunder shall not be assigned, delegated or subcontracted by CONSULTANT to any other person or entity without the prior express written consent of CITY. If an assignment, delegation or subcontract is approved, all approved assignees, delegates and subconsultants must satisfy the insurance requirements as set forth in Sections 9 and 10 hereinabove.

14. COPYRIGHTS/PATENTS

CITY shall own all rights to any patent or copyright on any work, item or material produced as a result of this Agreement.

15. CITY EMPLOYEES AND OFFICIALS

CONSULTANT shall employ no CITY official nor any regular CITY employee in the work performed pursuant to this Agreement. No officer or employee of CITY shall have any financial interest in this Agreement in violation of the applicable provisions of the California Government Code.

16. NOTICES

Any notices, certificates, or other communications hereunder shall be given either by personal delivery to CONSULTANT's agent (as designated in Section 1 hereinabove) or to CITY as the situation shall warrant, or by enclosing the same in a sealed envelope, postage prepaid, and depositing the same in the United States Postal Service, to the addresses specified below. CITY and CONSULTANT may designate different addresses to which subsequent notices, certificates or other communications will be sent by notifying the other party via personal delivery, a reputable overnight carrier or U. S. certified mail-return receipt requested:

TO CITY:	TO CONSULTANT:
City of Huntington Beach ATTN: Director of Public Works 2000 Main Street Huntington Beach, CA 92648	Ardurra Group, Inc. Attn: Carmen Kasner 3737 Birch Street, Suite 250 Newport Beach, CA 92660

17. CONSENT

When CITY's consent/approval is required under this Agreement, its consent/approval for one transaction or event shall not be deemed to be a consent/approval to any subsequent occurrence of the same or any other transaction or event.

18. MODIFICATION

No waiver or modification of any language in this Agreement shall be valid unless in writing and duly executed by both parties.

19. SECTION HEADINGS

The titles, captions, section, paragraph and subject headings, and descriptive phrases at the beginning of the various sections in this Agreement are merely descriptive and are included solely for convenience of reference only and are not representative of matters included or excluded from such provisions, and do not interpret, define, limit or describe, or construe the intent of the parties or affect the construction or interpretation of any provision of this Agreement.

20. INTERPRETATION OF THIS AGREEMENT

The language of all parts of this Agreement shall in all cases be construed as a whole, according to its fair meaning, and not strictly for or against any of the parties. If any provision of this Agreement is held by an arbitrator or court of competent jurisdiction to be unenforceable, void, illegal or invalid, such holding shall not invalidate or affect the remaining covenants and provisions of this Agreement. No covenant or provision shall be deemed dependent upon any other unless so expressly provided here. As used in this Agreement, the masculine or neuter gender and singular or plural number shall be deemed to include the other whenever the

context so indicates or requires. Nothing contained herein shall be construed so as to require the commission of any act contrary to law, and wherever there is any conflict between any provision contained herein and any present or future statute, law, ordinance or regulation contrary to which the parties have no right to contract, then the latter shall prevail, and the provision of this Agreement which is hereby affected shall be curtailed and limited only to the extent necessary to bring it within the requirements of the law.

21. DUPLICATE ORIGINAL

The original of this Agreement and one or more copies hereto have been prepared and signed in counterparts as duplicate originals, each of which so executed shall, irrespective of the date of its execution and delivery, be deemed an original. Each duplicate original shall be deemed an original instrument as against any party who has signed it.

22. IMMIGRATION

CONSULTANT shall be responsible for full compliance with the immigration and naturalization laws of the United States and shall, in particular, comply with the provisions of the United States Code regarding employment verification.

23. LEGAL SERVICES SUBCONTRACTING PROHIBITED

CONSULTANT and CITY agree that CITY is not liable for payment of any subcontractor work involving legal services, and that such legal services are expressly outside the scope of services contemplated hereunder. CONSULTANT understands that pursuant to *Huntington Beach City Charter* Section 309, the City Attorney is the exclusive legal counsel for CITY; and CITY shall not be liable for payment of any legal services expenses incurred by CONSULTANT.

24. ATTORNEY'S FEES

In the event suit is brought by either party to construe, interpret and/or enforce the terms and/or provisions of this Agreement or to secure the performance hereof, each party shall bear its own attorney's fees, such that the prevailing party shall not be entitled to recover its attorney's fees from the nonprevailing party.

25. SURVIVAL

Terms and conditions of this Agreement, which by their sense and context survive the expiration or termination of this Agreement, shall so survive.

26. GOVERNING LAW

This Agreement shall be governed and construed in accordance with the laws of the State of California.

27. SIGNATORIES

Each undersigned represents and warrants that its signature hereinbelow has the power, authority and right to bind their respective parties to each of the terms of this Agreement, and shall indemnify CITY fully for any injuries or damages to CITY in the event that such authority or power is not, in fact, held by the signatory or is withdrawn.

28. ENTIRETY

The parties acknowledge and agree that they are entering into this Agreement freely and voluntarily following extensive arm's length negotiation, and that each has had the opportunity to consult with legal counsel prior to executing this Agreement. The parties also acknowledge and agree that no representations, inducements, promises, agreements or warranties, oral or otherwise, have been made by that party or anyone acting on that party's behalf, which are not embodied in this Agreement, and that that party has not executed this Agreement in reliance on any representation, inducement, promise, agreement, warranty, fact or circumstance not expressly set forth in this

Agreement. This Agreement, and the attached exhibits, contain the entire agreement between the parties respecting the subject matter of this Agreement, and supersede all prior understandings and agreements whether oral or in writing between the parties respecting the subject matter hereof.

29. EFFECTIVE DATE

This Agreement shall be effective on the date of its approval by the City Council. This Agreement shall expire when terminated as provided herein.

IN WITNESS WHEREOF, the parties hereto have caused this Agreement to be executed by and through their authorized officers.

CONSULTANT,
ARDURRA GROUP, INC.

By: _____
Carmen Kasner
print name
ITS: *(circle one)* Chairman/President/Vice President

~~AND~~

By: _____
Randal Dumas
print name
ITS: *(circle one)* Secretary/Chief Financial Officer/Asst. Secretary - Treasurer

CITY OF HUNTINGTON BEACH, a municipal corporation of the State of California

_____
Mayor

_____
City Clerk

INITIATED AND APPROVED:

_____
Director of Public Works

REVIEWED AND APPROVED:

_____
City Manager

APPROVED AS TO FORM:

_____
City Attorney

EXHIBIT "A"

A. STATEMENT OF WORK: (Narrative of work to be performed)

Provide On-Call Civil Engineering and Professional Consulting Services. If Consultant chooses to assign different personnel to the project, Consultant must submit names and qualifications of these staff to City for approval before commencing work.

B. CONSULTANT'S DUTIES AND RESPONSIBILITIES:

See Attached Exhibit A

C. CITY'S DUTIES AND RESPONSIBILITIES:

1. Furnish Scope of Work and provide a request for proposal for each project.

2. City shall issue a task order for each project based upon scope of services, work schedule, and fee proposal submitted.

D. WORK PROGRAM/PROJECT SCHEDULE:

A project schedule will be developed for each project assigned by the City.

Disciplines of Civil Engineering Services Application Form

Circle all that apply

Civil Engineering Service Area	Bidding? Y/N (circle)
• Water/Sewer/Storm Water Engineering	(Yes) / No
• General Civil Engineering	(Yes) / No
• Ocean Engineering	Yes / No
• Environmental/Water Quality	(Yes) / No

March 13, 2025

City of Huntington Beach
Public Works Department
2000 Main Street
Huntington Beach, CA 92648

RE: PROPOSAL TO PROVIDE ON-CALL CIVIL ENGINEERING PROFESSIONAL CONSULTING SERVICES

Dear Selection Committee Members:

In support of the City of Huntington Beach's Public Works Department, Ardurra Group, Inc. (Ardurra) is poised and prepared to provide services in the following categories:

A. Water/Sewer/Storm Water Engineering
B. General Civil Engineering
D. Environmental/Water Quality

As we demonstrate in this proposal, selecting the Ardurra team offers the City the following benefits:

- **Dedicated On-Call Services Manager & Support** – ***Anissa Voyiatzes, PE, ENV SP*** will serve as primary contact and project manager leading a comprehensive team of local professionals. Anissa is a highly skilled project manager with 30 years of experience with a wide range of public works projects, from design through construction. She excels at meeting schedules and budgets as well as communicating and coordinating with city staff, construction personnel, the design team, regulatory agencies, the community, and stakeholders. She is a true problem-solver dedicated to project success.

  Anissa will be supported by ***Mark Lewis, PE, TE,*** who has served the City over the last four years providing on-site project management and coordination for numerous design projects. Mark has assisted the City with project development and management services for projects such as design of on-site chlorine and fluoride generation for three water wells; equipping of a water well; waterline condition assessment; waterline construction; sewer lining; Huntington Harbour storm drain check valves; landscape median modifications; half-round drainage structures; to name a few.

- **Available Team | Deep Bench** – With 200 professionals in Southern California, our comprehensive team with seasoned task leaders will ensure that all aspects of the City's projects are delivered with the highest level of quality, care, and professionalism. Ardurra has established a significant presence with numerous cities throughout the region by successfully completing a multitude of road, alley, bridge, curb, gutter, sidewalk, and parking lot improvements, as well as water, sewer, and storm drain infrastructure projects, which makes us a perfect fit for this contract.

- **Ongoing Experience with On-Call Services** – With a successful history of providing full-service, on-call owner's representative services, Ardurra's philosophy is to protect the City's interests and provide quality services to the City and its community. Our team of experts has worked together on numerous on-call contracts for local public agencies and can quickly mobilize when a task order is issued. No task is too large or small. We are there when you need us!

ARDURRA

SERVICE CATEGORIES
A. Water/Sewer/Storm Water Engineering
B. General Civil Engineering
D. Environmental/Water Quality

AUTHORIZED REPRESENTATIVE
Lisa M. Penna, PE, F.ASCE, OSD
Regional Director
3737 Birch Street, Suite 250
Newport Beach, CA 92660
949.922.2800
lpenna@ardurra.com

PROPOSAL CONTACT
Anissa Voyiatzes, PE, ENV SP
Engineering & Municipal Services Group Leader
1960 E. Grand Ave., Suite 300
El Segundo, CA 90245
714.476.3508
avoyiatzes@ardurra.com

NEAREST OFFICE
3737 Birch Street, Suite 250
Newport Beach, CA 92660
949.428.1500

MANAGEMENT OFFICES
3737 Birch Street, Suite 250
Newport Beach, CA 92660
949.428.1500

1960 E. Grand Ave., Suite 300
El Segundo, CA 90245
310.359.1203

ARDURRA

WHY SELECT THE ARDURRA TEAM

- Design experience with the City of Huntington Beach
- Knowledge and familiarity with the City's standards and procedures
- Extensive public works experience
- Proven cost saving solutions
- Excellent references

We not only intend to meet the City's expectations—we intend to exceed them. With our offices in Newport Beach and El Segundo, the Ardurra team can provide unparalleled responsiveness to the City of Huntington Beach. Our offices are full-time service offices and will be for the entire duration of the contract. Close geographic proximity to the City makes us ideally suited to serve the City and ensures availability for City meetings at City facilities as requested within a reasonable timeframe during normal business hours.

Ardurra has established and maintained effective working relationships with numerous cities in Orange County, including, but not limited to, Lake Forest, Laguna Beach, Newport Beach, Laguna Hills, Anaheim, Seal Beach, San Juan Capistrano, as well as Huntington Beach.

We have provided information herein that illustrates completed and ongoing comparable projects that Ardurra has undertaken during the last few years. These projects, including references, demonstrate our record of success and ability to successfully complete work of varying size, scope, and complexity.

We are confident that you will find our team's experience and approach to be an excellent match for Categories A, B, and D. We are ready to commence work immediately upon notice to proceed by the City for all projects.

Ardurra has received Q&A Set 1 released February 26. Our proposal price will remain valid for a period of at least 180 days. Ardurra is willing to execute the agreement as drafted.

We appreciate this opportunity to present our qualifications and look forward to serving the City on this on-call contract. As Ardurra's authorized representative, please contact me or our project manager Anissa Voyiatzes should you have any questions or need further information.

Respectfully submitted,
Ardurra Group, Inc.

Lisa M. Penna, PE, F.ASCE, QSD
Regional Director

Anissa Voyiatzes, PE, ENV SP
Engineering & Municipal Services Group Leader

ARDURRA

B

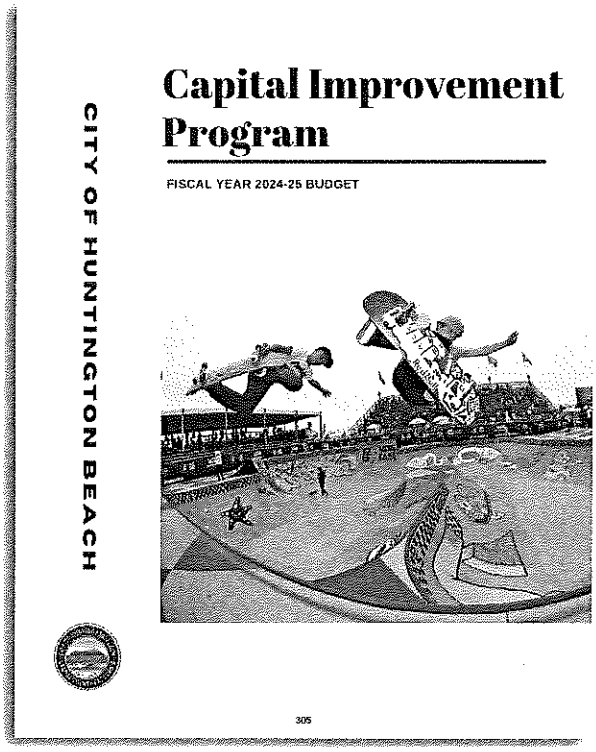
BACKGROUND AND PROJECT SUMMARY SECTION

B BACKGROUND AND PROJECT SUMMARY SECTION

UNDERSTANDING OF THE CITY'S NEEDS

Huntington Beach is a seaside community with the fourth-highest population in Orange County, serving nearly 200,000 residents, 10,000 businesses, and 11 million visitors annually; and according to its service vision statement, the City is "Committed to Responsive and Exceptional Public Service for All." In honoring this commitment, the City's Public Works Department is seeking qualified engineering firms to supplement City staff in the following discipline areas on a wide variety of capital improvement projects. *(Ardurra is proposing on the service categories checked below.)*

- ☑ A. Water/Sewer/Storm Water Engineering
- ☑ B. General Civil Engineering
- ☐ C. Ocean Engineering
- ☑ D. Environmental/Water Quality



We understand the City's goal is to work with an experienced and reliable multi-disciplined team with strong leadership to support the City's Public Works Department with various services as needed for a contract term of three years with a possible City option for a one-year extension.

The scope of work may encompass preparing PS&E packages; providing analyses and evaluations; writing grant applications; preparing NPDES reports, Water Quality Management Plans, and Storm Water Pollution Prevention Plans; providing record drawings; and providing construction support and survey services.

Public works projects may include:

- Potable water pipelines
- Potable water wells, reservoirs, and booster stations
- Potable water master plan update; water financial plan update
- Sanitary sewer
- Wastewater master plan update
- Stormwater systems, including channels, pipelines, and pump stations
- Rehabilitation of roads, alleys, bridges, curb, gutter, sidewalks, and parking lots

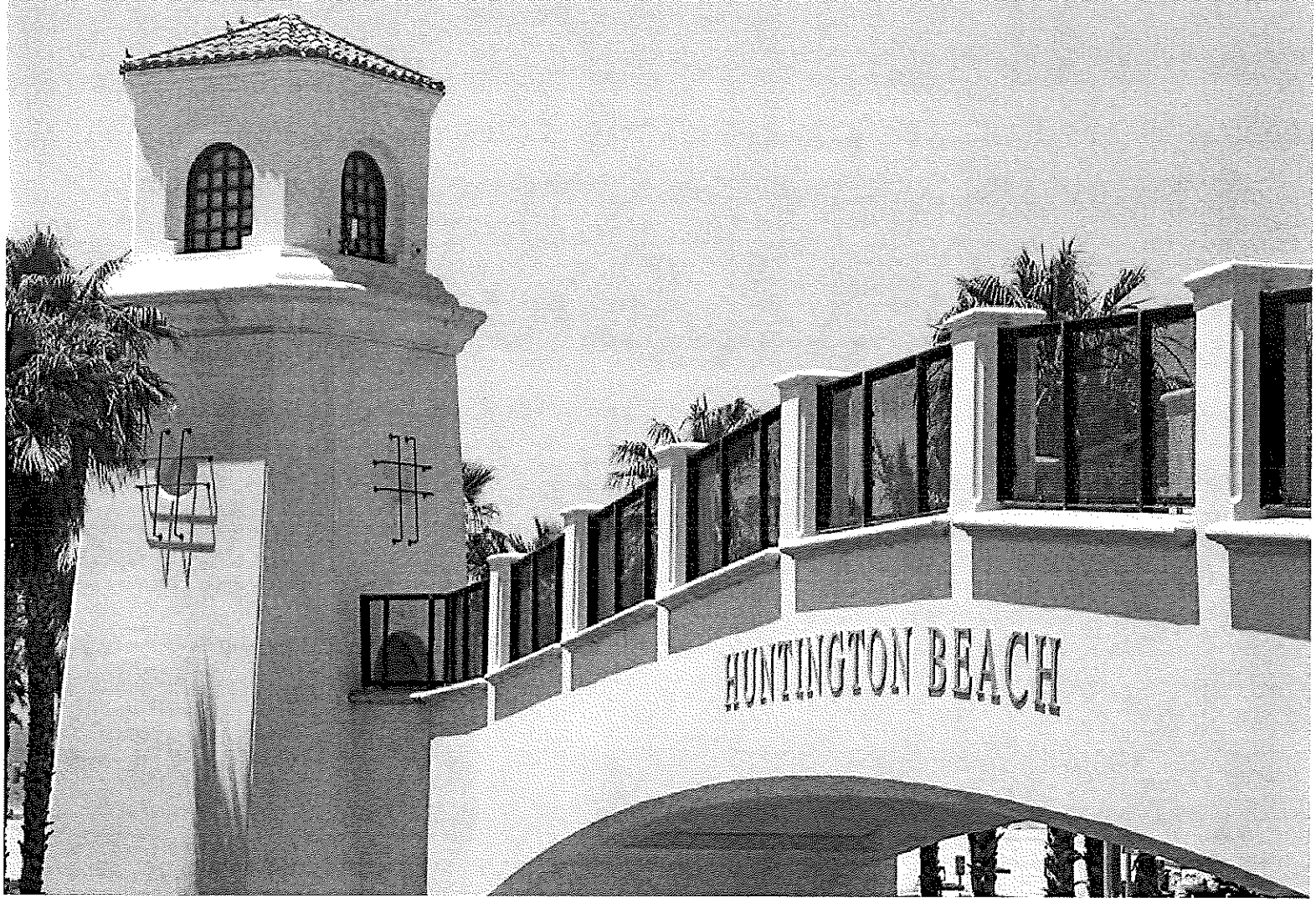
As shown in our proposal, Ardurra has developed a comprehensive team to match our resources to your needs. We are proposing on Category A. Water/Sewer/Storm Water Engineering and Category B. General Civil Engineering, and Category D. Environmental/Water Quality.

Upon review of the City's Capital Improvement Program and the scope of work listed in the RFP, our team has the experience and local knowledge to successfully support the City with the above-mentioned service discipline areas. We have successfully completed projects similar to those in your CIP, such as street and drainage improvements, ADA upgrades, as well as water and sewer infrastructure improvements. And we have the local resources and the flexibility to scale up or down, depending on the needs of the project.

Our goal is to be a true partner with the City, and we share your commitment to making Huntington Beach an exceptional place to live, visit, and do business.

ARDURRA

C
METHODOLOGY SECTION



METHODOLOGY SECTION

With a successful history of providing full-service, on-call owner's representative services, Ardurra's philosophy is to protect the City's interests and provide quality services to the City and its community. Our team of experts have worked together on numerous on-call contracts for public agencies in the region, and we can quickly mobilize when a task order is issued. No task is too large or small.

Ardurra brings a proven track record of on-site coordination with the City on several design projects. This familiarity with the City enables a smooth and collaborative process in supporting the City's engineering needs. This section discusses our general approach to managing task orders and resource allocation, as well as our project management tools to maintaining quality and cost and schedule control.

1) IMPLEMENTATION PLAN

PROVEN TASK ORDER PROCESS

Through our on-call contracts, we have developed a task order process that has proven successful. It is an organized and streamlined approach for requesting, developing, and completing task order assignments. This process aims to provide the City with teams available for multiple tasks off the on-call contract and a formal approach to respond to each task. Below is a summary of our proposed approach for completing the task orders.

step 1 — Initial Meeting with City Project Manager and Task Managers

A meeting will be held between the City's Project Manager and the Ardurra contract and task manager to be assigned to the work. They will discuss the request with the City's Project Manager and discuss your goals and expectations, key project issues, appropriate personnel from our team to be assigned, services needed, schedule, approximate budget available, and assumptions for completing the project.

2 — Develop Scope of Work and Team

After coordinating with the appropriate task manager based on the type of project, we will then coordinate key personnel from our team, which may include a multi-discipline team, to prepare and submit a proposal for completing the work.

3 — Negotiation and Notice to Proceed

Once the task order is reviewed, negotiated, and executed, Ardurra will receive a notice to proceed to begin work. If applicable, Ardurra will issue a subsequent notice to proceed to our subconsultant(s).

4 — Project Administration and Coordination

Project meetings will be held at the appropriate frequency to keep City staff apprised of the progress of the work. Schedules developed to support the proposal will be maintained to identify the tasks to be performed, milestones, review periods, and allowable work windows for completing the project.

APPROACH TO RESOURCE ALLOCATION

Ardurra has a history of providing services for large on-call contracts to numerous agencies throughout California. Because of this experience, Ardurra has a strong understanding of how to address staffing for multiple, concurring tasks. This experience allows us to provide responsive teams led by experienced task managers to solve the needs of our clients in a timely manner.

Ardurra will commit sufficient resources to handle varying workloads that may result from multiple task orders progressing simultaneously; but, technical strengths and resources are only of value if we manage those resources well. The Ardurra approach to effective project management starts with scope, schedule, and budget development, signed contracts, and kickoff meetings. The project manager then organizes the project management plan for the duration of each task and the overall contract around a core framework of communication, coordination, thorough documentation, and quality control for each submittal on each task.

The Ardurra team understands the importance of meeting deadlines. We commit to providing adequate staffing (both as to the number of personnel and their qualifications) for every task. Our approach is flexible and adaptive to each task, and we can also commit to making use of personnel from other offices throughout the company and bringing on additional staff. ***We can scale up or down as needed with a focus on our unmatched responsiveness.***

With a large contingent of local resources to draw from, the Ardurra project team can respond to whatever needs may arise. By effectively managing a balanced client workload among our staff, Ardurra can respond within a day to meet with the City. This helps keep the project momentum moving forward so that the Ardurra team is in place and ready to work within days of receiving a Notice to Proceed. Consistent with our proven long-term approach to large municipal on-call contracts, Ardurra has the technical expertise and experience to deliver all project types as well as the administrative management experience for all funding sources used to support your CIP program.

Ardurra's approach to on-call work provides you streamlined delivery, improved communications, and enhanced project outcomes. We adapt this process to meet your needs and your project types.

PROJECT MANAGEMENT APPROACH

The key to our success is having a well-established plan for our approach to the work. Based on our 20+ years of local experience delivering large multi-discipline projects for municipal agencies, we have developed simple, clever, and proven solutions to issues we see regularly on these types of projects. Our team approach to project delivery involves a combination of administrative or management steps, procedures, and risk management tools that allow the project scope and objectives to be met on time and within budget.

A successful project management effort includes risk management, communication, coordination, documentation, and quality control. Early and regular communication with City staff and affected agencies is a high priority for our project managers and helps verify that no surprises occur throughout the project. We will use our standard risk matrix to identify, communicate, and manage challenges early in the project.

To help with communication, coordination, and document coordination, we intend to use a cloud-based SharePoint site to provide secure, continuous access for the entire team. Copies of documents, meeting minutes, photographs, and other project materials can be easily shared with the project team and stakeholders via this site.

Ardurra's skills and efficiency in communications, coordination, and documentation will provide the City with a transparent process for the duration of the contract. From individual accountability to stakeholder communications and coordination, minor design decisions, to support and recommendations for project funding sources, a well-conceived and accurate document control system must be part of the overall project delivery methodology.

Ardurra is responsible for the accuracy and completeness of the maps, plans, reports, calculations, and construction cost estimates under its scope of work. We will meet that responsibility by implementing a quality control plan specific to the assigned project.

Sustainable design is a core principle of Ardurra, even when it is not a formal project requirement. We are proud to have 45 employees (and growing) certified as Envision Sustainability Professionals (ENV SP) by the Institute of Sustainable Infrastructure. We are deeply committed to enhancing the built environment in every public works project by incorporating as many sustainability and resiliency practices as possible. We would welcome the opportunity to discuss evaluating projects with the City using the Envision Pre-Assessment Checklist. This evaluation can provide valuable learning opportunities, expand knowledge of sustainable practices and processes, and showcase your commitment to the community. It also helps assure your community that their resources are invested wisely and responsibly.

OUR STRATEGIC APPROACH TO A QUALITY PRODUCT

- **Understand the Project:** Quality starts at the beginning of the project through planning and controls. At the forefront of the project, our project manager will discuss the proposed scope of work, projected schedule, and estimated costs in detail with the City to ensure that the project scope and goals are fully understood from the onset.
- **The Right People for the Project:** Our project team has extensive relevant experience, including for the City of Huntington Beach. The team that has been formed will hit the ground running, delivering on schedule and within budget.

- **Communication:** Our team has an excellent track record and the project management tools for communicating with clients, subconsultants, staff, and stakeholders. Frequent communication and tracking of project progress is integral to our approach to every project.
- **Budget and Schedule Control:** We have project management tools that forecast staff requirements and labor allocations three months in advance, and we utilize time-tested procedures to closely monitor adherence to the budget and schedule.

Quality and Cost Control

Ardurra's mission is to provide high quality deliverables and services that meet your requirements. We accomplish this by integrating a high level of vision, innovation, and integrity with a quality assurance system based on clear objectives and a commitment to continuous improvement and quality control throughout project development. We are committed to our quality program, which encompasses a wide range of internal processes. Every member of our team shares responsibility for quality.

Management and Scheduling Tools

To deliver the highest level of customer service to the City, meeting the agreed-upon schedule, scope, and City's requirements, the Ardurra team will:

- Develop a multifaceted customized Project Management Plan to address the overall contract and on-call task order. Each service area has customized steps and procedures, including a formal communications plan, quality assurance program, and project controls.
- Compile a wide-ranging team of internal experts, both locally and from across the United States if needed, to respond to the level and variety of expertise that may be required for the project.
- Commit sufficient resources to adequately handle varying workloads that may result from multiple task orders progressing simultaneously.
- Identify critical issues and maintain constant communication with City project managers.
- Timely respond to design questions or field issues.
- Conduct regular team meetings and coordinate with stakeholders and City staff.
- Monitor and maintain the project schedule, comparing progress to the level of completion.

Our approach involves updating the schedule monthly. This approach enhances the City project manager's reporting capabilities, facilitates early identification of issues arising from delays, and provides flexibility to adjust the schedule as needed. Consequently, projects are completed on time, and all involved parties clearly understand the project's progress.

Using these tools, we can maintain the project schedule by monitoring time-critical tasks and issues such as agency and stakeholder review periods, right-of-way and utility impacts, environmental requirements, and permitting.

Ardurra's strategy for managing instances where a project awaits outside agency or stakeholder reviews is proactive and emphasizes accountability. This involves maintaining consistent communication with project stakeholders and arranging field visits or teleconferences to track progress on ongoing action items. Utility coordination and timely reviews often pose challenges. Yet, Ardurra has achieved significant success by leveraging these idle periods to schedule in-person, hands-on review sessions with utility agency staff and key decision-makers.

Communication Tools

We have developed and will continue to implement not less than the following communication tools:

- Written meeting agendas and minutes
- Use the City's preferred site or Ardurra's cloud-based system to share project-related information and make it accessible to the project team, City staff, stakeholders, and subconsultants.
- All directions reduced to writing with distribution to the team members
- Written weekly and monthly status reports
- Detailed monthly invoices are broken down by task, staff hours, and hourly rates.
- Submittal of Peer Review/QC documents and comments with each submittal, if desired
- Provide copies of all utility coordination correspondence and maintain a Utility Coordination Matrix.
- Provide written scopes of work and fee resolution before the commencement of additional work.

Proper documentation is critical for all projects, especially those funded by federal and state programs. We understand these requirements and have successfully delivered many projects for local agencies under similar conditions. Ardurra's document control management policies are well-suited to comply with the City's requirements. Our typical monthly project progress reports include

the status of deliverables, utility and outside-agency efforts, cost and schedule snapshot and analysis, issues discussion, and recommended resolution actions. These monthly progress reports will be tailored to the needs and desires of the City for each task order.

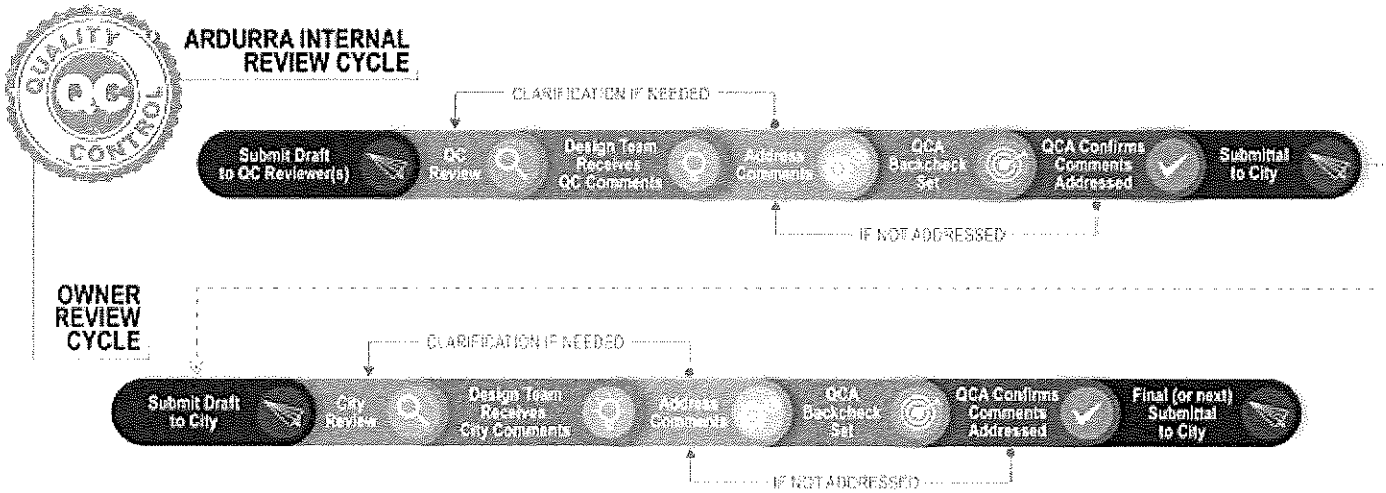
QA/QC APPROACH

Quality Assurance/Quality Control (QA/QC) is an ongoing task throughout the duration of the project. Ardurra is committed to quality for every task and deliverable provided by the firm. Recognizing the importance of careful quality control, Ardurra developed a Project Quality Management Plan as part of its QA/QC Program that every project manager is required to know and use. The objective is to see that deliverables conform to the project scope and that errors and omissions are reduced. Our QA/QC Program is based upon the belief that *"Nothing is more important than design quality"* and based on the philosophy that:

- Quality is achieved by adequate planning, coordination, supervision, and technical direction; proper definition of the job requirements and procedures; understanding the scope of services; and the use of appropriately skilled personnel performing work functions carefully.
- Quality is secured through the careful surveillance of work activities by individuals who are not directly responsible for performing the initial efforts.
- Quality is controlled by assigning a manager to evaluate all work and procedures followed while providing the services.
- Quality is verified through independent reviews by a qualified staff member of the process, procedures, documentation, supervision, technical direction, and staffing associated with the project development.

Our QA/QC Program involves the review of project documents and supporting data by our senior project manager and key staff, who will direct individual tasks. The QA/QC plan will include, but is not limited to:

- Developing a project-specific quality control plan that incorporates the contract requirements. The quality control plan will identify the deliverables that will go through the quality review process and when these reviews will take place during the project schedule.
- Following the process of clearly explaining the quality control and assurance requirements for the project and gain City acceptance of the QA/QC Plan, our Quality Control Manager will conduct a mandatory kickoff quality training session specific to the project for all project personnel. The training will also cover the schedule milestones for the quality reviews and the quality documentation that we require from all team members.
- Prior to our design milestone submittals to the City, our team will perform the necessary discipline, interdisciplinary, and if needed, independent reviews, in accordance with the approved QA/QC Plan.
- Project meetings and decisions will be documented by a "paper trail." Documents will be supported by appropriate data that will clearly show choices evaluated and the basis for our recommendations.
- Supporting calculations, text, or data used to develop a document will be signed and dated by the individual involved when the services are performed.
- Telephone conversations and meetings that include or affect a project decision will be documented. Meeting minutes will be promptly prepared and distributed to attendees for confirmation of decisions made, and then filed after appropriate corrections are made.



- Team network review will be undertaken. Team network quality control is the day-to-day peer review that is undertaken by the project team. Documents, analyses, letters, etc., are reviewed by a team member other than the individual preparing the document analyses. Review of significant analyses and documents are provided by the senior project manager. The individual doing the checking will sign and date the documents and prepare a record of the findings. The findings will be resolved by the originator of the document and checked again until corrected.
- Quality control review comments will be maintained in a quality assurance file. This network review will be enhanced with bi-monthly full team meetings.

2) EFFORTS TO ACHIEVE CLIENT SATISFACTION

SOLVING AGENCIES' BIGGEST CHALLENGES WITH PROVEN SOLUTIONS

Our philosophy is to protect the City's interests, minimize risks, provide cost-effective solutions, and maintain compliance to provide the City with long-term value for their investments. Based on 20+ years of local experience delivering on-call services for agencies like yours, we have developed simple, clever, and proven solutions to issues we see regularly.

- We use a risk matrix to identify and manage challenges early in the project regarding clearing the right-of-way, coordinating utilities, stakeholder involvement, material cost escalations, supply chain disruptions, and mitigating or avoiding environmental impacts.
- You get a standing meeting in your calendar between the City's project manager and our project manager to discuss deliverables, status updates, and information requests. This simple and short meeting means you will have the necessary information and task order status to share with your team regularly.
- Your projects get committed and coordinated staff because our office and regional leaders meet at least bi-weekly to discuss deliverables, resources, quality control, and following through on our promises. This gives you a flexible and skilled team focused on meeting deadlines with high-quality work.
- You get exclusive access to the fantastic talent from one of the country's fastest-growing engineering firms. We are humbled to be on Zweig's preferred employer list for the last five years. This means we are a magnet for talent! We have been growing consistently and adding amazing people every week. This gives you direct access to more help, unique solutions, and a small army of professionals with a heart for client service.

PROACTIVE APPROACH

The role of our project manager is to act on the City's behalf, relieving the City project manager of some of the day-to-day details while keeping them involved regularly and when decisions need to be made. We firmly believe in "doing it right the first time." Consequently, we realize that when pursuing project success, it is critical to thoroughly define the project requirements before the work is started. The client and the design team must agree on the project requirements. The requirements must also be communicated and understood at all staff levels.

We do not assume City staff has the necessary time to know the detailed design specifics. Therefore, we will assume responsibility and take the initiative to obtain the required information from the City. Using a carefully prepared Project Management Plan will be our key to achieving quality expectations. We find that projects are most successful when we manage the design/documentation process from the early stages of the project, working closely with the City to develop the design for the project collaboratively.

- **ATTENTION TO DETAILS** – Paying attention to the details early and often is essential to keeping the project moving forward, within budget, and to a successful completion. Additionally, we do our best to understand the design issues during the proposal stage so that our proposal is as complete as possible. The experience of the Ardurra project team, combined with our knowledge of the City's design requirements and proven QA/QC procedures, helps assure the City that the project design details are being closely scrutinized and double-checked.
- **REALISTIC CONSTRUCTION COSTS** – Ardurra pays special attention to one element of project design: preparing realistic opinions of construction cost estimates. Our estimates are based on contractor bids for similar recent construction projects supplemented by direct discussion with Ardurra's construction management personnel and contractors. Additionally, we prepare a preliminary cost estimate at the early design stage to determine whether the project is within the City's construction budget or if adjustments need to be made.
- **THE RIGHT PROJECT MANAGER** – A project can only be successful with effective project staff. Ardurra was founded on providing hands-on, experienced, proactive project management and engineering on all projects. This contract will be no exception. Our proposed Discipline Leaders have over 20 years of design and project management experience working on public works projects. They will provide project management and design oversight, including day-to-day services, and guide our highly qualified team of task managers.

- **CONSTRUCTABILITY** – We have the added benefit of our in-house construction management group providing constructability reviews as a standard practice. Their reviews are typically done before the 90% PS&E submittal. They come from the contractor's perspective and synchronize the construction documents to eliminate potential change orders. We will make sure that our payment clauses are well-written and inclusive.

The technical approach we would employ will depend on the nature of the specific task at hand. Presented below is an overview of the steps that are common to any task we pursue.

KICKOFF

Meet with the City and visit the project site to gain a thorough understanding of the project parameters, goals, constraints, and measures of success. Assign the right team for the task.

SCOPING

Prepare a clear and concise scope of services that describes the project. Keep the City team and Project Manager apprised of any factors that may affect the project budget or schedule so that there is time to identify and implement agreed-upon adjustments. Ardurra will consider the following during development of each project scope:

- ✓ Think creatively to generate a broad range of potential solutions. For example, look for opportunities to modify or combine the project with other proximate facilities to simplify/improve City operations or reduce costs.
- ✓ Identify project opportunities that may allow the City to delay capital costs or reduce operational costs. For example, on the discharge side of a pump station, selecting a slightly oversized pipe may yield significant long-term energy savings that outweigh the added cost of the pipe.
- ✓ Make early assessment of potential environmental triggers and seek to configure the project and/or incorporate features that will streamline regulatory compliance by avoiding or reducing trigger conditions.
- ✓ Reference the appropriate City guidelines. Think about possible guideline modifications that may benefit the City and forward these as suggestions for the City to consider.

WORK PLAN

Execute the work independently, but in close coordination with the City so staff knows the progress and decisions being made. Obtain City input and reviews at appropriate stages. Where appropriate, conduct workshops with presentations to review the project progress and achieve consensus on key project decisions. This will streamline the design review process and promote stakeholder "buy-in" to the final recommendations. Look out for potential challenges or time-sensitive factors such as permitting and ROW acquisition, cultural resource, or biological issues.

REPORTS

Prepare technical memoranda or project reports that describe the background information, data, assumptions, and analysis approach utilized, use clearly labeled graphics and tables, and provide a thorough description of the basis for the recommendations made. Our written documents are well-organized, easy to read, and tailored to the audience, with a concise Executive Summary section for documents to be reviewed by senior management.

EOPCC

Develop Engineer's Opinion of Probable Construction Costs (EOPCC) that utilize locally representative unit cost factors and appropriate market condition factors, reflect the level of detail used to define the project, and include appropriate levels of inflation factors and contingency based on well-established methods by the American Association of Cost Engineers.

QA/QC

Perform ongoing quality control during project execution. This entails QC at multiple levels: from the project engineer checking his/her work, to the "arms-length" review of project deliverables by a senior staff member prior to submittal to the City.

ATTITUDE

Provide our services in the spirit of a positive and collaborative team environment, resulting in cost-efficient and successful projects.

ENVIRONMENTAL SUPPORT

Ardurra's approach to CEQA and NEPA support is based on our corporate goal of extending experience and knowledge to agencies. We listen and make client objectives the priority then apply our knowledge and technical expertise at the onset of each contract. This approach results in daily progress and will achieve the following objectives:

- Understand and achieve City objectives as an extension of staff in managing the environmental process.
- Identify issues early, and bring to the fore effective solutions for CEQA and NEPA compliance.
- Prepare environmental reports in a clear and unbiased manner.
- Deliver expert environmental support to staff daily and at public meetings and hearings.
- Provide regular interface and follow up with staff and other consultants to keep projects moving toward approval.

We prepare unbiased, full-disclosure environmental reports. Our analysis is based on realistic quantitative and qualitative review of short-term, long-term, and cumulative impacts. We utilize GIS and modeling software as the foundation to identify impacts. Our process clearly defines project objectives and due diligence review of baseline conditions at the start of each contract for thorough environmental reviews. We implement cost control measures and track contract status regularly with our Deltek Vision software, which reports real-time information on budget, staff utilization, and percent complete.

3) PROJECT SCHEDULE

Ardurra's schedule management approach begins with developing a baseline schedule from the agreed-upon scope of services for the respective Task Order. The baseline schedule shows our planned approach to delivering the Task Order scope and provides the basis for planning and budgeting resources. The Task Order Manager will carefully monitor schedule trends, discuss issues with the City, and proactively manage progress. A detailed critical path method schedule will be developed as necessary for each Task Order to include all tasks and our internal QA/QC process as well as City reviews. The Ardurra team will meet with the City to clarify critical delivery dates and milestones, track and notify the City of critical issues, update the schedule monthly to meet dynamic Task Order goals, and review critical tasks and suggest methods of acceleration where possible. Through these techniques, the team will effectively manage the process and complete the Task Order on time and within budget. Our goal is to be the City's trusted advisor and have a partnership built on a common understanding of expectations.

A RELIABLE PROCESS FOR TIMELY PROJECT DELIVERY

We have so much experience completing projects as on-call extensions of staff that we mapped out what consistently works for our clients. This gives you the power to know exactly where we are in the process and exactly what the next steps will be. Using a standard workflow keeps our team humming along and allows us to better manage our resources to react to your needs.

We broke this process into five simple phases because it provides flexibility to our team, no matter the level of completion. However, the only phase we never skip is the Task Order Initiation Phase.

1. Task Order Initiation Phase

In this phase we listen to your needs, write a complete scope, negotiate a fair fee, and agree on a delivery schedule. We have a series of checks and balances built in because we want to start right on every task order. During this phase we will obtain the necessary subconsultants for the project.

2. Project Kickoff, Setup, and Due Diligence Phase

This phase involves initiating the project survey, gathering the project team (including the City) to ensure every team member understands the project scope, budget, and schedule. The project team reviews the available information for the project site and performs a site visit to verify the existing conditions and information on the survey. The team will also research and review the available existing information for the project area including the existing right-of-way, contact the utility companies, and create a utility matrix to document utility agency correspondence. It is also during this phase that Ardurra will provide a list (or memo) of potential project challenges that will need to be addressed during or prior to design so that these challenges are not left for during construction. Challenges include potential right-of-way constraints, easement encroachments, conflicts with existing conditions/improvements, and permitting requirements from outside agencies. Identification of these challenges is critical to understand the potential impact to the project schedule, and Ardurra will immediately begin addressing these challenges as soon as possible.

3. Engineering Phase

In this phase we work to develop "ready to list" (RTL) packages. At this stage, we prepare the necessary engineering calculations and designs for the project including the plans, specifications, and estimate (PS&E). Ardurra will also identify any potential easement that needs to be created. This can be done in-house, or it can be developed by the contractor after installation of improvements. The design will be developed in a staged approach (Preliminary, 60%, 90%, and Final). At each milestone stage, the project team will coordinate with the City to confirm the design. This process is collaborative and provides the City and other stakeholders an opportunity to express opinions about the technical solutions we propose. Upon final approval from the City, Ardurra will assist the City to prepare the project documents for bid.

4. Construction Phase

This phase is a critical step in interpreting and enforcing the plans, specifications, estimates, environmental mitigation, and contract obligations. With us on your team for this phase, you get a partner in a fast-paced and dynamic environment where we can help provide recommendations and field solutions on the fly. We can also provide support by addressing requests for information (RFIs), review submittals, review change orders, issue addenda (if necessary), and provide opinions on change orders.

5. Closeout Phase

We find this phase is sometimes the second most important (next to the Task Order Initiation Phase). It is during this phase that you finally realize the benefits of the hard work it took to complete the project. In this phase, we support the City close out projects, prepare as-builts, submit project files to the City, open projects to the public, and help celebrate your success.

DELIVERABLES

Ardurra will provide plans, specifications, and estimates for improvement projects. Upon completion of projects, Ardurra will provide the City with as-built documents for its records.

Additional deliverables include topographic maps and/or ALTAs, where necessary, including the raw survey data. For studies, Ardurra will provide the City with geotechnical reports and pothole reports that include all the necessary backup data and citations.

We also offer staff augmentation, peer review/plan check and constructability review.

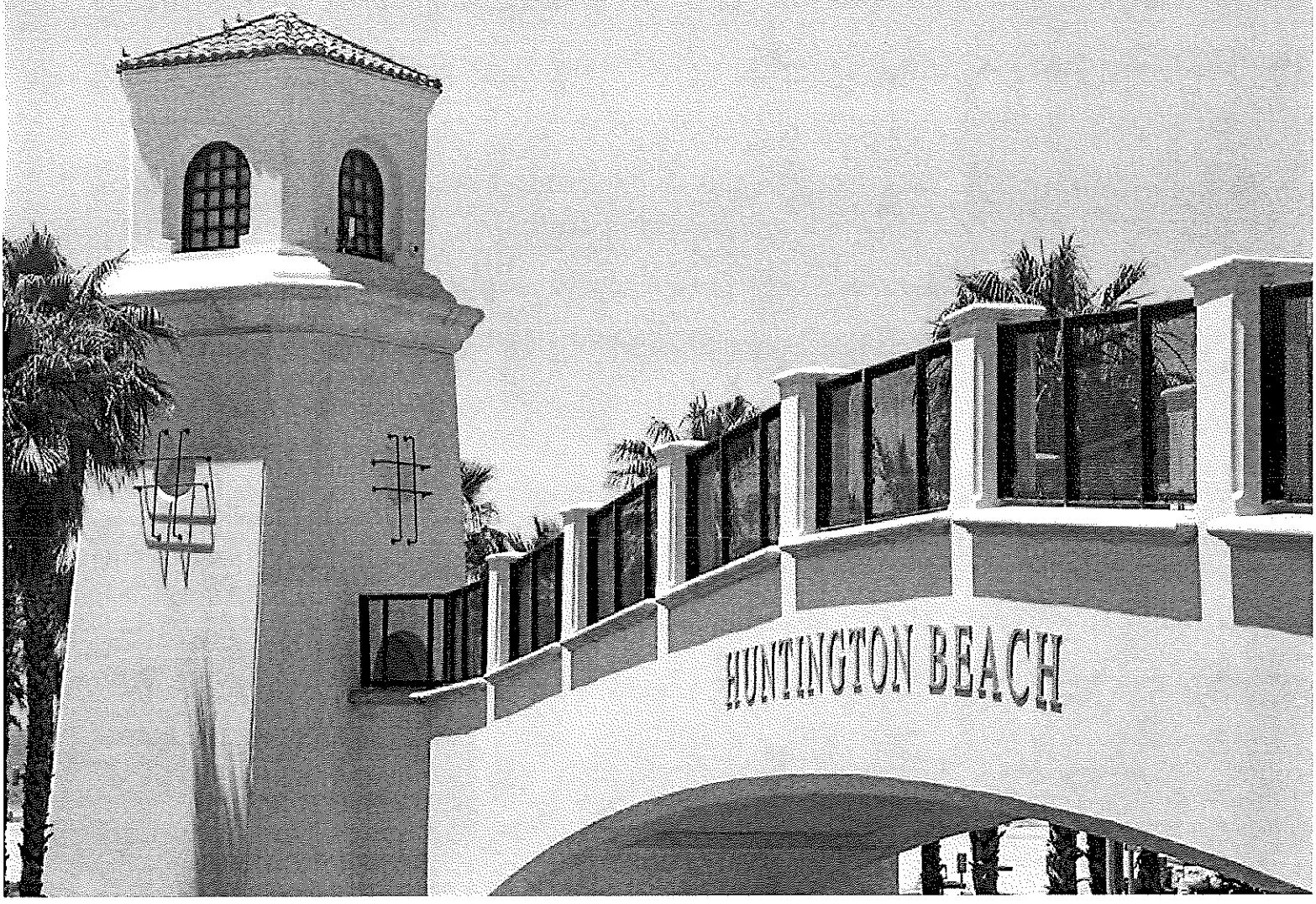
4) SPECIFIC TASKS FROM CITY STAFF

Ardurra will require assistance from City staff with the following:

- Access to project site
- Access to pertinent records maintained by the City
- Access to plans and specifications on previous projects
- Access to CAD or other electronic files
- File Notice of Completion with the County Clerk
- File Notice of CEQA Categorical Exemptions with the County Clerk
- Provide existing aerial topographic and GIS information for the project area
- Adhere to review schedule timelines

ARDURRA

D
STAFFING



D STAFFING

The most critical component to the success of the On-Call Civil Engineering contract will be the project team. We understand the key issue for providing effective services is to be highly responsive and have the depth of resources locally available to fulfill your project needs. The right mix of experience, enthusiasm, and fresh ideas is critical to not only an outstanding final product, but an outstanding experience during the performance of the project. Ardurra's team is fully qualified to manage and execute the range of services that may be required for **Category A. Water/Sewer/Storm Water Engineering, Category B. General Civil Engineering, and Category D. Environmental/Water Quality.**

Our team **organization chart (see page 14)** identifies the service category leads and the pool of resources to support each discipline area. As you will see in the organization chart, we have a vast pool of resources, and we are committed to providing appropriate staffing for this project. Moreover, we can bring on additional staff from other offices throughout the company to meet critical deadlines and deliver our services on an accelerated schedule.

Ardurra's wide range of in-house capabilities enables us to provide the right staff at the right time. Our in-house services include project management, civil, mechanical, structural, and electrical engineering and design, SCADA, grant services, as-needed municipal "staff extension" services, water and wastewater master planning and hydraulic modeling, traffic and transportation engineering, plan checking, CEQA/NEPA compliance, regulatory permitting, GIS design and implementation, sewer flow monitoring, community relations, and construction management and inspection services.

Based on the technical requirements of each task, our on-call services manager, Anissa Voyiatzes, will work with the service category lead(s) to communicate with City staff, provide consistency in the project deliverables that meet City needs and requirements, and coordinate Ardurra tasks (if multiple, parallel tasks are being performed for the City). The service category lead will coordinate activities within the team and will be responsible for the development of progress and final submittals, coordination meetings, and status reports.

We process all issues with a sense of urgency and present our clients with suggested alternatives, cost and schedule affects, and recommended solutions that best suit the interests of the project and the City.

TEAM LEADERSHIP

ANISSA VOYIATZES, PE, ENV SP | On-Call Services Manager, Primary Contact

Working in tandem with the discipline leads, Anissa will provide technical oversight and serve as the City's main point of contact, making sure the City's expectations are met or exceeded.

Anissa has 31 years of experience in civil engineering planning, design, program and project management for transportation and public works facilities. These projects have included bikeway, roadway widening, rehabilitation, ADA compliance evaluation and improvements, complete streets and streetscape projects, utility engineering, site grading, traffic engineering, flood control facilities, drainage systems, sewer and water systems, parking lots and retaining walls. With 15+ years holding her ENV SP credentials, Anissa combines her deep-rooted dedication to conservation and sustainability with her engineering expertise. She specializes in developing innovative public works projects that prioritize creative and environmentally conscious design solutions.

MARK LEWIS, PE, TE | QA/QC, Technical Review, and On-Site Project Management

Mark is a proven leader with 40 years of engineering excellence, including a transformative 13-year tenure as Director of Public Works/City Engineer for the City of Fountain Valley, where he championed fiscal sustainability, operational efficiency, and strategic innovation in public infrastructure projects. Mark's perspective from a public agency professional has led to improved solutions, cost-effectiveness, and more robust protections against change orders and claims. He provides insight and guidance to a number of agencies where he has provided onsite program and project management; staff assistance; organizational review; mentoring; capital project development; preparation of capital project bid packages; guidance on water and wastewater collection systems and design strategies to maximize cost efficiency and minimize ongoing maintenance; creative project funding strategies; review and strategy for development of municipal buildings; preparation of multi-year CIPs; landscape concept strategies; and preparation of traffic control, striping, and detour plans.

Mark brings extensive knowledge of Huntington Beach having assisted the City during the transition in the Utilities Division as well as providing project development and management services for projects such as stormwater pump station upgrades, sewer lateral program, waterline construction, and on-site chlorine generation conversion.

ARIC GNESA, PE, DBIA | Water/Sewer/ Storm Water Engineering
Aric has 24 years of professional experience in a wide range of engineering tasks and disciplines including planning, design, and construction management of large- and small-diameter (treated, raw water, and sewage) pipelines, pump stations, flow control facilities, and reservoirs. He is a highly experienced water/ wastewater project manager and specializes in the preparation of plans, specifications, and cost estimates for pipelines, flow control facilities, pump stations, and reservoirs.

LISETTE BICE, PE, QSD | General Civil Engineering
Lisette is a dedicated civil engineer highly skilled in all phases of public works engineering projects. Lisette's 21 years of experience includes planning and design of streets, pedestrian paths (trails) and cyclist safety improvements, right-of-way engineering, grading, sewer, water, and storm drains, identifying seismic and geometric deficiencies, preparing erosion control plans, SWPPP and permitting. As project manager, Lisette has been responsible for the preparation of PS&E for a wide range of projects including street rehabilitation plans and drainage improvements for numerous cities throughout Orange and Los Angeles Counties. She successfully completes projects within budget and on schedule.

LORI TROTTIER, AICP CEP | Environmental
Lori has 36 years of experience as primary author and environmental project manager for compliance with CEQA and NEPA. Her experience includes a variety of development and infrastructure projects involving master plans for large-scale phased development, roadways and intersections, energy transmission, radio and communication sites, development of residential, commercial, mixed-use, and industrial land uses, regional recreation facilities, General Plans, General Plan Elements and Specific Plans. Lori has managed numerous multi-disciplinary teams and been primary author on regionally significant and high-profile CEQA documents involving considerable public input. Lori is an expert on CEQA compliance, environmental planning, and analysis. She can quickly focus on key project issues, understand client needs and develop cooperative agency and stakeholder relationships resulting in win-win outcomes. Lori's experience extends beyond environmental planning and includes many types of entitlement permits for development, natural resources, and construction.

JOSE HERNANDEZ, PE, QSD/P | Water Quality
With 27 years of engineering experience, Jose has managed projects of varying size and complexity through design, permitting, and construction. He has played vital roles in numerous projects that have involved drainage and water quality components, including the preparation of Storm Water Pollution Plans (SWPPP) reports, SWPPP inspections, and Low Impact Development. His experience encompasses design for storm drain systems, street rehabilitation, ADA improvements, concrete flatwork improvements, restriping, installing road signs, and designing for impacts to utilities. He is well-versed in design standards, techniques, analytical methods, bid specifications, and cost estimating.

Resumes for our service category leaders and other key personnel are provided in the Appendix.

TEAMING WITH SPECIALIZED EXPERTS

Our service is greatly facilitated by the working relationships we have in place with our local specialty subconsultant partners. Ardurra has worked extensively with the exceptional firms. This long-standing alliance enables a streamlined approach and smooth coordination. Below is a list of our subconsultant partners, including their role on this contract and a brief overview of their qualifications.

CL SURVEYING & MAPPING | Survey
CL Surveying & Mapping (CL Survey), founded in 2007, is a certified DBE, MBE, and SBE land surveying firm. CL Survey's team of qualified and experienced surveyors provides clients the most cost-efficient, professional, and personalized services in the industry. CL Survey prepares records of survey, engineering drawings, stakeout services, as-built surveys, parcel maps and parcel map exemption applications (lot line adjustments), tract maps, legal descriptions and ALTA surveys. CL Survey is well-versed and proficient in the preparation of legal descriptions and exhibit maps for easements and property descriptions. CL Survey provides field and office survey services for construction staking of utilities, street construction, and site developments; and prepares design surveys as base mapping for street improvement designs, utility routing, drainage studies, and site development or redevelopment. CL Survey is expert in the integration of field survey and record data with digital aerial mapping and orthophotography.

MBN GROUP ARCHITECTS | Architectural
Established in March 2004, MBN Group provides a wide range of architectural services. MBN Group's building type experience includes water, wastewater, and recycled water infrastructure; military projects; public and private schools; fire stations; churches; commercial development; tenant improvement; hotels; and private homes. MBN Group's mission is to provide sensible, aesthetically pleasing and environmentally sensitive structures that exceed the clients expectations and within budget at the same time provides a comfortable environment that promotes creativity and productivity.

TEAM ORGANIZATION

CITY OF HUNTINGTON BEACH
Project Manager

PRINCIPAL-IN-CHARGE
Lisa M. Penna, PE, F.ASCE

QA/QC, TECHNICAL REVIEW, ON-SITE PROJECT MANAGEMENT
Mark Lewis, PE, TE*

ON-CALL SERVICES MANAGER
Anissa Voyiatzes, PE, ENV SP*

CATEGORY A
WATER/SEWER/STORM WATER ENGINEERING

TASK MANAGER
Aric Gnesa, PE, DBIA*

DESIGN ENGINEERING
Aric Gnesa, PE, DBIA*
Jamie Fagnant, PE, QSD*
Rick Kennedy, PE*
Kaitlyn Leong, PE
Mark Lewis, PE, TE*
Patrick Mulvey, PE
Dolores Salgado, PE*
Chris Eccles, PE
Dustin Payne, PE
Christian Minerman, PE*
Dalia Mulato
Raj Shah, PE
Kofi Awumah, PhD, PE
Miguel Hurtado, PE
Eli Farah, PE, QSD, ENV SP
Andrea Mosqueda, PE, QSD, ENV SP
Daniel Lopez, PE
Melesio Ballardo, EIT
Marco Cruzatt, EIT
Alex Di, EIT
Jeremy Monroe, EIT
Jocelyn Shih, EIT
Viet Duy Vo, EIT
Leah Russell, ENV SP
Cameron Brantz
Mallory Dobbs
Daniel Gutierrez
Manny Limaco

STRUCTURAL
Raymond Macy, PE
Andrea Mosqueda, PE, QSD, ENV SP
Colin Moran, PE
Melesio Ballardo, EIT
Alex Di, EIT
Aashish Deo
Bradley Waldrop, PE*

MECHANICAL
Rick Kennedy, PE*

ELECTRICAL/CONTROL
Agata Ristow, PE
Shawn Rohr, PE
Phillip Tran

SCADA
Chuck Reuck

ARCHITECTURAL
MBN Group Architects

MASTER PLANS/FINANCIAL PLANS
Cynthia Peraza, PE
Carmen Kasner, PE

GRANTS
Alison Winter*
Amy Czajkowski, PE, CCM, QSD/P
Lucy Cárdenas
Neah Johnson

SURVEY
CL Surveying & Mapping

CATEGORY B
GENERAL CIVIL ENGINEERING

TASK MANAGER
Lisette Bice, PE, QSD*

CIVIL ENGINEERING
Lisette Bice, PE, QSD*
Jose Hernandez, PE, QSD/P*
Mark Lewis, PE, TE*
Anissa Voyiatzes, PE, ENV SP*
Marie Santos, PE
Andrea Mosqueda, PE, QSD, ENV SP
Bradley Waldrop, PE*
Eli Farah, PE, QSD, ENV SP
Miguel Hurtado, PE
Daniel Lopez, PE
Adilia Miller, PE
Jocelyn Shih, EIT
Alex Di, EIT
Derek Pereyra

NPDES/WQMP/SWPPP
Jose Hernandez, PE, QSD/P*
Lea Reis, PE, QSD/P*
Lisette Bice, PE, QSD*
Andrea Mosqueda, PE, QSD, ENV SP
Chuck Stephan, PE

SURVEY
CL Surveying & Mapping

CATEGORY D
ENVIRONMENTAL/WATER QUALITY

TASK MANAGERS

ENVIRONMENTAL
Lori Trottier, AICP CEP*

WATER QUALITY
Jose Hernandez, PE, QSD/P*

ENVIRONMENTAL SERVICES
Charles Smith, AICP, LEED AP BD+C^
Lori Trottier, AICP CEP*

GRANTS
Alison Winter*
Amy Czajkowski, PE, CCM, QSD/P
Lucy Cárdenas
Neah Johnson

WATER QUALITY
Jose Hernandez, PE, QSD/P*
Lea Reis, PE, QSD/P*
Lisette Bice, PE, QSD*
Andrea Mosqueda, PE, QSD, ENV SP
Chuck Stephan, PE

** Key personnel (resume attached in appendix)*
^ Ardurra start date: 3/17/2025

ARDURRA

E
QUALIFICATIONS

E QUALIFICATIONS

EXPERTS WITH LOCAL EXPERIENCE AND NATIONAL STRENGTH

Ardurra offers the resources of a large national firm with more than 1,750 employees in 85+ offices across the country. Locally, we have 200 employees in five offices throughout Southern California, including in Newport Beach and El Segundo. Since our incorporation in 1977, we are a rapidly growing company of experts, engineers, and design professionals committed to delivering quality services and practical solutions in the fields of public works/civil/water/wastewater planning, design, construction management and inspection; environmental; land development; emergency management; structural engineering; traffic and transportation engineering; survey; as well as public outreach, plan review and plan check, code compliance enforcement, labor compliance, and grant administration.

Ardurra is currently ranked 84th in Engineering News-Record's Top 500, and 69th in Top Pure Design Firms, 36th in Zweig Group's Best Firms to Work For and 5th in Hot Firms. This gives you direct access to more help, unique solutions, and a small army of professionals.

LOCAL IN-HOUSE CAPABILITIES TO MEET TASK ORDER NEEDS

Ardurra's civil engineering design team is experienced and technically current in the design, construction, rehabilitation, maintenance, and funding of sites, highways, roadways, bridges, complete streets, green streets, roundabouts, soundwalls, retaining walls, alleys, grading, ADA compliance verification and design, landscape/median enhancements, traffic and transportation engineering, signing, striping, hydrologic and hydraulic (H&H) analyses and reports, WQMPs, SWPPPs, and NPDES documents, as well as water, sewer, and storm drain improvements. All in accordance with Federal and State requirements, including Community Development Block Grant (CDBG) funded projects.

Ardurra's water group consists of seasoned engineers, hydrologists, and environmental scientists. Our team is experienced with steel tanks, conventional reinforced concrete reservoirs, circular prestressed concrete reservoirs, major transmission mains, interceptor sewers, collections mains, distribution systems, water pump stations, wastewater lift stations, well head facilities, treatment plants, storm drain facilities, site improvements, trenchless technologies, microtunnel/pipe jacking, directional drill, pipebursting, sliplining, pressure reducing stations, flow control/meter facilities, and disinfection facilities. We have personnel that specialize in hydraulic modeling, analysis, design, studies, and reports. Our electrical engineers and SCADA experts can assist with electrical analysis, design, modification/improvement for treatment plants, SCADA condition assessment, and SCADA implementation.

Ardurra's grants team possesses in-depth knowledge about public, federal, state, and regional grant funding requirements and processes, and has a proven reputation for producing high-quality work under time constraints. We have prepared and submitted millions of dollars in federal and state invoice reimbursements, and assisted in project closeout and state/federal financial audits. Not to mention that our team has secured over $80M in transportation grant funds for our clients. Our team is familiar with the Caltrans Local Assistance Manual and federal grant management policies.

Ardurra has experience providing a full spectrum of environmental services, including CEQA and NEPA compliance; regulatory permitting and agency negotiations; CEQA-Plus documents and support; CEQA and NEPA peer review; alternatives analysis; and workshops and training. Our environmental compliance team is known for providing robust and reader-friendly documents that are practical yet defensible, and are based on current legal precedents that shape CEQA/NEPA implementation. We understand that the lead agency often has more than one option in terms of how to proceed through environmental reviews, and that CEQA/NEPA compliance may require choices based on a balance between schedule urgency, cost, community sentiment, and risk of legal challenge. Our central responsibility is providing our clients with the information needed to consider the pros, cons and potential outcomes of all options, allowing the client to make the best and most informed choices for project and long-term success.

RELEVANT EXPERIENCE

Having recently held on-call civil engineering, staff augmentation, construction management, and plan checking contracts with the City of Huntington Beach, we believe this knowledge and familiarity with the City, combined with our experience with varied projects, will enable us to serve seamlessly as an extension of your staff. Following is a list of some of our City of Huntington Beach design projects:

- On-site chlorine & fluoride generation for three water wells
- Equipping of a water well
- Waterline construction
- Sewer lining
- Huntington Harbour storm drain check valves

- Landscape median modifications
- Half-round drainage structures
- Waterline condition assessment
- Fire station fuel canopy

Our team's experience, constant team communication, and quality control approach have provided us with a solid track record of meeting schedules, effectively adapting to unforeseen challenges, and maintaining costs. Our reputation for providing quality services has been confirmed by our ongoing relationships and extended on-call contracts with agencies throughout California.

Below are some examples of our team's project experience within the last five years that are similar in size and scope. We are proud of our track record of successfully delivering these services to you and other cities, which our references will attest.

VARIOUS PUBLIC WORKS DESIGN PROJECTS
City of Seal Beach

Client Contact: Iris Lee, PE, Public Works Director/City Engineer, 562.431.2527 ext. 1322, ilee@sealbeachca.gov

Start/End Dates: 2012-Ongoing

Key Staff: Anissa Voyiatzes (PIC); Mark Lewis (Project Manager)

Ardurra has completed several projects for the City of Seal Beach during the last 5 years. Engineering services have included providing civil engineering, geotechnical, traffic, and survey services for various projects within the city. Improvements have included design of water and sewer main reconstruction, alley paving, upgrade or addition of ADA ramps, pavement rehabilitation, H&H calculations, and the preparation of a proposed storm drain report. Plan check services have included review of the H&H analysis, grading plans, street plans, traffic striping and signing, street lighting, signal plans, storm drain plans, utility plans, landscaping and planting, WQMP, sewer and water plans. A few projects include:

- **6th Street Alley Improvement Project.** Improvements include the design of water and sewer main reconstruction, alley paving, installation of empty fiber optic conduit for future fiber, and ancillary improvements followed by concrete paving of the entire width of the alley.
- **7th Street Alley Waterline and Sewer Replacement Project (CIP No. TW1607).** Prepared complete PS&E for this project, which consisted of designing the replacement of approximately 450 LF of existing 6-inch water and sewer mains. In conjunction with the utility replacement, rehabilitation of approximately 6,750 SF of asphalt and concrete pavement was also designed.
- **Westminster Avenue Storm Drain Study Report from Seal Beach Boulevard to Federal Storm Channel C01S06.** Prepared a report to determine the adequate size to replace a trapezoidal open channel drainage facility with a pipe on the north side of Westminster Avenue from Seal Beach Boulevard to the Federal Storm Channel (C01S06). The project required conducting hydrologic studies of the tributary area and develop discharges at various concentration points for 5, 10, 25, and 100-year storm events. Preparation of the report involved coordination with Orange County Flood Control District and meeting with Orange County Public Works staff to discuss the most up-to-date planning for the Federal Storm Channel and to identify the interim and ultimate conditions for the confluence with the Federal Storm Channel. Work also included hydraulic analyses of the existing system with the 5, 10, 25, and 100-year storm flows to establish existing level of protection and facility constraints. Ardurra developed alternative enclosed facilities (box culverts and pipes) to handle the runoff from the 100-year storm event. Cost estimates were prepared including design, construction, and contract administration/inspection for each alternative.

ON-CALL CIVIL ENGINEERING – STREET & STORM DRAIN DESIGN/REHABILITATION PROJECTS
City of Long Beach

Client Contact: Keith Hoey, PE, City Engineer, 562.570.6586, keith.hoey@longbeach.gov

Start/End Dates: 2009-Ongoing

Key Staff: Anissa Voyiatzes (PIC); Jose Hernandez (QA/QC, Drainage Project Manager); Lisette Bice (Project Manager); Miguel Hurtado, Andrea Mosqueda, Eli Farah (Design Engineers)

As part of an on-call contract with the City of Long Beach, Ardurra staff has prepared plans, specifications, and cost estimates for more than $15 million in improvements since 2009 and continues to work with the City through additional extensions of the original on-call contract. The projects encompass roadway, storm drain, parking lot improvements, traffic, lighting, and landscape improvements, design of more than 150 ADA-compliant curb and ramps, and focused on many of the major roadways within the city. Ardurra staff has consistently provided the City with well-designed projects facilitating smooth construction. Some recent projects include:

- **Market Street Pedestrian Streetscape Enhancements (LA River to Easterly City Limits).** Providing engineering and design services for a Complete Street Project on Market Street between the LA River and Cherry Avenue, an approximate 1.9-mile stretch of the corridor. Complete streets make it easy to

cross the street, walk to shops, and bicycle to work. They allow buses to run on time and make it safe for people to walk to and from train stations. The project consists of complete street improvements including Class IV bike lanes and other new bike/pedestrian facilities, bulbouts, wayfinding signage, road diet with sidewalk extension, crosswalk and transit stop enhancements, construction/reconstruction of curb ramps for ADA compliance, repairing sidewalks, curbs, and gutters, reconstructing/resurfacing roadway pavement, landscaping and street trees, removing/relocating obstructions and utilities, and storm drain relocations.

- **Atlantic Avenue Pedestrian Enhancements.** Provided PS&E for pedestrian enhancement features, including bulbouts, to minimize pedestrian crossing distances across Atlantic Avenue. The project also included 10 new ADA-compliant curb ramps and additional pedestrian lighting. The project limits are from 56th Street to 59th Street.
- **Atherton Street and Magnolia Avenue Street Rehabilitation.** Preparation of three separate PS&E packages, totaling over 1.6 miles of roadway and dozens of curb ramps. The plans include roadway rehabilitation, the design of ADA-compliant ramps at numerous intersections, sidewalk repair to eliminate tripping hazards, and traffic signing and striping.
- **Alamitos Avenue Rehabilitation Improvements.** Preparation of PS&E for 1.0 mile of roadway rehabilitation and dozens of curb ramps. The plans include roadway rehabilitation, the design of ADA-compliant ramps at numerous intersections, road diet, Class II bike lanes, and traffic signing and striping.
- **Atlantic Avenue/Claiborne Drive Bulbout.** Provided design services for bulbouts at the southeast corner of Atlantic Avenue and Claiborne Drive. Drainage patterns at this corner were reviewed to determine if a parkway culvert was required. The project also included removal of the existing crosswalks across Atlantic Blvd.
- **Seaside Way Storm Drain.** Prepared storm drain construction documents for a deficiency-correction project near the coastal portion of downtown Long Beach. The project was necessitated after severe flooding in 2017, including the flooding of several underground parking structures. In conjunction with this project, Ardurra was successful in obtaining FEMA emergency funding for the project. The project entailed the design of a 48-inch RCP to parallel the existing 57-inch storm drain. A significant amount of potholing was required to identify existing vertical and horizontal utility alignments.

ANAHEIM ON-CALL ENGINEERING AND DESIGN SERVICES FOR PUBLIC WORKS PROJECTS

City of Anaheim

Client Contact: Anthony Amado, Assistant Engineer, 714.765.5100 ext. 5826, aamado@anaheim.net

Start/End Dates: 2014-Ongoing

Key Staff: Anissa Voyiatzes (Engineering and Municipal Services Group Leader); Jose Hernandez (Project Manager); Miguel Hurtado (Design Engineer)

Ardurra has provided engineering design services for various street projects including:

- **Lincoln Avenue Improvements.** Provided engineering design services for this widening project, which will widen 3,000 feet of Lincoln Avenue from East Street to Evergreen Street. The project widens Lincoln Avenue from a 4- to 6-lane divided street within the project limits. The scope included the removal of existing improvements, clearing, and grubbing, excavation, placement of new AC pavement, construction of concrete curb and gutter, driveways, access ramps, sidewalks, bus pads, drainage system improvements, relocation of existing facilities, installation of a traffic signal at the intersection of Lincoln Avenue and La Plaza, traffic signal modifications, signing, striping, landscaping, and a WQMP. Landscaped medians along Lincoln Avenue and along the project roadways include drought-tolerant and low-maintenance plantings and trees.
- **Katella Avenue Widening.** Prepared PS&E design services to widen the south side of Katella Avenue next to the Anaheim Convention Center. This project included widening Katella; reconstructing a bus turnout; adding water quality structures; reconstructing offsite landscaping, irrigation, fixed bollards, retractable bollards, vehicular maintenance pathway, and decorative hardscape; and installation of two new electronic changeable message signs (VMS/CMS) systems in the median island. Significant coordination is involved with the various City departments as well as with the various utility companies and the Anaheim Convention Center staff. Provided construction support throughout the construction duration of the project.
- **Tustin Avenue/La Palma Avenue Intersection Improvements.** Prepared PS&E for the widening of this key arterial intersection. The $10-million project involved development of a Precise Alignment Plan, Landscape Concept Plan, and legal descriptions. The project included design of a raised, landscaped median, parkway landscaping in both the City area and a large slope in Caltrans right-of-way, and significant

redesign of private property improvements impacted by the roadway widening. The approval process included obtaining an easement and encroachment permit from Caltrans. Other elements of the project included design of significant water, storm drain, and retaining wall improvements.

- **La Palma Avenue and State College Boulevard Intersection.** Prepared PS&E for the widening of this key arterial intersection in Anaheim. The final Precise Alignment Plan resulted in significant right-of-way cost savings. The project included the design of a raised, landscaped median, bike lanes, parkway landscaping, and redesign of private property improvements impacted by the roadway widening. Other elements of the project included the design of private sign relocations, water quality and utility improvements. Ardurra staff developed an alternate alignment that resulted in maximum use of existing excess right-of-way; minimal impacts to existing development; right-of-way cost savings greater than $500,000; and avoided acquisition from gas station.

VARIOUS INFRASTRUCTURE PROJECTS, CAPITAL PROGRAM MANAGEMENT

City of Laguna Beach

Client Contact: Mark Trestik, PE, City Engineer, 949.497.0300, mtrestik@lagunabeachcity.net

Start/End Dates: 2009-2022

Key Staff: Anissa Voyiatzes (Engineering and Municipal Services Group Leader); Jose Hernandez (Project Manager); Andrea Mosqueda (Design Engineer); Miguel Hurtado (Design Engineer)

Ardurra staff provided complete turnkey capital project delivery services for the City including overall CIP management of design and construction projects, federal funding application support, energy grants administration, construction inspection, and construction administration for various infrastructure and building facilities improvements. Ardurra helped deliver a program over $10 million in capital projects in this four-year contract. Below are a few of the projects from this contract.

- **Jasmine Street Storm Drain.** Prepared PS&E for the conceptual and final design for these improvements. The recommended alignment allows for intercepting the upstream-most culvert that outlets onto private property; collects runoff on an interim basis from the adjacent drainage basin; and takes advantage of the existing downstream culverts that outlet directly to the beach. The project included H&H analysis of the Jasmine Drainage Basin as well as the adjacent easterly and westerly drainage basins. Pipe jacking was required across Coast Highway to minimize traffic disruptions, and an Encroachment Permit was required from Caltrans. This project involved MS4 Permit coordination. ***2022 APWA BEST Award Winner***
- **Temple Hills Sidewalk.** This project consisted of extending the Temple Hills sidewalk, which currently terminates at Dunning Drive, to Palm Drive. The sidewalk extension resulted in a new 4-foot-wide sidewalk, curb and gutter, and hand railings on one side of the street. Design work included preparation of survey, right-of-way verification, community involvement, environmental documentation, and PS&E.
- **Milligan Drive Bridge Improvements, Emergency Bridge Inspection, and Repair Recommendations, Design/ Assessment District.** Because of structural deficiency in this vehicle bridge over Laguna Canyon Channel, the City called upon Ardurra to design bridge and related improvements, which consisted of replacement of the bridge including a new driveway approach and curb and gutter at Laguna Canyon Road that met City, AASHTO, and Caltrans standards. The sidewalk and access to the community from within Caltrans right-of-way meets ADA criteria and new Caltrans guidelines that reduce allowable maximum grade to 7.5 percent.
- **Broadway Pedestrian/Safety Improvements.** This roadway project was designed within Caltrans right-of-way and consisted of roadway, streetscape, drainage, traffic, and grading improvements. This primary route between the city and SR-73 and I-405 carries substantial vehicular traffic, is adjacent to the Laguna Canyon Channel, and is home to many commercial, retail, restaurant, entertainment, and artisan businesses. Several utilities located within the parkways were impacted. In addition to a Caltrans Encroachment Permit and Fact Sheet, the project included significant pedestrian safety improvements; median island landscaping; Caltrans authorization forms; and signing, striping, traffic control, and traffic calming.

ON-CALL MUNICIPAL ENGINEERING/ STAFF AUGMENTATION

City of Lake Forest

Client Contact: Tom Wheeler, PE, Director of Public Works/City Engineer, 949.461.3481, twheeler@lakeforestca.gov

Start/End Dates: 2011-Ongoing

Key Staff: Mark Lewis (Project Manager); Miquel Hurtado (Design Engineer)

Ardurra is providing municipal and staff augmentation services as needed by the City. Services include program management, public works/development land use/map and plan checking, grading

inspection, encroachment permit inspection, landscape inspection and supplementing Public Works Department staff as needed.

Work has included project management for 12 projects and funding analysis for a transportation funding program. Tasks include reviewing land use applications; plan checking development plans and maps; inspecting approved land development construction; inspecting approved work in the public right-of-way; public works encroachment permit inspection; water quality program management; and providing additional staff on an as-needed basis.

Ardurra is responsible for managing plan checking and inspection of various residential developments and the single-property development/remodels throughout the city. Tasks include short- and long-term CIP planning and budgeting, researching matters related to regulations and ordinances, funding options, assistance with the operating budget, and any other needs of the City. Deliverables are varied and include plan and reports for rough grading plans, precise grading plans, street and alley plans, storm drain plans, hydrology reports, hydraulic reports, street lighting plans, traffic signal plans, traffic control plans, landscape and irrigation plans, retaining and MSE wall plans, and water and sewer plans.

Services have involved engineering implementation of the City's Opportunity Studies Area (OSA) that comprises five developments totaling over 4,000 housing units; design of the Los Alisos Boulevard resurfacing project; conducting the annual sidewalk survey; and inspection of the catch basin insert project. The OSA projects involve plan check and inspection of all facets of development including map approval; rough grading; precise grading; street and storm drain improvements; park development; and median and parkway improvements.

Inspection has involved ADA ramps, street lighting installations, all encroachment permit projects, grading, storm drain, wet and dry utilities, curb and gutter projects, sidewalk projects and all restoration projects within an encroachment permit. Wet utility agencies include El Toro Water District, Irvine Ranch Water District, Santa Margarita Water District and Trabuco Canyon Water District. Dry utility agencies include The Gas Company, AT&T and Cox.

Our team also provided inspection of the Baker Water Treatment project that involved working in conjunction with the Irvine Ranch Water District and installation of 36-inch CMCL pipe.

ON-CALL PROFESSIONAL ENGINEERING SERVICES

City of Ontario/Ontario Municipal Utilities Company

Client Contact: Omar Gonzalez, PE, Principal Engineer, 909.395.2578, oegonzalez@ontarioca.gov

Start/End Dates: 2019-Ongoing

Key Staff: Dolores Salgado (Project Manager); Jaimie Fagnant, Chuck Stephan, Mark Lewis, Agata Ristow (Design QC Review); Jose Hernandez, Kaitlyn Leong (Design Engineers); Miguel Hurtado, Andrea Mosqueda, Dalia Mulato, Marco Cruzatt, Eli Farah, Melesio Ballardo, Cameron Brantz, Jocelyn Shih, Manny Limaco, Daniel Gutierrez, Katy Lin (Project Engineers)

Ardurra has been providing various services to the City of Ontario/ Ontario Municipal Utilities Company since 2019. The following list includes highlights some of our projects:

- **Ontario Regional Sports Complex.** Design of approximately 4 miles of offsite street improvements, drainage, sewer, water, and recycled water improvements; traffic signals; street lighting, ITS; and Southern California Edison high voltage power relocations and Rule 20 undergrounding of the power distribution system.
- **San Antonio Ave. 30-Inch Diameter Transmission Water Main.** The project consists of approximately 2,900 LF of new 30- and 36-inch cement mortar lined and coated welded steel pipe; abandonment of approximately 3,700 LF of existing 18-inch steel pipe.
- **Ontario Ranch Phase 2, Water Main Improvements.** The project included an expedited schedule to meet immediate water demands; 2 miles of 18-inch potable water main, 1.5 miles of 42-inch potable water main, and a pressure reducing station.

Additional task orders include a Risk and Resilience Assessment, Annual Land Use Control Inspection for Department of Toxic Substances Control, Construction Engineering for the San Antonio Transmission Main, Fourth Street Storm Drain, and Construction Phase Services for San Antonio Transmission Main.

AS-NEEDED ENGINEERING DESIGN SERVICE

Eastern Municipal Water District

Client Contact: Greg Kowalski, PE, Engineering Manager, 951.978.3777 x4466, kowalskg@emwd.org

Start/End Dates: 2006-Ongoing

Key Staff: Aric Gnesa (Project Manager); Jamie Fagnant, Kaitlyn Leong, Rick Kennedy (Design Engineers)

Ardurra has been providing various services to the Eastern Municipal Water District since 2006. The representative project list below demonstrates our long-standing relationship:

- **Disadvantaged Communities (Mead Valley Cajalco Corridor and Good Hope Olive Area) Water Main Improvements.** Design of approximately 1,650 LF of new 8-inch-diameter water pipeline in the Mead Valley area and approximately 7,800 LF of new 8-inch-diameter water pipeline in the Good Hope Olive area.
- **Mountain Avenue Gap Pipeline.** Design of 1,800 LF of 18-inch-diameter potable water main along Mountain Avenue (also known as Ramona Expressway) in the City of San Jacinto, to close a gap between existing 18-inch potable water transmission mains at Oak Knoll Road and Old Mountain Avenue.
- **Cactus II Feeder Transmission Pipeline Planning Study.** Planning study for 6.5 miles of 36-inch - 48-inch water pipeline including water demand assessment, pipe diameter versus pump energy evaluation, alignment alternatives evaluation, and preliminary project cost estimates.
- **Fox Street Tank Replacement and Pipeline.** Demolition of existing 0.15 MG Salter Road Tank and design of a new 1.0 MG Fox Street Tank with 1,750 LF of fusible PVC water main.
- **Mission Canyon II Pump Station.** Design of a new pre-packaged skid-mounted booster station and emergency generator, site grading, 5,200 LF of a 12-inch and 8-inch-diameter pipeline and demolition of the existing pump station.
- **Mead Valley Cajalco Corridor Sewer.** Preliminary and Final design of 10,200 LF of a sewer pipeline in a heavily traveled roadway with high groundwater. Preliminary design included an alignment analysis.
- **North Perris Regional Sewer Project.** Preliminary and foal design of approximately 9,200 LF of a 12-inch to 18-inch-diameter sewer in a heavily traveled roadway with extensive rock requiring blasting.
- **Ridgemoor Road Pipeline Replacement.** Final design of approximately 4,800 LF of a 12-inch-diameter pipeline including 82 water services and the abandonment of the existing pipeline. Project required detailed construction phasing strategy to minimize impacts to adjacent elementary school.

PERRIS AT PENTECOSTAL

Perris at Pentecostal LLC/ City of Moreno Valley

Client Contact: David Patton, Developer/Applicant, 949.852.0266, dpatton545@gmail.com

Start/End Dates: 2021-2022

Key Staff: Lori Trottier (Environmental Manager); ELMT Consulting (Biology); BCR Consulting (Archaeology/Paleontology); Ganddini Group (Traffic, Air, Noise)

The proposed project is a gated 426-unit apartment complex on 18.05 net acres of land. A residential density of 23.61 dwelling units per acre (DU/AC) is proposed in compliance with the Moreno Valley Zoning Code and General Plan. The project required discretionary approvals from the City for PEN20-0211 (IS/MND), a plot plan (PEN21-0215), and Tentative Tract Map (TTM 38064) and required permits for demolition of the existing residence and foundations, grading permit, and building permits. Project plans show right-of-way dedication along adjacent streets and construction of ultimate street improvements for Emma Lane, Santiago Drive, and Iris Avenue. The project included construction and dedication of 1.845 acres for public open space/recreation, extension of utilities to the project site, and development of two and three-story apartment buildings. Key environmental constraints/issues included aesthetics, biological resources, geology and soils, cultural resources, transportation, air quality, hazards and hazardous materials, public services, and tribal cultural resources.

Ardurra prepared a CEQA Initial Study/Mitigated Negative Declaration, Mitigation Monitoring and Reporting Program and technical studies for traffic, air quality, biology, and cultural resources. The IS/MND provided a synthesized analysis for decision makers on project compliance with the City's General Plan and approved regional plans and programs established by Southern California Association of Governments to implement regional environmental sustainability. These documents were incorporated into the administrative record for the project approval and provided supporting information on findings of fact for discretionary actions taken by the City.

References of Work Performed Form

(List 5 Local References)

Comany Name: Ardurra Group, Inc

1. Name of Reference: City of Long Beach

Address: 411 West Ocean Blvd., 5th Floor, Long Beach, CA 90802

Contact Name: Keith Hoey, City Engineer Phone Number: 562.570.6586

Email: keith.hoey@longbeach.gov

Dates of Business: 2009 – ongoing

2. Name of Reference: City of Seal Beach

Address: 211 8th Street, Seal Beach, CA 90740

Contact Name: Iris Lee, PW Dir/City Engineer Phone Number: 562.431.2527 ext. 1322

Email: ilee@sealbeachca.gov

Dates of Business: 2012 – ongoing

3. Name of Reference: City of Anaheim

Address: 200 S. Anaheim Blvd., Anaheim, CA 92807

Contact Name: Anthony Amado, Asst. Engineer Phone Number: 714.765.5100 ext. 5826

Email: aamado@anaheim.net

Dates of Business: 2014 – ongoing

4. Name of Reference: City of Lake Forest

Address: 100 Civic Center Drive, Lake Forest, CA 92630

Contact Name: Tom Wheeler, PW Dir/City Eng Phone Number: 949.461.3481

Email: twheeler@lakeforestca.gov

Dates of Business: 2011 – ongoing

5. Name of Reference: City of Ontario/Ontario Municipal Utilities Company

Address: 1425 S. Bon View Avenue, Ontario, CA 91761

Contact Name: Omar Gonzalez, Principal Eng Phone Number: 909.395.2578

Email: oegonzalez@ontarioca.gov

Dates of Business: 2019 – ongoing

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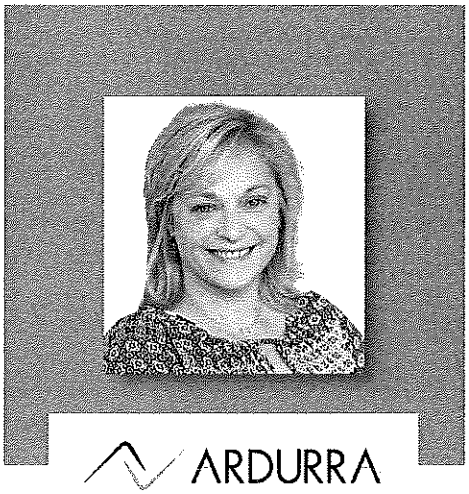
Appendix
RESUMES



ARDURRA

EDUCATION

BS, Civil Engineering, California State University, Chico, 1993

REGISTRATION

Registered Professional Engineer
CA No. C57710

CERTIFICATION

Envision Sustainability Professional/Institute for Sustainable Infrastructure

AFFILIATIONS

American Society of Civil Engineers

American Public Works Association

American Council of Engineering Companies

California City and County Engineers Association

YEARS OF EXPERIENCE

31 years

ANISSA VOYIATZES, PE, ENV SP

ON-CALL SERVICES MANAGER

Anissa Voyiatzes brings more than 30 years of experience in civil engineering, encompassing planning, design, program and project management for transportation and public works facilities. Her diverse project portfolio includes roadway widening and improvements, ADA compliance evaluations and improvements, complete streets and streetscape enhancements, bikeways, utility engineering, site grading, traffic engineering, flood control structures, drainage systems, sewer and water infrastructure, parking lots, and retaining walls. She specializes in public works engineering that incorporates sustainable design practices.

Having spent many years leading multi-discipline design teams delivering public works projects off on-call contracts throughout Southern California, Anissa is intimately familiar with the challenges that the City may face. Anissa's project management approach, which has been key to her success, involves focusing on the needs of her clients while staying flexible and adaptable through the life of the project. Anissa brings a proven approach and established stakeholder relationships, as well as a comprehensive understanding of the key issues, which makes Anissa a perfect fit for her role on this contract.

PROJECT EXPERIENCE

On-Call Civil Engineering & Plan Checking Services, City of Huntington Beach. Engineering and Municipal Services Group Leader overseeing engineering and plan checking services for various infrastructure projects.

Doheny Village Connectivity Improvement Project, City of Dana Point. Senior Project Manager responsible for engineering and design services for a complete streets project on Doheny Park Road and Coast Highway. The project consists of street improvements including pedestrian pathway improvements, new Class I/II bike facilities, sidewalk widening, a new storm drain system, ADA ramp, new sidewalks, curbs, and gutters, reconstructing/resurfacing roadway pavement, traffic, and pedestrian lighting, landscaping, removing/relocating obstructions and utilities, miscellaneous sustainable design features for improved mobility and safety for all users especially pedestrians and cyclist, and extensive stakeholder coordination including Caltrans.

North Hill Complete Streets Project, City of Pasadena. Senior Project Manager performed PS&E and public outreach. Ardurra provided the design of two residential intersection roundabouts for the calming of traffic on North Hill Avenue at East Topeka Street and East Elizabeth Street. The project included roundabouts, bulbouts, curb ramps, street lighting, signing and striping, parkway and private property improvements, and roadway rehabilitation. The project involved project management, public outreach, utility coordination, preliminary design, and final PS&E.

Citywide Curb Ramp Program (including Design-Build), City of Long Beach. Senior Project/Program Manager for the overall management and design of curb ramps for the City's ramp programs, both design-bid-build and design-build. As part of the EBS General Engineering team, Ardurra provided an evaluation and design of curb ramps. The project included ramp site evaluation for ADA compliance, schematic and final design, cost estimating, and post-construction compliance evaluation for 300+ curb ramps.

Market Street Pedestrian and Streetscape Enhancements Project (LA River to Cherry Avenue), City of Long Beach. Quality Control Manager and Group Leader for the design of the roadway and for a pedestrian and streetscape enhancement project on Market Street between the LA River and Cherry Avenue, an approximately 1.9-mile stretch of the corridor. The project consists of complete street improvements including Class II/IV bike lanes and other new bike/pedestrian facilities, bulbouts, wayfinding signage, sidewalk widening, crosswalk and transit stop enhancements, construction/reconstruction of curb ramps for ADA compliance, repairing sidewalks, curbs, and gutters, reconstructing/resurfacing roadway pavement, pedestrian lighting, traffic signal installation/upgrades, flashing beacons, landscaping and street trees, removing/relocating obstructions and utilities, and miscellaneous sustainable design features for improved mobility and safety.

West Anaheim Street Rehabilitation and Reconstruction, Port of Long Beach. Senior Project Manager providing overall project management for the project, which involved preparation of a robust outreach program, a comprehensive Port vehicle traffic handling and detour plan, the Basis of Design Report including fund alternatives and feasibility studies, and PS&E for the 4,350-LF project. The project provided pavement and median reconstruction, lane reconfiguration, traffic signal modifications, ADA upgrades, significant parkway and median landscaping and beautification, and stormwater quality improvements comprised of parkway bioswales (stormwater pass-through) and filterra tree wells.

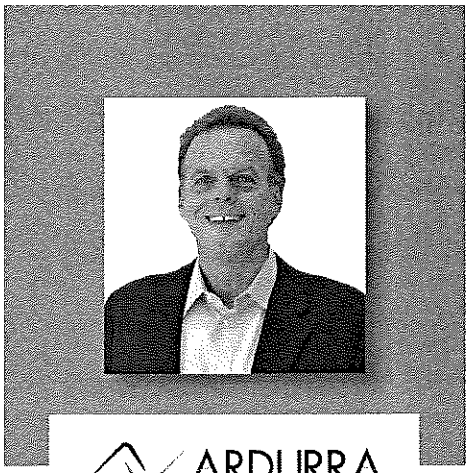
North Spring Street Bridge Improvements and Viaduct Widening, City of Los Angeles. Senior Project Manager for developing PS&E for the widening of the North Spring Street Bridge over the Los Angeles River. This high-profile, $40 million project addressed seismic and geometric deficiencies, improved pedestrian and cyclist safety, and maintained the historical integrity of the bridge. The project scope included the widening of the historic bridge, a seismic retrofit, dual Class II bike lanes, construction of new sidewalks and ADA ramps, building demolition, permanent street closure, relocation of major utilities, traffic signal modifications, and new street lighting. Provided project and program management for the roadway and bridge widening for the North Spring Street Bridge that included a multi-discipline team of subconsultants and extensive coordination with stakeholders, the community, and multiple City of LA departments.

I-210 Soundwalls, Supplemental Environmental Report (NBSSR) and PS&E Phase III, City of La Cañada Flintridge. Engineering Services Group Leader for the design of three separate soundwalls along the I-210 freeway. The project has included soundwall design along a hillside slope, several edge of travel ways, and over bridges. As part of this design, the project has involved significant coordination with the City, Caltrans, and the design team.

2019 Cycle 1 Residential Street Improvements, City of Manhattan Beach. Senior Project Manager responsible for overseeing the design and management for five miles of street improvements at various locations around the city. Design work included pavement rehabilitation, curb and gutter construction, sidewalk construction, driveway construction, and reconstruction of 61 curb ramps.

Plaza del Amo at Western Mobility Enhancement, T-177, City of Torrance. Senior Project Manager for the preparation of construction documents for the roadway widening of Plaza del Amo from 223rd Street to Western Avenue to improve circulation and pedestrian safety. Improvements include widening of the roadway on the north side, addressing roadway and stormwater deficiencies, restriping, curb and sidewalk, and ADA-compliant ramp upgrades. Processed Caltrans Encroachment Permit for modifications and improvements at Western. ***This project won an ASCE award for Outstanding Small Engineering Project.***

Bending the River into the City, Metabolic Studio (Los Angeles). Client Liaison for a completely unique use of civil engineering to develop a new relationship with the river, not as a polluted flood control device, but the original source of water for region. This infrastructural artwork project would involve constructing and operating a 48-foot-diameter water wheel, modeled after the historic wheel that existed near the site. The purpose of the project is to divert water from the LA River and create an aesthetic/educational statement, showing that the LA River can be used as a source of water, enhancing the connections with the community, and provide a viable long-term water source for neighboring parks.



ARDURRA

EDUCATION

California State University, Long Beach
BS, Civil Engineering, 1986

REGISTRATION

Registered Professional Engineer
CA No. C49335

Registered Traffic Engineer
CA No. TR1637

Registered Traffic Operations Engineer, CA No. #661

AWARDS

2019 APWA Southern California Top Leader Public Sector

AFFILIATIONS

American Society of Civil Engineers

American Public Works Association

Institute of Transportation Engineers

American Water Works Association

City Engineers Association of Orange County

League of California Cities Public Works Officers Institute

YEARS OF EXPERIENCE

40 years

MARK LEWIS, PE, TE

QA/QC, TECHNICAL REVIEW, ON-SITE PROJECT MANAGEMENT

Mark Lewis is a proven leader with 40 years of engineering experience. Mark's ambitious career with the City of Fountain Valley spanned 34 years, commencing as a college intern and advancing to the position of Director of Public Works/City Engineer for the last 20 years. While with the City, Mark oversaw and directed the development review process for the Public Works Department. Bringing a perspective from a public agency professional has led to improved solutions, cost-effectiveness, and more robust protections against change orders and claims. He provides insight and guidance to a number of cities and water districts where he has provided onsite program and project management; staff assistance; organizational review; mentoring; capital project development; preparation of capital project bid packages; guidance on water and wastewater collection systems and design strategies to maximize cost efficiency and minimize ongoing maintenance; creative project funding strategies; review and strategy for development of municipal buildings; preparation of multi-year CIPs; landscape concept strategies; and preparation of traffic control, striping, and detour plans.

Mark brings extensive familiarity with the City of Huntington Beach, having served as On-Call Contract Manager over the last four years working with the City on several projects.

PROJECT EXPERIENCE

Sewer Lining FY 2022/2023, City of Huntington Beach. Project Manager. The project included the cleaning, CCTV, and lining of 25,000 LF of existing sewer line, rehabilitation and lining of 84 manholes, and re-establishment of all private sewer laterals into the main line. Ardurra was charged with providing project management and project controls for the project through completion. Ardurra was brought in halfway through the project as it had stalled and the City needed assistance to get the contractor refocused and back on track. Once we took the reins, the project proceeded on track and was completed in a timely manner without further interruptions or issues. There was one change order on the project that was contentious between the City and contractor. Mark worked with both parties to settle the matter amicably.

Utilities and Public Works Management Support, City of Huntington Beach. Project Manager responsible for providing organizational analysis and recommendations, assisted with the development of the Capital Improvements Program, including storm water pump station upgrades, sewer lateral program, and on-site chlorine generation, well equipping and siting, pipeline condition assessments, and coordinated with supervisors and superintendents relative to operational and capital issues. In addition, Mark worked with staff to develop a median landscape project utilizing drought mitigation funds from MWDOC, assisted the City's Transportation Division with negotiations on the I-405 Freeway Maintenance Agreement and a sign and marking inventory citywide.

As-Needed Development Plan Checking and Entitlement Review Services, City of Huntington Beach. Contract Manager for the last four years overseeing working with the City under various on-call contracts. Services include providing checking of final maps prepared by private land owners/developers; plan checking and verifying compliance with the Subdivision Map Act, City Conditions of Approval and the approved Tentative Map; entitlement

review; subdivision maps; hydrology and hydraulics; street improvement plans; grading plans; water and sewer plans; and water quality management plans (WQMP).

Gundry Reservoir Rehabilitation Project, City of Signal Hill. Project Director. Ardurra provided civil and mechanical design services for a sand basin and reservoir to be rehabilitated. The reservoir is estimated to be built during the 1940's by the U.S. government but no plans were produced to confirm this, rehabilitation projects after the tank were constructed were the only as-builts present. The floors and walls of the sand basin and reservoir were to be repaired, any wall penetrations deemed unnecessary were to be removed and repaired, and the existing coatings removed and replaced. Additional footings were placed to accommodate a modern aluminum roof. The existing reservoir internal PVC inlet piping was to be removed and replaced along with mixing inlets, stands, any associated hardware and the outlet grates. Existing steel pipes both inlet, outlet and backwash were to be media blasted and repainted. The reservoir overflow grate was to be replaced and grading of a swale for an overflow/drainage area was proposed.

Project Management, Funding, and Traffic Engineering Support, City of Lake Forest. Project Manager providing project management of 13 CIP projects with four separate design consultants, coordinating with multiple agencies and funding sources. Services include providing design solutions and constructability approach recommendations that are being implemented to meet funding and delivery deadlines; review and update of developer funding matrix and suggestions for how to manage multiple funding sources best; additional municipal engineering assistance with traffic operations, traffic engineering, and transportation management for capital improvement projects, including developing traffic engineering policies, traffic commission agenda reports, reviewing development projects as they relate to traffic impacts, school traffic programs, and daily traffic engineering questions/concerns.

Randall Avenue Street Improvements, City of Rialto. Program/project manager leading the design team in a three-phased/three-contract approach by: 1) evaluating Randall Avenue street improvements for traffic, ADA, and construction quality concerns by developing a strategic plan report; 2) directing the design effort to prepare plans for improvement, and coordinating with the City, including the city manager, city attorney, mayor pro tem, and the City's ADA consultant; 3) preparation of plans to widen the remaining section of roadway over a flood control channel to improve traffic flow and ADA access while eliminating a roadway hazard.

Cabot Road, Muirlands Blvd., and Melinda Road Pavement Rehabilitation, City of Mission Viejo. QA/QC for paving and signing/striping design for three arterial highway segments (approximately 3.3 miles in length). During this review, made suggestions such as night work in business areas where residents aren't affected, and businesses would not be impacted by day work.

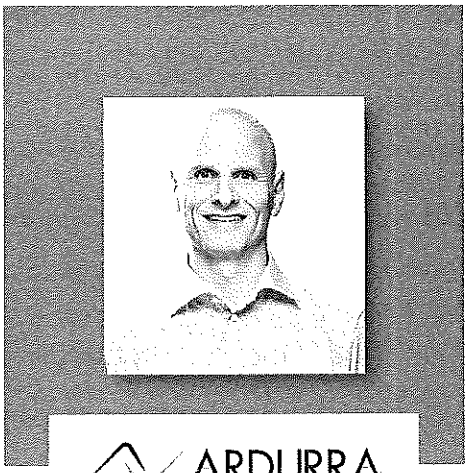
North Hill Complete Streets Project, City of Pasadena. QA/QC for the design of two residential intersection roundabouts for the calming of traffic on North Hill Avenue at East Topeka Street and East Elizabeth Street. The project included roundabouts, bulbouts, curb ramps, street lighting, signing and striping, parkway and private property improvements, and roadway rehabilitation. During his review, Mark utilized public sector experience as DPW to review the design from the standpoint of how the DPW and the City might view the final project.

Project Management/Oversight Assistance, New HQ Building, East Orange County Water District. Project Manager responsible for determining project delivery alternatives to provide project management and oversight assistance to the EOCWD for the construction of a new 6,000-square-foot EOCWD Headquarters building, including site work. Assistance provided includes design considerations, delivery method options, entitlement considerations, budgetary considerations, alternative energy solutions, and architectural compatibility with District history, City planning, and neighborhood aesthetics for style, mass, and scale.

Project Management/Constructability Review, City of Seal Beach. Project Manager responsible for providing constructability review and project management for a water and sewer line replacement project as well as an upgrade to a sewer lift station.

City Engineering Support, City of Laguna Hills. Project manager responsible for providing assistance with development and permit review, capital project management, staff augmentation, policies, and procedures updates, staffing services for City Traffic Commission, and other general city engineering support services.

**Work performed prior to Ardurra*



ARDURRA

EDUCATION

MS, Civil and Environmental Engineering, California Polytechnic State University, San Luis Obispo, 2003

BS, Civil Engineering, California Polytechnic State University, San Luis Obispo, 2001

REGISTRATION

Registered Professional Engineer CA No. C68339

CERTIFICATION

Designated Design-Build Professional™ from the Design-Build Institute of America

AFFILIATIONS

American Society of Civil Engineers

American Water Works Association

YEARS OF EXPERIENCE

26 years

ARIC GNESA, PE, DBIA

DISCIPLINE LEADER – WATER/SEWER/STORM WATER ENGINEERING

Aric has 25 years professional experience in a wide range of engineering tasks and disciplines including planning, design, and construction management of large and small diameter (treated, raw water, and sewage) pipelines, pump stations, flow control facilities, and reservoirs. Temporary positions (3-12 months each) include internships in geotechnical, land surveying, and land development, and Contract Consultant (design engineer and construction management) at the San Diego County Water Authority (SDCWA) for 18 months. Prior to completing his formal education, Aric worked in the construction industry for 8 years as a craftsman, foreman, and project manager. This combination of practical experience and highly technical education make Aric well suited for a variety of projects and duties pertaining to civil engineering.

PROJECT EXPERIENCE

R-6 Reservoir Floating Cover and Liner, Hilts Consulting Group. Project Manager. Ardurra provided civil, mechanical design services and construction support for a new cover and liner for an existing 275-million gallon potable water reservoir. 5 rainwater pumps were added to the project to convey storm water off the proposed cover. Storm drain pipe was added to accommodate the cover pump outlets and routed to the existing storm drain system. Previously the storm water was allowed to gravity flow through lines attached to drain system within the reservoir. 3-24" butterfly outlet valves, 1-18" butterfly inlet valve, 1-12" ball drain valve and 1-6" ball leak detection valve was replaced. All valves were hydraulically controlled. All control piping, mechanical valving and controls were upgraded and replaced within the control cabinet. A booster pump station, which supplied the hydraulic fluid (water), was replaced within the existing control building. An 8" plug valve and 8" surge relief valve was added to the system within the existing control building. An existing 12" flow meter was replaced with a magnetic flow meter that better accommodated low flows that were sometimes present. The existing 2" bypass line and flow meter that bypassed the 12" flow meter was cleaned inspected and put back into service. Previously there was a clogging issue in the 2" bypass line.

Sutter National Wildlife Refuge Lift Station, Ducks Unlimited/Myers & Sons Construction. Project Manager. Ardurra served as Engineer of Record, providing design this Design-Build project for a new surface water pump station, concrete distribution box, and 54" HDPE pipeline. The project includes demolition of existing pump station and concrete structures, new lift station structure consisting of a three level steel frame structure on steel piles with metal and concrete decking, four pumps fitted with fish screens with the capacity to deliver flows from 10 to 80 cubic feet per second (CFS), 12-inch to 54-inch steel discharge piping and header, flow meters, valves and appurtenances, approximately 700 feet long of 54 inch diameter buried HDPE conveyance pipeline to deliver water from the pump station to distribution structure; concrete distribution junction structure to control water to points of delivery; and extension of an above-ground power source from an existing line to the lift station.

Central-Wheeler Tank Replacement, Sweetwater Authority. Project Manager. Ardurra provided civil, mechanical, and structural design services for a new 800,000 gallon potable

water, welded steel tank and associated piping (inlet/outlet, overflow, site drainage), sitework and grading, access road, safety and security, and tank chlorine residual control system comprised of a tank mixer and disinfection equipment housed in a prefabricated building.

Pipelines 3 and 4 Relining - Black Mountain to Miramar Hill, San Diego County Water Authority. Design Engineer and construction management support for 5 miles of 66-inch and 96-inch prestressed concrete cylinder pipe (PCCP) relining with steel. Tasks performed include design calculations, size facilities and liners, draft specifications, development of draft bid documents, prepare Storm Water Pollution Prevention Plan, conduct field investigations on existing facilities, perform field inspection of new facilities and conduct internal pipeline inspections, provide submittal and request-for-information review and response, attend weekly meetings with contractors and other construction management staff, and perform field inspections.

511 Pump Station, City of Oceanside. Project Engineer for the preliminary design of a 4.5 MGD pump station and discharge pipeline to pump from the Mission Basin Groundwater Purification Facility (RO Plant) directly to the 511 pressure zone. The new pump station will allow the City to fully utilize the capacity of the RO Plant, increasing the volume of locally produced water, and further ensuring a safe and reliable source of water for the area.

Upas Street Pipeline Replacement Project, City of San Diego. Project Engineer for the design of 1,600 LF of 24" fusible PVC pipeline for the historic State Route 163 crossing and installed using horizontal directional drilling. The overall project involved the replacement of an aging 5-mile long potable water transmission main in the City of San Diego's North Park, Uptown, and Midway-Pacific Highway communities with 24-inch diameter, cement mortar lined and coated steel pipeline and 16" diameter PVC pipeline.

Design-Build of Water Production Wells for Emergency Water Supply at Eleanor Pardee Park and Library/Community Gardens, City of Palo Alto. Project Engineer for the design of two fully operational emergency supply water wells connected to the City of Palo Alto's water distribution system. The well sites are highly visible to the public; one is at the City's Main Library, adjacent to an important community garden facility, and the other is at Eleanor Pardee Park, a neighborhood park that provides children's playgrounds, picnic areas, and an additional community garden. At both sites, design challenges included the need to develop wellhead facilities that would blend into their surroundings and avoid introducing inappropriate "industrial" aesthetics into recreational greenspace. In addition, because of City regulations prohibiting loss of recreational lands, it was essential to minimize the above-ground footprint of the finished facilities. Effective public outreach and construction noticing were identified as particularly important for the success of this project, which kicked off immediately following the controversial removal of several mature trees on California Avenue in the City's central business district.

Bowron Road Sewer Upsize, City of Poway. Project Manager. The Bowron Road Sewer Upsize Project replaces surcharging pipes along Bowron Road, south of Poway Road. Approximately 1,450 feet of 18-inch diameter pipe will be replaced with 21-inch diameter pipe to alleviate the surcharging. An additional 480 feet of surcharging 8-inch pipe was analyzed and included in the final design of the project. Existing manholes were eliminated to reduce cost where they were no longer necessary. Dewatering was a known issue prior to construction; a method of treatment and conveyance was determined for the project.

Lotus Street Sewer Replacement, City of Oceanside. Project Manager. The project proposes various improvements to the existing Lotus Street sewer system including: removal of approximately 250 linear feet of 6-inch cast iron sewer line, and replacement with 8-inch PVC sewer line; construction of approximately 340 linear feet of new 8-inch PVC sewer line east; manhole rehabilitation/replacement in conjunction with the proposed new and replacement pipelines; abandonment of approximately 600 linear feet of existing sewer line and associated manholes, and construction of an approximately 50-linear foot extension of new 8-inch PVC sewer lateral line.

Well No. 9 Wellhead Facilities, City of Oceanside. Project Engineer for the design of well head facilities, consisting of a 200 HP (2,000 gpm, VFD) submersible well pump, layout of concrete pad with surge tank, piping, electrical equipment, connection to the City's existing Mission Basin Desalting Facility (400 linear feet of 16-inch PVC pipeline), and 700 linear feet of 18" RCP drain pipe. Project also included preparation of a DHS Drinking Water Source Assessment.

ARDURRA

EDUCATION

BS, Civil Engineering, California State University, Long Beach, 2004

REGISTRATION

Registered Professional Engineer CA No. 83157

CERTIFICATION

Qualified SWPPP Developer (QSD)
Qualified SWPPP Practitioner (QSP) #83157

AFFILIATIONS

Former Vice President of Technical Groups, Los Angeles Section of American Society of Civil Engineers (ASCE)

Former Chair, Vice Chair, Treasurer, Secretary of ASCE Coasts, Oceans, Ports and Rivers Institute

American Public Works Association (APWA) Scholarship Committee Member; Co-Chair of Membership Committee; and 2025 Board of Directors Officer

YEARS OF EXPERIENCE

21 years

LISETTE BICE, PE, QSD

DISCIPLINE LEADER – GENERAL CIVIL ENGINEERING

Lisette is a dedicated civil engineer highly skilled in all phases of public works engineering projects. Lisette's 21 years of expertise includes planning and design of streets, pedestrian paths (trails) and cyclist safety improvements, right-of-way engineering, grading, sewer, water, and storm drains, identifying seismic and geometric deficiencies, preparing erosion control plans, SWPPP and permitting. As project manager, Lisette has been responsible for the preparation of PS&E for a wide range of projects including street rehabilitation plans and drainage improvements for numerous cities throughout Orange and Los Angeles counties.

PROJECT EXPERIENCE

Golden Lantern Median Modifications at Serenity Lane, City of Laguna Niguel. Project Manager provided engineering and design services for the intersection of Golden Lantern and Serenity Lane. The proposed improvements included demolishing a portion of the existing median, modifying the medians, installing signing and striping, four new curb ramps, and coordination for the removal and relocation of existing streetlights.

Pedestrian Accessibility Improvements Design, City of Long Beach. Project Manager. Provided evaluation and design of curb ramps to support the Citywide Curb Ramp program. Ardurra staff managed the development of the City's Self Evaluation/Transition plans and is continuing that work with the citywide implementation for the placement and upgrade of all curb ramps at approximate 22,000 locations. The project includes ramp evaluation for ADA compliance, schematic and final design, and cost estimating. To date we have designed approximately 400 ramps.

I-210 Soundwalls, Supplemental Environmental Report (NBSSR) and PS&E Phase III, City of La Cañada Flintridge. Project Engineer for the design of three separate soundwalls along the I-210 freeway. The project included soundwall design along a hillside slope, several edge of travel ways, and over bridges. As part of this design, the project involved significant coordination with the City, Caltrans, and the design team.

Market Street Complete Streets, (LA River to Cherry Avenue), City of Long Beach. Project Manager. Provided engineering and design services for a Complete Street Project on Market Street between the LA River and the eastern City limit just east of Cherry Avenue, an approximately 1.9-mile stretch of the corridor. The project consists of complete street improvements including the removal of a drive lane to accommodate Class II bike lanes, intersection bulbouts, wayfinding signage, sidewalk widening, crosswalk and transit stop enhancements, construction/reconstruction of curb ramps for ADA compliance, sidewalk and driveway repair, reconstructing/ resurfacing roadway pavement, pedestrian lighting, signal modifications, landscaping and street trees, and storm drain improvements.

Cabot Road, Muirlands Boulevard, and Melinda Pavement Rehabilitation Project (CIP 837), City of Mission Viejo. Project Manager provided engineering and design services for approximately 3.3 miles of road rehabilitation. The majority of the streets were four-lane arterial highways with directional traffic separated by a center median. The rehabilitation consisted of coldmill and overlay, with some full depth reconstruction. In addition, the design included the

replacement of deficient curb, gutter, driveway, curb ramps and sidewalk based on a visual inspection. The design also included adjustment of utility covers, replacement of traffic signal loops and re-striping.

Superior Avenue and Hospital Road Rehabilitation Project, City of Newport Beach. Project Manager provided engineering and design services for approximately 1 mile of road rehabilitation. The rehabilitation consisted of coldmill and overlay, with some full depth reconstruction, landscape and irrigation and signing and striping. In addition, the design included the replacement of deficient curb, gutter, driveway, curb ramps and sidewalk based on a visual inspection.

Plaza del Amo at Western Mobility Enhancement, T-177, City of Torrance. Project Engineer. Prepared of construction documents for the roadway widening of Plaza del Amo from 223rd Street to Western Avenue to improve circulation and safety. Improvements included widening of the roadway on the north side, addressing roadway and stormwater deficiencies, restriping, curb and sidewalk and ADA compliant ramp upgrades. Processed Caltrans Encroachment Permit for modifications and improvements at Western.

Ball Road and Anaheim Boulevard Widening, City of Anaheim.* Project Engineer. Project included widening of the Anaheim Boulevard and Ball Road intersection, which is designated as a primary arterial on Orange County's Master Plan of Arterial Highways and the City's Circulation Element. The project scope included widening the north, south, and east legs of the intersection, as well as adding storm drain improvements, bicycle lanes, landscaped medians, infiltration basins to address water quality, and utility relocation coordination. In addition, offsite improvements had to be coordinated with each business owner and included the design of ADA-compliant ramps, ADA-compliant access to facilities, landscaping, retaining walls, and signage.

Storm Drain and Street Design Services, City of Santa Monica.* Project Manager. Project included street and storm drain improvements at three different intersections in the city of Santa Monica. Tasks included preparing agendas and summaries for project meetings, conducting right-of-way research, topographical surveying, conducting hydrology studies, providing design services necessary to complete construction drawings, performing a hydraulic analysis, preparing an engineer's estimate, preparing contract specifications, and processing necessary permits.

Berth 200 Rail Yard, Port of Los Angeles.* Project Engineer/Project Manager. Developed PS&E with a focus on site utilities design, including disposition and composite plans showing locations/relocation/protection of more than 154 existing utilities and substructures. Maintained a permit matrix and provided overall coordination for various permitting agency involvements. Responsible for the design of a re-water system, domestic water system, gas line to the fueling facility, sewer line to both buildings and a sewer pump station. Also took an active role in the construction of the project as the prime role for design services during construction. This included responding to submittals, RFIs, compiling addendum drawings and coordination with subconsultants.

Rosecrans Avenue Arterial Improvements, City of Gardena.* Assistant Project Manager for this Measure R-funded project along Rosecrans Avenue. Supervised and assisted with the roadway design plans, cost estimate, construction specifications as well as provided construction assistance in the form of RFI review, submittal approval, and design revisions.

North Spring Street Bridge Improvements and Viaduct Widening, City of Los Angeles.* Assistant Project Manager and Design Engineer. Project involved developing PS&E for the widening of the North Spring Street Bridge over the Los Angeles River and Metro rail line. This high-profile, $34 million project addressed seismic and geometric deficiencies, improved pedestrian and cyclist safety, and maintained the historic integrity of the bridge. The project scope included widening of the historic bridge, seismic retrofit, dual Class II bike lanes, construction of new sidewalks, a street closure, relocation of utilities, traffic signal modifications and new street lighting.

Garvey Avenue Grade Separation Drainage Improvement, City of El Monte.* Design Lead. Project involved improving drainage infrastructure to the Garvey Avenue underpass to alleviate massive flooding during rain events. The project involved upgrades to the existing drainage system, including installation of new catch basins, inlets, and storm drain pipes; improvements to the existing pump station diverting the stormwater to the storm drain system; and implementation of green infrastructure initiatives to retain, reuse, or infiltrate the collected stormwater runoff. Tasks included project management, stakeholder outreach, technical evaluations, right-of-way acquisition, preparing PS&E, and aiding with funding opportunities.

**Work performed prior to Ardurra*

ARDURRA

EDUCATION

Certificate Land Use and Environmental Planning, University of California, Irvine

BS, Environmental Policy, Analysis and Planning, University of California, Davis

CERTIFICATION

Certified Environmental Planner, AICP CEP #10728

Licensed Sales Agent, CalBRE #10984449

AFFILIATIONS

American Planning Association

Corona del Mar Business Improvement District

City of Aliso Viejo Advisory Planning Committee

YEARS OF EXPERIENCE

36 years

LORI TROTTIER, AICP CEP

DISCIPLINE LEADER – ENVIRONMENTAL

Lori has 36 years of experience in both public and private sectors. In Orange County, her experience as a primary author and CEQA/NEPA project manager includes EIRs for Modjeska Historic Park (unincorporated Orange County), Hutton Center and Orange County Arena (Santa Ana). She has authored and managed IS/MNDs for mixed-use redevelopment (Anaheim Platinum Triangle), roadway and intersection improvements for Culver Drive at Walnut Avenue (Irvine), realignment and extension of Ford Road/Culver Drive (Bonita Canyon Drive within the cities of Newport Beach and Irvine in cooperation with City of Costa Mesa).

Lori can quickly focus on key issues, understand client needs and develop cooperative relationships resulting in win-win outcomes. She is an expert in obtaining entitlements and regulatory permits (Use Permits, General Plan Amendments, Subdivisions, 404,401, 1602, fugitive dust emissions, grading, building and infrastructure improvements).

PROJECT EXPERIENCE

Preliminary Study for Sewer Facilities and Access Improvements at the Woods, Irvine Ranch Water District. Provided analysis and recommendations for maintaining the sewer main and manholes and reestablishing safe access and ongoing maintenance of IRWD facilities within Lake Forest I and II homeowner's associations.

CEQA Expanded Initial Study Culver Drive/Walnut Avenue Street Improvements, City of Irvine. Authored CEQA clearance report on street and intersection improvements within an established residential and commercial community. Project required extensive coordination with homeowners and commercial associations and Caltrans District 12. The environmental document was used in the project report to obtain state funds for roadway improvements.

EIR/EA for Ford Road Arterial and Bike Path Improvements Between Macarthur Boulevard and the Proposed San Joaquin Hills Transportation Corridor, Transportation Corridor Agencies, Cities of Newport Beach and Irvine. Authored CEQA clearance on entitlements for roadway realignment. The Ford Road Extension and Realignment project is itself mitigation for noise impacts and traffic loading onto streets anticipated from implementation of the Toll Road - Highway 73. Project required extensive coordination on historic preservation, cultural resources, between TCA and multiple cities.

Jeronimo Avenue and Bake Parkway IS/MND /Peer Review, Cities of Irvine and Lake Forest, and ICF International. Provided peer review and coordination for all phases of CEQA compliance.

California Commerce Center Supplemental Specific Plan EIR, City of Ontario. Primary author and CEQA Manager for the regionally significant build-out of the California Commerce Center. The project proposed 2-million-square-feet of warehouse space near the Ontario International Airport. Project issues included compatibility with SCAG's regional growth plan; health risk assessment from diesel emissions; long-term air quality and a fugitive dust emissions

control plan; access/circulation, traffic generation and compatibility with established at grade railroad operations; vapor intrusion of hazardous materials, and screening for jurisdictional waters and endangered species.

Olivenhain Trunk Sewer Improvements FEIR/EA and Regulatory Permits, City of Encinitas. Manager for Final EIR, EA, permits and construction compliance. Providing comprehensive design, environmental support for relocating approximately 2,800 LF of sewer from the wetland to existing roadway, and manhole rehabilitations within an ESA, floodplain and wetland. The project required Tier II NEPA analysis for water quality, re-vegetation and monitoring for temporary maintenance access within the floodplain and riparian corridor of Escondido Creek and in wetlands associated with San Elijo Lagoon. Environmental services include joint EIR/EA, Clean Water Act Section 404 permit, California Streambed Alteration Agreement, federal and state Endangered Species Act take authorization, and Coastal Development Permit, City of Encinitas Major Use Permit, San Diego County permits, Wetland Restoration Plan, and a NEPA Environmental Assessment for easement modification under the Natural Resource Conservation Service Agriculture Conservation Easement Program.

Anza Road Pipeline IS/MND and Construction Monitoring, Rancho California Water District. Key issues include air, noise, cultural/historic, biological, and paleontological resources. Jurisdictional delineation was provided to avoid impacts on jurisdictional waters. Focused survey for Crotch's bumble bee was conducted as part of an extensive response to CDFW comments. Construction monitoring for cultural, tribal, and biological resources was provided.

Carancho Pump Station IS/MND and AB 52 Compliance, Rancho California Water District. Key issues for the IS/MND were air, noise, cultural/historic, biological and paleontological resources. Coordinated AB52 Compliance for Rancho Water.

Sunnyvale Pump Station #1 NOE, Regulatory Permits and HMMP, City of Sunnyvale. Managed technical studies, 404, 401, 1602 clearance for a storm pump replacement. Regulatory permits required an approved plant palette, revegetation plan and 5-year restoration monitoring and reporting.

Tomlin Pipeline NOE and CEQA Plus Reports, Elsinore Valley Municipal Water District. CEQA NOE and CEQA Plus documentation for pipeline and maintenance access rehabilitation within the Western Riverside County MSHCP.

Oceanside Blvd. Pump Station and Pipeline IS/MND, City of Oceanside. Relocation and upsizing of pump station and potable water main. Key issues were location within an HCP and tribal consultation. Avoidance of impacts on natural and visual resources

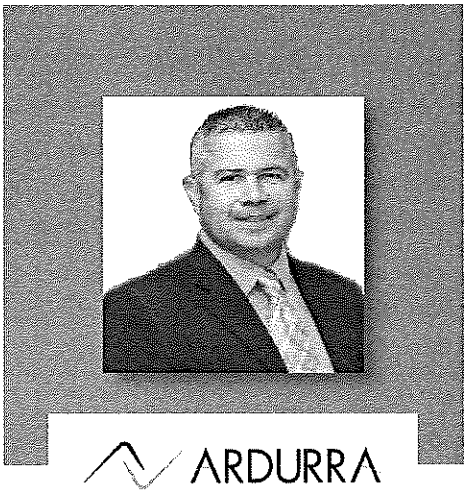
Perris at Pentecostal, City of Moreno Valley. Ardurra provided CEQA analysis and documentation for the development of 432 apartments with a pool and clubhouse in connection with the Alessandro Boulevard Implementation Project, implementing Southern California Association of Governments regional sustainability plan. The Project will support city goals to broaden the types of housing available in the City of Moreno Valley and includes housing within walking distance to existing and planned services and shopping. Ardurra produced an IS/MND for the City that provided a clear administrative record for the Planning Division's Notice of Determination and Findings of Fact. This included preparation of an MMRP. Project issues included tribal resources, recreation, water quality, traffic, and access.

The New Model Colony Master Plan, City of Ontario. Managed and authored project-level environmental analysis on expanded IS/MNDs for phased development under an existing Master Plan EIR. Project included single-family residences, parks, schools, and backbone infrastructure. Project issues included geology, flood control, infrastructure, and services.

General Plan and General Plan EIR, City of Aliso Viejo. Provided input as a Planning Advisor on the City's first General Plan and PEIR after City incorporation. Project issues included housing, traffic, historic preservation, and tribal resources.

Water Quality Management Plans, Orange County. Prepared numerous Water Quality Management Plans (WQMP) for grading permits on custom single-family homes located in Laguna Beach, Newport Beach, Huntington Harbour, and Irvine.

WQMP and Air Quality Emissions for Newport Coast Construction-Phase Erosion Control, Coastal Community Builders, Newport Beach. Obtained agency permits required for grading including applications and supporting documentation for Notice of Intent to Discharge (401) and Fugitive Dust Emissions Control Plans (Rule 403) for construction of Newport Coast. Project required coordination with the State and Regional Water Quality Control Boards, property owners, South Coast Air Quality Management District, and the EPA.



ARDURRA

EDUCATION

MBA, California State University, Long Beach, 2005

BS, Civil Engineering, California State Polytechnic University, Pomona, 1998

REGISTRATION

Registered Professional Engineer CA No. C68384

CERTIFICATION

Qualified SWPPP Developer and Practitioner, California Stormwater Quality Association No. 24024

AFFILIATIONS

ASCE, Los Angeles Section, former Vice President of Technical Groups

ASCE, Los Angeles Section - Coasts, Oceans, Ports, Rivers, Institute – Chair 2015-17; Vice-Chair – 2014-15; Treasurer – 2013-14; Secretary, 2012-13

YEARS OF EXPERIENCE

27 years

JOSE HERNANDEZ, PE, QSD/P

DISCIPLINE LEADER – WATER QUALITY

Jose Hernandez has 27 years of experience overseeing projects of varying size and complexity through design, permitting, and construction. Jose has managed the design of projects involving storm drain improvements, street rehabilitation, ADA improvements, concrete flatwork improvements, restriping, and designing for impacts to utilities. He is well-versed with design standards, techniques and analytical methods, bid specifications, and cost estimating. Jose's projects have won ASCE Project of the Year awards for Airports and Ports and for Urban and Land Development. Jose is also working within the City of Huntington Beach, which makes him familiar with City standards and procedures.

PROJECT EXPERIENCE

On-Call Civil Engineering Services, City of Huntington Beach. Jose has been providing engineering services for various public works infrastructure projects, including rehabilitation of roads, alleys, curb, gutter, and sidewalks within the public right-of-way, as well as off-street improvements, such as rehabilitation of City parking lots. Some recent projects include Street Signs and Red Curb Inventory, Catch Basin Half-Rounds, Goldenwest Medians, and Huntington Harbour Check Valves.

Lincoln Avenue Improvements, City of Anaheim. Project Manager for design services for this widening project, which will widen 3,000 feet of Lincoln Avenue from East Street to Evergreen Street. The project widens Lincoln Avenue from a four to six-lane divided street within the project limits. The scope included the removal of existing improvements, clearing and grubbing, excavation, placement of new AC pavement, construction of concrete curb and gutter, driveways, access ramps, sidewalks, bus pads, drainage system improvements, relocation of existing facilities, installation of a traffic signal at the intersection of Lincoln Avenue and La Plaza, traffic signal modifications, signing, striping, landscaping, and a Water Quality Management Plan (WQMP). Landscaped medians along Lincoln Avenue and along the project roadways includes drought-tolerant and low-maintenance plantings and trees. Project successes included streamlining traffic flow, increased drainage capacity, and an overall enhanced street appearance.

Katella Avenue Widening, City of Anaheim. Project manager for preparing PS&E for design services to widen the south side of Katella Avenue adjacent to the Anaheim Convention Center. This project included widening Katella; reconstructing a bus turnout; adding water quality structures; reconstructing offsite landscaping, irrigation, fixed bollards, retractable bollards, vehicular maintenance pathway, and decorative hardscape; and installation of two new electronic Changeable Message Signs (VMS/CMS) systems located in the median island. Significant coordination is involved with the various Anaheim departments, as well as with various utility companies and the Anaheim Convention Center. Additionally, provided construction support throughout the construction duration of the project.

Sultana Storm Drain and Street Improvements, City of Ontario. Project Manager for design services, including PS&E preparation for the Sultana storm drain and street improvements. Storm drain improvements included two miles of storm drain, laterals, and catch basins. Street improvements included curb and gutter, driveway, and curb ramp design. The project includes the hydrologic and hydraulic analysis of 240 acres of tributary area.

Jasmine Storm Drain Low-Flow Diversion Design, Capital Program Management, City of Laguna Beach. Project Manager overseeing the design of a low-flow system design for the Jasmine Street Storm Drain project. The project design includes diverting urban flows toward a trash collection system and a sewer diversion device. The recommended alignment accomplished the following: allowed for intercepting the upstream-most culvert that outlets onto private property; collects runoff on an interim basis from the adjacent drainage basin; and took advantage of the existing downstream culverts which outlet directly to the beach. The project included a hydrologic and hydraulic analysis of the Jasmine Drainage Basin as well as the adjacent easterly and westerly drainage basins. Pipe jacking was required across Coast Highway to minimize traffic disruptions and an Encroachment Permit was required from Caltrans. This project involved as MS4 Permit coordination. ***2022 APWA BEST Award-Winning Project***

Century Villages at Cabrillo – The Cove, Phase VI Development, Century Affordable Development, Inc., Long Beach. Project Manager. Provided civil engineering design services to accommodate the 90-unit multi-family development at the Century Villages at Cabrillo campus. The development included drainage, grading, utility, roadway, and water quality (LID) design for the Phase VI Development. Water quality features for the project included bioswales and biofiltration. The project also included developing a project SWPPP and providing QSP inspections throughout construction. The overall project involved the demolition of the existing structures, the realignment of the existing street (Williams Street), realignment of the existing utilities within the street that will conflict with the proposed building footprint, and the construction of a four-story residential building consisting of primarily studio units. The existing structures required hazardous material abatement that was performed by others.

Port of Long Beach Storm Water Management Plan & Storm Water Pollution Prevention Plan, Long Beach. Project Manager for the updating a terminal Storm Water Management Plan for Pier S, for the preparation a Storm Water Pollution Prevention Plan for Pier A West's crushing activities at the Port of Long Beach. This task also involved providing Storm Water Pollution Prevention Inspection training to Port inspectors on what to look for regarding BMP upkeep.

I-210 Soundwalls, Supplemental Environmental Report (NBSSR) and PS&E Phase III, City of La Cañada Flintridge. QC Manager for this project that involved developing construction plans, specifications, and estimates (PS&E) for soundwalls SW 311, SW 335, and SW 336 located along the I-210 freeway. The project has included sound wall design along a hillside slope, several edge of travel ways, and over bridges. As part of this design, the project has involved significant coordination with the City of La Canada Flintridge, Caltrans, and the design team. As part of the design, our team prepared a Storm Water Data Report for approval from Caltrans.

Lower Los Angeles River Channel Restoration and Access Project, City of Paramount. Project Manager. This project includes preliminary design for concrete channel enhancements for a 0.6-mile reach of the Lower Los Angeles River, next to Ralph C. Dills Park in the City of Paramount. The focus of the project includes enhancing the channel for wildlife habitat and connectivity, a new multi-use river trail along the low-flow channel with access from the adjacent Los Angeles River bikeway, and other design elements such as overlooks and connections to nearby Dominguez High School.

Community Development Review of the Indio Supportive Housing Project, Century Affordable Development, Inc., Indio. Project Manager for providing preliminary civil engineering services associated with the delivery of the Indio Supportive Housing Project. The project consists of a development with approximately 200 to 230 DU on approximately 9.2 acres. The proposed development will require utility services for sewer, water, electricity, gas, communication, and data. The project will also require storm water management facilities to ensure the proposed development is protected from future runoff as well as water quality design to mitigate stormwater.

McGaw Development, Irvine. Project Manager for a 7 storm multi-family development in the city of Irvine. The project consisted of site grading, drainage, and utility design as well as development of a WQMP.

ARDURRA

JAMIE FAGNANT, PE, QSD

DESIGN ENGINEER

Jamie has been working in the water and wastewater field for 23 years and has extensive experience and a specific expertise in sewer design and rehabilitation. Jamie has experience working with cities, water and sewer districts in Southern California and has a thorough understanding of industry standard design guidelines for the design and rehabilitation of sewers as well as a working knowledge of standard specifications and drawings for various agencies. She is very active in the engineering community and served on the board of the San Diego Chapter WateReuse Association for seven years in various positions.

EDUCATION

BS, Civil Engineering, San Diego State University, 2006

REGISTRATION

Registered Professional Engineer
CA No. C78967

CERTIFICATION

California Board of Professional Engineers, Land Surveyors and Geologists (CBPELSG)

Qualified SWPPP Developer (QSD) Certification #C78967

NASSCO Certification
Type: PACP | LACP | MACP
No. U-0221-70401117

AFFILIATIONS

American Society of Civil Engineers

Chi Epsilon, Civil Engineering Honor Society

WateReuse Association, San Diego Chapter, Director of Public Outreach

YEARS OF EXPERIENCE

23 years

PROJECT EXPERIENCE

Mead Valley Cajalco Sewer, Eastern Municipal Water District. Design Manager for the design of 2.3 miles of new 12", 10" and 8" PVC sewer. Project issues include hard rock, dewatering, sewer bypassing, construction phasing, traffic control on a heavily traveled arterial road, coordination with the County of Riverside including regarding identifying potential conflicts with a future drainage project, and coordination with Western Municipal Water District for this jointly owned sewer project.

2023 Master Plan, North of the River Sanitary District. Project Manager for a pump station assessment in support of the 2023 Master Plan. The pump station assessment covered five of the District's sewer lift stations and included a baseline feasibility for rerouting an existing sewer force main.

Carlsbad Palomar Waterlines, Carlsbad Municipal Water District. Project Engineer for the final design of 1,954 linear feet of 10" and 12" waterlines on the grounds of the Palomar McClelland Regional Airport and County of San Diego closed landfill site. The project created a new looped system while abandoning existing aged waterlines that were in close proximity to closed landfill areas. Project issues included coordinating with the airport and the County closed landfill division, locating of public and private utilities in a congested area including overseeing ground penetrating radar, and preparation of a community health and safety plan for the potholing of existing utilities.

Condition Assessment of the Land Outfall, Gravity Main and Force Main, City of Oceanside. Condition Assessment Project Manager. Working closely with a consultant firm, the project included condition assessment and related capital improvement projects for the City's 24" Land Outfall, 24" Gravity Line, and 42" Force Main. Selected condition assessment technologies include a variety of external and internal thickness testing tools.

Saxony Pump Station Rehabilitation, Leucadia Wastewater District. Project Engineer for the design of a pump station rehabilitation for a 40-hp, 870-gpm sewer lift station. Project included replacement of existing submersible pumps and motors with new submersible chopper pumps, replacement of valve vault valves and piping, replacement of PVC wet well lining, sewer bypassing, manhole lining, installation of new LED site lighting, power monitors, automatic transfer switch, uninterruptible power supply, emergency generator connection and miscellaneous pump station site repairs.

L1 West Side Sewer Force Main Replacement, Leucadia Wastewater District. Project Engineer for the design of 2,594 LF of 24" sewer force main replacement and associated appurtenances. Project included obtaining permits from multiple agencies including Caltrans, North County Transit District, and the City of Encinitas. Project included installation of flexible expansion joints on the existing ductile iron bridge crossing.

Olivenhain Trunk Sewer Improvements, City of Encinitas. Project Engineer. The project addressed existing maintenance issues, improved system reliability, and provided better protection for water quality and habitat values in Escondido Creek and San Elijo Lagoon. Specific objectives included rehabilitating 54 existing sewer manholes to reduce I&I, relocating 2,800 LF of the upper OTS out of the Escondido Creek floodplain and increasing its capacity to meet currently projected system needs, and providing environmentally appropriate access for maintenance vehicles along the remainder of the OTS. Project is currently in design.

Rock Springs Sewer, Vallecitos Water District. Project Engineer to prepare a planning and alignment alternatives study, followed by the design PS&E and preparation of environmental documents for CEQA compliance. The final project is comprised of 2,700 ft of 12"-15" gravity sewer alignment to replace an existing 8" sewer, cured-in-place pipe lining of 300 ft of 8" gravity sewer, new and rehabilitated manholes, improved access paths for sewer system operators, and improvements to the HOA greenbelt hardscape and landscaping.

Leucadia Scenic Cured-in-Place Pipe Lining, Leucadia Wastewater District. Project Engineer for the design of 2,018 LF of cured-in-place pipe lining in existing 12" gravity sewer. Project included obtaining Caltrans encroachment permit.

2018 Cured-in-Place Lining Project, Leucadia Wastewater District. Project Manager for the design of 7,900 linear feet of cured-in-place pipe lining, replacement of 55 linear feet of existing 8"VCP with new 8" PVC, and installation of a 15 cured-in-place manhole liners and two epoxy liners.

Leucadia Lift Station Rehabilitation, Leucadia Wastewater District. Project Engineer for the design of the rehabilitation of the Leucadia Sewer Lift Station. Project included replacement of three 150 horsepower pumps and installation of two 25 horsepower jockey pumps and associated inlet/outlet piping and valves, replacement of the surge tank piping, installation of a new liquid oxygen odor control system, and replacement of meter vault piping and new flow meter.

Village Park No. 5 Pump Station Replacement, Leucadia Wastewater District. Project Engineer for pump station rehabilitation project consisting of a new submersible duplex station, valve vault, bypass connection, electrical upgrades, bypass pumping and sequence of construction specifications.

Batiquitos Pump Station Rehabilitation, Leucadia Wastewater District. Project engineer for the preliminary and final design of the rehabilitation of a 1000 hp sewer lift station. Project included pump and valve replacement, wet well lining, station bypassing, site piping, installation of emergency bypass vaults, modifications to the existing valve vault, re-roofing, modification of the HVAC system and other miscellaneous repairs.

Paseo Vivora Pipeline Replacement, Eastern Municipal Water District. Project Engineer for the design of 2,180 linear feet of 12" fusible PVC water main. Project design included multiple connections to existing facilities and associated valve packages, installation of new water services and appurtenances, and abandonment by removal of approximately 1,600 linear feet of existing overland steel pipe. Ardurra assisted the District in preliminary design to determine the most effective pipeline alignment taking into consideration easement acquisition, ease of access, and current location of EMWD facilities.

South Oceanside Waterline Replacement & Sewer Upsizing, City of Oceanside. Project Engineer for the design of 7,400 LF of replacement water distribution main and 2,771 LF of sewer upsizing to 8-inch, with 4 manhole rehabilitations and 8 manhole replacements, within residential areas of south Oceanside. The project encompassed evaluation of replace in place versus parallel alignments as well as re-routing of several existing water services to eliminate a problematic alley main.

ARDURRA

RICK KENNEDY, PE

DESIGN ENGINEER/MECHANICAL

In his 50 years of experience, Rick has managed the design of more than 15 new and retrofit pump station projects ranging in size from 400-gpm to over 400-MGD, with various types of pumps and drive configurations. He has managed the design of new and retrofit water treatment plant projects. He specializes in mechanical process equipment of all types, piping, and valves. He prides himself in working closely with his clients, and ensuring the design team understands the critical issues of the project. He is dedicated to delivering detailed and quality bid packages. He effectively manages project budgets, schedules, and risks and continually finds ways to minimize construction and operational costs.

EDUCATION

BS, Mechanical Engineering, California Polytechnic State University, San Luis Obispo, 1975

REGISTRATION

Registered Professional Engineer
CA No. M18710

AFFILIATIONS

American Water Works Association

California Water Pollution Control Association

Water Environment Federation

YEARS OF EXPERIENCE

50 years

PROJECT EXPERIENCE

New Well Head Design for Well No.4, City of Huntington Beach. Project Manager for providing final design plans, specifications, and cost estimate for upgrading Well 4 including a new well head, new electric VFD pump motor, with VFD Starter, de-sander equipment, a new building to accommodate the new equipment, replace above and below ground discharge piping leading to the Peck Reservoir, new control valve (Cla-Val or equivalent) to maintain well pump back-pressure and reduce pressure to Peck Reservoir, and piping connections for termination of on-site generated (OSG) chlorine and liquid fluoride injection tubing provided under the OSG project for Wells 4, 7 and 13.

Well No. 9 Activated Carbon Media Replacement, H2S Removal, City of Huntington Beach. Project Manager for developing a catalytic activated carbon media replacement specification for six on-site H2S treatment trains at the Well 9 facility. The existing media had been in place for 7 to 8 years, and was declining in effectiveness. The new specification allowed for both coal-based and coconut-based media, and included removal of the spent media, installation of the new. Management of the project included oversite and inspection of the installation.

Groundwater On-Site Chlorine Generation and Fluoride Saturation Systems, City of Huntington Beach. Project Manager for provided preliminary design and final design services for the removal of existing gaseous chlorine and liquid fluoride systems, and design of all new sodium hypochlorite generation systems and sodium fluoride saturation systems for three separate wells averaging 7,600 gpm each. Split faced CMU buildings were provided to house the new generating facilities. The on-site chlorine generation systems featured pneumatic sodium chloride salt conveyance, water softeners, chlorine generating equipment, three-days of liquid sodium hypochlorite storage, and included metering pumps and automated controls for each well. Each fluoride system included storage of 40 lbs bags of NaF salt, water softening, packaged NaF saturator and included metering pumps and automated controls.

Mission Canyon II Booster Pump Station Post Road, Eastern Municipal Water District. Project Manager for the pre-design and final design of a the booster pump station, which included recommendations for property acquisition considering three alternatives, hydrology to determine flood plain elevation, preparation of a jurisdictional delineation of the navigable

waters of the US, geotechnical investigation, aerial topography and survey, architectural renderings, surge analysis, noise investigation, potholing, hydraulic distribution system modeling, two safety peruse meetings. Preparation of preliminary and final design which included demolition of the existing MCII pump station and 800 feet of 6-inch CML&C pipe, evaluation of pre-engineered pump station versus an build-in-place pump station with pre-negotiated pricing, pump selection which included two 200-gpm pumps and two 700 gpm pumps, 3,000 feet of 12-inch diameter suction and discharge pipe and 800 feet of 8-inch PVC pipe with all new metered service connections, new electrical service and SCE transformer, site lighting and cameras, electrified entrance gates, pump control based on level and pressure to accommodate an out-of-service reservoir, fiber optic cable, telemetry, and SCADA.

Rainbow Heights Pump Station, Rainbow Municipal Water District. Project Manager to evaluate the options of either renovating or replacing the existing pump station. The existing pump station included two natural gas engines driven and two electric driving vertical turbine pumps. Increasing maintenance costs, related Air Pollution Control Board permitting equipment compliance costs, the 40-years plus age of the gas driven pumps, and structural integrity issues with the building prompted the decision to replace the pump station. Effort included easement evaluation, preliminary design, and final design. The preliminary design evaluated the potential use of other sites, site layouts, hydraulics, pre-engineered pump station cost versus convention pump station building cost, type of check valves and isolation valves to be utilized to accommodate 400-psi pressure, and electrical generator selection. Final design included a unique pre-engineered pump station and building utilizing three 1000 gpm vertical turbine pumps, perfricated buried pump cans and suction header, meter installed on the suction side of the pumps station due to high discharge pressures, emergency generator, electrical coordination with SDG&E, new PLC and controls and design modifications to the District's SCADA and telemetry system. Contract specifications detailed the temporary pumping and electrical services necessary to facilitate operations during construction.

Post Road Hydropneumatic Booster Pump Station, Eastern Municipal Water District. Project Manager for the pre-design and final design of a temporary booster pump station, hydropneumatic tank, and associated suction and distribution pipeline to alleviate low pressure conditions in the westerly higher elevation areas of the Eastern Municipal Water District's Good Hope II (1832) Pressure Zone. Gathered information on the District's existing water facilities in the local pressure zone (1832) and surrounding area with new survey to: 1.) provide hydraulic distribution system modeling to define three alternative proposed 1910 pressure zones and pumping criteria (selecting one), 2.) evaluate two alignment alternatives (selecting one) based on advantages and disadvantages considering existing in-place utilities, public right-of-way, planned utilities, crossings; traffic; permits; cost; access, and community and environmental impacts, 3.) prepare a preliminary design report using existing aerial mapping information County, USGS, to develop the booster pumping station site to be located along an existing 40-foot-wide District easement west of Post Road, and evaluate two pre-engineered 300-gpm pump and hydropneumatic tank layouts, and 4.) provide final design documents.

Trask Reservoir Site Water Improvements, City of Garden Grove. Project Manager for construction of a new 9,000-gpm pumping station, utilizing two natural-gas-powered engine-driven 2,250-gpm three stage vertical turbine pumps (150-HP each), and a 600-gpm motor-driven four-stage vertical turbine pump (50-HP).

Trask Reservoir Site Water Improvement Project, City of Garden Grove. Project Manager for a new 13-mgd pumping station and 5-MG concrete reservoir.

Overland Trail Lift Station Rehabilitation, Fallbrook Public Utilities District. Project Manager for the rehabilitation of a high head (two pumps-in-series) wastewater lift station. The project includes a permanent diversion of the District's Anthony Corner's Lift Station flow to the Overland Trail Lift Station with a subsequent increase in pump capacity and overall footprint of the station. The electrical service will be increased due to larger pumps and the existing control building reconfigured for larger electrical gear. Other improvements include an increase in the size of the dry pit and a new cast-in-place top of the wet well. The flow from Anthony's Corner Lift Station will flow to an existing diversion box on Mission Road in Fallbrook. One 8-inch sewer, the Mission Oaks sewer, will be relocated to connect with Mission Road trunk sewer and the lift station demolished.

ARDURRA

EDUCATION
BS, Civil Engineering, San Diego State University, 1999

REGISTRATION
Registered Professional Engineer
CA No. C67536

AFFILIATIONS
Board of Governance, Self-Help Enterprises (2018-current)

Industry Advisory Board Member, Bakersfield College MESA Program (2016-current)

YEARS OF EXPERIENCE
26 years

DOLORES SALGADO, PE
DESIGN ENGINEER

Dolores has 26 years of experience in the planning and design of civil transportation and water and sewer projects. She manages Ardurra's central valley office located in Bakersfield. Her civil transportation experience includes light rail transit and bus rapid transit. Water and sewer experience includes water distribution and sewer collection facilities. Dolores is bilingual in English and Spanish and provides technical translation services to support public outreach services.

PROJECT EXPERIENCE

Ontario Ranch Phase 2 Water Main Improvements, Ontario Municipal Utilities Company/City of Ontario. Project Manager for approximately 1.5 miles of 30-inch-diameter cement mortar lined and coated, welded steel pipe (CML&C WSP), PZ 925, along Grove Avenue between Eucalyptus Avenue and Chino Avenue, design of an interim pressure reducing valve (PRV) station at the intersection of Grove Avenue and Chino Avenue to break pressure from the PZ 1010 to PZ 925, situated on the north side of Chino Avenue approximately 500 feet east of Grove Avenue, 1.6 miles of 18-inch-diameter CML&C WSP, PZ 1010, along Chino Avenue between Grove Avenue and the Chino Avenue Bridge (Cucamonga Creek).

San Antonio Avenue 30-inch-diameter Transmission Water Main, City of Ontario. Project Manager/Project Engineer. Design for 2,900 LF of new 30-inch CML&C WSP; abandonment of approximately 3,700 LF of existing 18-inch steel pipe.

Tomlin Pipeline Replacement, Elsinore Valley Municipal Water District. Project Manager for the design of the replacement/upsizing of 5,100 LF of an existing 6-inch-diameter pipeline. The District's 2016 Water Master Plan identified the need to upsize the pipeline to 8-inch-diameter to provide adequate fire supply to the 3544 pressure zone. Starting at the discharge side of the District's Tomlin 1 Pump Station on Lancashire Drive, the existing 6-inch-diameter discharge pipeline heads southwest for approximately 2,000 LF along El Cariso Trail to the Tomlin 1 Reservoir (1871 pressure zone). From here, the second segment heads southwest from the District's Tomlin 2 Pump Station discharge along El Cariso Trail for approximately 3,100 LF to the Tomlin 2 Reservoir (2313 pressure zone). The existing 6-inch-diameter water main is located within a 20-foot-wide utility easement owned by the District.

On-Call Development Reviews and Plan Checking Services, City of Shafter. Project Manager. Provides the City with review comments and recommendations to provide quality control and ensure projects comply with the City Standards, City Municipal Code and Ordinances, California Subdivision Map Act, Project Conditions of Approval, Tentative Subdivision Maps, Tentative Parcel Maps, City Master Plans, stormwater regulations, constructability, completeness, and sustainability for the benefit of future occupants. Reviews were conducted for parcel maps, final maps, grading plans, street improvement plans, sewer plans, drainage plans and studies and reports.

Mountain Avenue Gap Pipeline, Eastern Municipal Water District. Project Manager for the design of 1,800 LF of 18-inch-diameter potable water main along Mountain Avenue in the City of San Jacinto to close a gap between existing 18-inch potable water transmission mains at Oak Knoll Road and Old Mountain Avenue. The project team conducted a high-level

review of two alternative alignments. The preferred alignment was Mountain Avenue since it is the shortest alignment, has fewer potential utility crossings, and will keep the pipeline in established public right-of-way. The new water main will provide reliability and redundancy by looping the water system in the 1807 Upper Fruitvale Pressure Zone. The proposed pipeline material is CML&C WSP). The project included coordination with the City of San Jacinto to ensure their requirements for pavement repairs were incorporated into the project.

Downtown Sewer Replacement, Elsinore Valley Municipal Water District. Project Manager. Project includes evaluating the condition of approximately 7,700 LF of 6- and 8-inch-diameter sewer mains via CCTV, site inspections, input from operators and maintenance crews. The project is located in the downtown area of the City of Lake Elsinore. The project replaced and upsized approximately 4,000 LF of sewer mains, reconnected approximately 60 sewer laterals, replaced approximately 14 manholes, and repaired the streets with grind and overlay.

K Street Drainage Improvements, City of Brawley. Senior Project Engineer for approximately 1,500 LF of dual 24-inch storm drain pipelines and supporting storm drain features. The City authorized Ardurra to perform a planning level study to evaluate the existing conditions and provide a planning level project cost estimate to solve the drainage issue. In order to provide a long-term solution to the drainage issue, it was recommended to underground the entire storm drain system, approximately 1,500 feet. Following the planning level study, a hydrology analysis was performed to size the storm drain system. The analyses included calculating maximum overland flows for the 50-year and 100-year storm frequencies for the project using the Rational Method as described in the San Diego County Hydrology Manual. The new infrastructure needed to capture the 100-year storm concluding that dual 24-inch RCP pipes were required. Final design included designing approximately 1,500-feet of dual 24-inch RCP drainage pipes, catch basins, inlet boxes, grading, and miscellaneous site work. In addition, new right-of-way was required to accommodate the future extension of K Street, which required right-of-way acquisitions along approximately six private properties. The right-of-way acquisition services included preparing plat and legal documents, basis of appraisals, contacting private residents, and assisting the City during negotiations.

I-215 Segment 3, Water Main Relocations and Abandonment, City of San Bernardino Municipal Water Department. Project Engineer for final design of approximately 3,300 LF of new 16-inch ductile iron pipe waterlines, abandoning various 3- through 12-inch water mains, fire hydrants, water vaults, and other appurtenances as a result of Caltrans' Interstate 215 widening project. Project challenges included a 30-foot-deep bore and jack under the I-215 freeway, maintaining the existing water mains in service, congested utility corridors, locating tie-in locations, and identifying future Caltrans ROW and freeway improvements. Multi-agency coordination included Caltrans District 8, California Division of Occupational Safety and Health (CalOSHA) Mining and Tunneling Unit, Kinder Morgan, and Edison mandatory standby utility observation and inspection for an existing 12 and 24-inch steel high pressure gas lines along the new pipeline alignments.

Lift Station I and Eagle Crest Lift Station Sewer Force Main Alternative Analysis, City of Escondido. Project Engineer for the alternative analysis for 2 miles of 16-inch-diameter sewer force main. The study evaluated alternative alignments and determined the feasibility of installing two new force mains, one that would serve Lift Station 1 (LS 1) and the other from Eagle Crest Lift Station. The new sewer force mains will provide redundancy to the City's sewage system and provide the City with additional capacity to meet future needs. The analysis included preparing horizontal alignments, vertical profiles, and typical sections for two LS 1 Alternatives. Project issues include right-of-way constraints and coordination with an adjacent mall, conflicts with existing utilities, trenchless construction options, and environmental impacts.

Wellhead Equipping for Well No. 7, Casa de Fruta. Principal-in-Charge. Project included the preparation of design drawings and a technical report to equip a new water supply well and install a new 6-inch PVC pipeline to connect the well to the existing distribution system. The new water supply well will replace an existing well that was constructed in 1976 and to improve water quality and supply.

640 Potable Water Reservoirs, Otay Water District. Project Engineer for the final design of twin 10-MG partially buried prestressed concrete reservoirs at the District's Regulatory Site, which is the terminal storage for a major part of their service area. The project included a detailed alternative analysis to recommend the optimal reservoir configuration, type, and location. Other project elements include associated valve vaults, two pressure reducing stations, civil site improvements, over 14,000 LF of new pipelines, and demolition of an existing conventionally reinforced concrete tank (1.6 MG) and abandonment of associated piping. Project issues include steep topography, environmental impacts, public relations, locating tie-ins to existing utilities, and numerous conflicts with existing utilities.

ARDURRA

EDUCATION

BS, Mechanical Engineering, California State University, Long Beach, 2015

REGISTRATION

Registered Professional Engineer
CA No. C97003
AZ No. C82419

YEARS OF EXPERIENCE

10 years

CHRISTIAN MINERMAN, PE

DESIGN ENGINEER

Christian Minerman's design experience includes the design of hydraulic systems involving pumps, media filters, and backwashing systems. These systems typically required valve rangeability analysis, recirculation analysis, and automated controls to achieve optimization in terms of variability, operations, and cost. Research and reports have been an additional portion of Christian's experience, as well as the review and analysis of reservoir usefulness and capacity in terms of distribution system operation, site analysis and design feasibility for reservoirs. He has experience in construction support as a project engineer under a general contractor including the implementation of wastewater treatment plant upgrades for the City of Santa Barbara El Estero Wastewater Treatment Plant. These upgrades included expansion of the existing aeration system, chemical injection system, tertiary treatment system, and clarifiers.

PROJECT EXPERIENCE

Huntington Beach Wells 4, 7 & 13 Chlorine Generation & Fluoridation Facilities, City of Huntington Beach. Provided the City with a design for the conversion of three drinking water well sites from gaseous chlorine and fluorosilicic acid to on-site chlorine generation and sodium fluoride saturation respectively. A 100% level design was submitted in November of 2024. The design featured two CMU buildings housing the chemical facilities for the three wells providing the capability of producing 300 pound per day of chlorine in the form of 0.8% sodium hypochlorite and meet the City's fluoride needs. Mixing pumps, 3-day storage tanks for sodium fluoride, a pneumatic salt conveyance system, and chemical distribution piping, and electrical and I&C upgrades were additional features of the design. On this project I acted as the primary mechanical engineer while assuming some project management duties.

Huntington Beach Wells Chlorine Generation & Fluoridation Facilities (PDR), City of Huntington Beach. Provided the City with a plan for the conversion of 11 drinking water wells/ reservoir pump station sites from gaseous chlorine and fluorosilicic acid to on-site chlorine generation and sodium fluoride respectively. The report included analysis of the following major elements: existing site data and dimensions, manufacturer options, equipment sizing and operation, general layout of new systems, and expected costs and schedule for design and construction.

New Central Wheeler Tank, Sweetwater Authority. Provided the Authority with a finalized design for a new 0.8MG welded steel tank and site design based on Authority provided older 60% level drawings. Design elements included the welded steel tank, tank overflow, residual controls system to maintain chloramine concentration, site electrical, site civil design, and site access road. On this project I acted primarily as the mechanical engineer and provided project management support. Project is currently in the construction phase as of February 2025 and we are continuing to provide engineering support in this phase.

South San Joquin Irrigation District Surface Water Connection, City of Escalon. Design Manager and Primary Mechanical Engineer for current project in which the 30% submittal was submitted in late June 2023. Project is being designed to provide water from the South San Joaquin Irrigation District (SSJID) to the City of Escalon via a 3.5 mile 18" C900 pipeline. Along

the pipeline a flow control facilited to be operated by SSJID is being designed. At the end of the pipeline a booster pump station consisting of a 0.1 MG storage tank, 4 pumps configured to provide 250-1750gpm, an electrical building, and a emergency backup generator.

High Point Hydropneumatic Pump Station, California West Communities on behalf of Vallecitos Water District. Mechanical Project Engineer under the project manager for a current project in the construction phase. Responsible for the demolition and replacement of mechanical and electrical equipment within a pump station to be designed to provide the 1612 pressure zone with fire and residential flow requirements. Major items replaced included 4 pumps, and associated pipe, valves, electrical equipment, emergency backup generator. Pumps were selected and optimized to operate in conjunction with an existing hydropneumatic tank and compressor to provide the system with 0-2100gpm of flow drawn from an existing reservoir at grade with the pump station and housed within the same site.

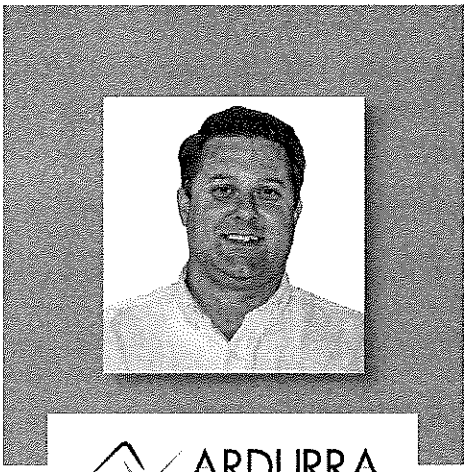
Mission Canyon II Pump Station, Eastern Municipal Water District. Mechanical Project Engineer under the project manager for a project in which the construction phase begun January 2025. Project is being designed to provide additional flow as needed for a small community in Hemet with a major focus on upgrading fire fighting capabilities and pump station hardening in the event of floods and fires. Project is composed of newly acquired land based on site analysis work, a site layout optimized based on environmental, hydrological, and geotechnical studies, a pre-fabricated pump station designed in conjunction with Engineered Fluid Incorporated (EFI), and upgrades to the existing distribution system including the replacement of approximately 1500ft of pipe.

R.A. Weese Filtration Plant Interconnect, Rainbow Municipal Water District. Assisted with design as an Engineer III under the project manager. Design for providing RMWD with the ability to draw between 0.8-3.5MGD of water from the RA Weese Filtration Plant as needed via approximately 200' of pipe and a new pump station. The pump station is composed of an overhead bridge crane, 2 pumps, an emergency backup generator and associated electrical equipment.

Poway Temporary Bypass System, City of Poway. Assisted with Temporary Bypass System configuration to facilitate concurrence with project stakeholders including DDW and to move project into design. Recommended and designed pump station, pressure control facility, overflow system, and associated permanent and temporary pipelines, and assisted in writing control strategies for operation of the system. Interpreted client desires and requirements for construction into feasible systems based on ease of use and cost while simultaneously interfacing with civil, electrical, and structural engineers to produce a quality final design.

La Jolla View Reservoir and Pipeline Replacement Project, City of San Diego. Engineer for evaluation of 1 MG reservoir, 3,000 ft of 30" welded steel pipe, and demolition of two outdated reservoirs and provided site, cost and hydraulic analysis for optimization of the project based on city provided hydraulic profiles and distribution system data. Project includes extensive habitat restoration and public outreach support due to the tank location in a scenic, hilltop park in coastal La Jolla area.

Santa Margarita Conjunctive Use Project Facilities, Fallbrook Public Utilities District. Engineer associated with the design of treatment facilities of the Santa Margarita River. The agreement included Camp Pendleton providing approximately 8 mgd of groundwater to FPUD, actual flowrates being dependent on the month of the year and rainfall of the previous year, that was high in iron, manganese, and TDS. The treatment train included 8 mgd of iron and manganese utilizing greensand media within six 12' diameter and 30' long pressure vessels. A side stream treated with RO membranes while the other water was sent to GAC vessels for the removal of PFAS and was remixed to create a product water to match the water quality of FPUD's imported water. The product water was pumped directly in the distribution systems. Distribution system improvements included two miles of 24-inch CML&C steel pipe, a remote 8 mgd pump station and 6 MG steel water storage tank. Project services included: 1.) distribution system modeling, 2.) establishment of water quality goals, 3.) evaluation of potential process treatment trains and configurations, 4.) preliminary design, 5.) final design, 6.) design service during construction phases, 7.) public outreach, and 8.) permitting assistance. Specifically, Christian assisted and performed submittal and RFI review for all associated mechanical equipment, control systems, and assisted in review of some civil and electrical RFI's. Additionally, he redesigned the Iron Manganese backwash systems and designed the PFAS filtration system which included a set of pumps, backwashing, controls, and specification design. Throughout the course of this project Christian has demonstrated an excellent ability to coordinate with all specialty subconsultants and subcontractors to achieve the highest quality design, submittal, specifications, and construction.



ARDURRA

EDUCATION
BS, Civil Engineering, California State University Sacramento, 1999

REGISTRATION
Registered Professional Engineer
CA No. C59724
NV No. 015317

CERTIFICATION
Cal OES Safety Assessment Program certified California Disaster Service Worker Volunteer (Civil Engineer - ASCE), ID #94166

HONORS & AWARDS
Engineering Excellence Award (ACEC), 2024

Theodore D. Judah Transportation Engineer Award, ASCE Sacramento, 2023

Excellence in Engineering (CELSOC), 2003

National Recognition Award (ACEC), 2003

YEARS OF EXPERIENCE
36 years

BRADLEY WALDROP, PE

STRUCTURAL

Bradley Waldrop has a 36-year-long distinguished career of technical and operational excellence serving the civil engineering, construction management, and public works industries. Bradley started his career in the development of new design and construction technologies to retrofit California's at-risk bridges after the Loma Prieta Earthquake. As his technical expertise expanded, he provided design leadership in long-span and signature structures such as the Interstate-40 Mississippi River Bridge, the North Viaduct of the Golden Gate Bridge, and the Benicia-Martinez Bridge. Bradley was part of a three-member team to invent a unique eccentrically braced frame system for steel buildings, now called Tru-Frame®. Today, Bradley focuses on delivering clever solutions to local public agencies' biggest civil engineering challenges as he continues to deliver award-winning projects.

PROJECT EXPERIENCE

Superior Avenue Pedestrian/Bicycle Bridge and Parking Lot, City of Newport Beach. Resident Engineer/Construction Manager. The City's goal on this $15.4 million project was to increase parking availability and improve safety and access for pedestrians and cyclists to Sunset Ridge Park. Improvements included a new pedestrian/bicycle bridge approximately 210 feet long and 12 feet wide overcrossing Superior Avenue; a new larger parking lot with 129 parking spaces; expansion of Sunset View Park (additional grass area); earthwork, grading, retaining walls, storm drain and lighting improvements; landscape and irrigation improvements; and amenities including a drop-off area, bicycle fix-it station, and a drinking water fountain. Services included daily inspections to ensure compliance with Greenbook and Caltrans standards, traffic control for both day and night operations, and effective coordination with the City's utilities team and Southern California Edison. Proactive communication strategy ensured the community stayed informed and engaged with the project's progress. Local and federal programs funded this project, which meant our team segregated project costs to ensure FHWA compliance. ***This project received the 2025 ACEC California Engineering Excellence Merit Award.***

Bridge and Structures Constructability On-Call Services, County of Riverside. Project Manager/Constructability Reviewer. Responsible for performing constructability reviews for bridges and structures. This role participates with the County from the initial stages of the design project to help the County realize significant savings and reduced construction risks. Our team used internally developed constructability review processes to efficiently identify the areas of highest risk and largest potentials for construction claims.

The Ranch Plan Planned Community, Orange County Public Works Department. Project Manager/Structural Plan Reviewer. Services included augmentation staff and the plan check team for the County of Orange, Planned Communities. Work included plan check services for all drainage, roadway, utility, and bridge improvement plans. The Ranch Plan Planned Community project site is in the southern portion of Orange County. This development is projected to have a total of 14,000 dwelling units along with approximately 17,000 acres of open space.

Eastern Transportation Corridor Design-Build, Transportation Corridor Agencies (Orange County). Bridge Designer. Participated as a member of the Silverado Constructors design-build team on this award-winning project. Performed advance planning studies for five bridge structures and one interchange. Also served as Bridge Designer for three bridge structures in the preparation of PS&E and participated in value engineering of one interchange. These highway structures included grade separations, a cut-and-cover tunnel, retaining walls, and soundwalls. All bridge structures on this project were designed to conform to TCA-specific service level earthquake and Caltrans seismic design criteria.

Carbon Canyon Booster Pump Stations No. 2 & 3, City of Brea. Project Manager/Lead Structural Engineer. Provided design and structural engineering for two concrete masonry buildings to house two rehabilitated pump stations. These designs included site improvements and new buildings to provide fire protection in Carbon Canyon. Wildfires in Carbon Canyon threatened the City's operations and firefighting capacity. To mitigate this risk, the City hired Ardurra staff to install new pumps, adjust piping confirmations, construct concrete masonry buildings, and install internal County Sherriff communication systems and cellular relays.

Sutter National Wildlife Refuge Lift Station, Ducks Unlimited/Myers & Sons Construction. Structural Engineer. Ardurra served as Engineer of Record, providing design this Design-Build project for a new surface water pump station, concrete distribution box, and 54" HDPE pipeline. The project includes demolition of existing pump station and concrete structures, new lift station structure consisting of a three level steel frame structure on steel piles with metal and concrete decking, four pumps fitted with fish screens with the capacity to deliver flows from 10 to 80 cubic feet per second (CFS), 12-inch to 54-inch steel discharge piping and header, flow meters, valves and appurtenances, approximately 700 feet long of 54 inch diameter buried HDPE conveyance pipeline to deliver water from the pump station to distribution structure; concrete distribution junction structure to control water to points of delivery; and extension of an above-ground power source from an existing line to the lift station.

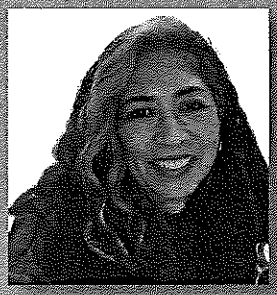
Anaheim Canyon Metrolink Pedestrian Improvements, City of Anaheim. Project Manager and Design Lead for preparation of the first phase, and work is in development for the second phase of a multi-phased project for the City. This project included public improvements to support economic development within the Canyons and involved parkway improvements, signalized intersections, and a "roadway diet" as a means of meeting the requirements for a $7-million Federal Economic Development Agency (Federal EDA) project. Instrumental in doubling the scope of this project for the City to be able to use all the federal money originally allocated in the City's grant.

Wardlow Road Rehabilitation, City of Long Beach. Project Manager. This project involved rehabilitation of Wardlow Road from Clark Avenue to Woodruff Avenue (approximately one mile). Wardlow Road is a 4-lane roadway with a raised median in the center portion of the roadway. The challenges for this project included a correction of cross slope throughout the length to limit the long-term degradation of pavement from ponding water in the interior lanes. This ponding was due to successive overlays that created a crown line that directed flow to the median without any drainage facilities. This work was accomplished by full depth reclamation, partial grind, and ARHM.

Club Center Drive Bridge over East Drain Canal, City of Sacramento. Independent Check Engineer/Resident Engineer/Structures Representative. This 120-foot structure is a standard reinforced concrete slab bridge over water. The piers are standard driven piles, and the channel is lined to prevent scour. Due to the vertical alignment restrictions for this structure, this project required a design exception from the Reclamation District 1000 for encroaching on the required minimum freeboard.

Highway 111 Beautification, City of Indian Wells. Project Manager/Community Outreach/ Structural Design Lead for the construction of soundwalls along the alignment of Highway 111 to mitigate road noise from the planned Highway 111 widening. This project included approximately two miles of new soundwalls within the public right-of-way through the city. The design of these walls included architectural treatments, coordination with adjacent homeowners' associations, and coordination with the City and Coachella Valley Area Governments.

East Bidwell/US50 Interchange, City of Rancho Cordova. Structural Inspector. Highway construction project that included the replacement of a highway bridge and associated civil improvements. Operations observed included asphaltic plug bridge deck joint replacement, electrical detailing for street lighting, and bullet item list project closeout operations.



ARDURRA

EDUCATION

Master in Business Administration, New York Institute of Technology, 2005

BS, Aerospace Engineering, University of Southern California, 1993

REGISTRATION

Registered Professional Engineer
CA No. 85395

CERTIFICATION

California Certified QSD/QSP
#26871

YEARS OF EXPERIENCE

26 years

LEA REIS, PE, QSD/P

WATER QUALITY

Lea Reis is a registered civil engineer with more than 25 years of experience in the public and private sectors, managing public and private projects for various cities throughout Southern California. Her career has given her valuable insight into the successful delivery of projects, from design through construction. Projects include disciplines such as roadway rehabilitation and traffic signals; water, sewer, and storm drain systems; buildings and facilities; and community parks. She is well-versed in ADA improvements and compliance, Caltrans and Greenbook standards and specifications, and constructability valuation. Her experience as Public Works Director has provided her with valuable knowledge in city street maintenance and operations, and engineering policies and procedures to deliver successful projects on schedule and within budget.

PROJECT EXPERIENCE

Edinger Street Sewer Improvement Project (OCTA Railroad to Beach Blvd.), City of Huntington Beach. Construction Manager. Project includes sewer upgrade, dewatering operations, sidewalk and median restoration, pavement grind and overlay, landscaping and signing/striping. Responsibilities include managing construction activities, performing project coordination with the City and surrounding businesses, responding to RFIs, reviewing submittals, processing change orders, tracking construction quantities, reviewing monthly progress payments, coordinating project changes requested by residents and approved by the City, managing construction schedules, providing public outreach to coordinate work impacting nearby residents and businesses, and responding to claims.

Carson Street Beautification Project (Norwalk Boulevard to Bloomfield Avenue), City of Hawaiian Gardens. Construction Manager. Project includes sidewalk, median, ADA ramp, and driveway concrete work, pavement grind and overlay, landscaping, street lighting and signing/striping. Responsibilities include managing construction activities, performing project coordination with the City and surrounding businesses, responding to RFIs, reviewing submittals, processing change orders, tracking construction quantities, reviewing monthly progress payments, coordinating project changes requested by residents and approved by the City, managing construction schedules, providing public outreach to coordinate work impacting nearby residents and businesses, and responding to claims.

Manhattan Beach Blvd. Resurfacing Project (Aviation Boulevard to Inglewood Avenue), City of Redondo Beach. Construction Manager. Project includes sidewalk, median, ADA ramp, and driveway concrete work, pavement grind and overlay, landscaping, and signing/striping. Responsibilities include managing construction activities, performing project coordination with the City and surrounding businesses, responding to RFIs, reviewing submittals, processing change orders, tracking construction quantities, reviewing monthly progress payments, coordinating project changes requested by residents and approved by the City, managing construction schedules, providing public outreach to coordinate work impacting nearby residents and businesses, and responding to claims.

North La Brea Avenue Street Improvement Project, City of Inglewood.* Construction Manager. Work included ADA curb ramp installation, sidewalk and driveway repairs, new irrigation and landscaping, construction of stormwater retention bio basins, pavement milling and overlay, and installation of signing, striping and markings. Responsibilities included design revision coordination between the City and design engineers, processing RFIs and change orders, and supervising construction inspectors.

Brookhurst Street Improvement from I-5 to SR-91, City of Anaheim.* Construction Manager. Work included a new bike lane, bioswales, pavement rehabilitation, sewer, water, and storm drain relocations, traffic signal upgrades, Caltrans soundwall, landscaping, and new street alignment with new sidewalks, curb and gutter, and bus stop pad. Managed construction activities, performed project coordination with the City and Caltrans, responded to RFIs, reviewed submittals, processed change orders, tracked construction quantities, reviewed monthly progress payments, coordinated project changes requested by residents and approved by the City, managed construction schedules, provided public outreach to coordinate work impacting nearby residents and businesses, responded to claims, and managed change orders from the City of Anaheim Water Department for the construction of waterline and abandonment of water services.

Director of Public Works/City Engineer, City of Lawndale.* Provided supervision and direction for the City of Lawndale Public Works Department. Managed a staff of 16 and oversaw the City's solid waste program, street sweeping program, Street Operations Division, Engineering Division, grant funding procurement and administration, bulky item pickup, graffiti abatement, weed abatement, landscaping, tree maintenance, sidewalk inspection/ramping and grinding program, and CIP projects such as the Citywide Bus Pad Improvement Project, FY 22/23 Street Rehabilitation Project, Civic Center Security Camera Upgrades, Park Parking Lot Rehabilitation, and more.

Capital Improvement Projects, City of Compton.* Acting City Engineer. As Senior Engineer acting in the capacity of City Engineer, assisted the Public Works Department in coordinating discussions and correspondences with the designers, construction managers, and project managers of ongoing capital improvement projects. These projects included, but were not limited to, the Wilmington Boulevard Rehabilitation Project, Compton Boulevard HSIP, Alondra Park Project, Artesia Great Boulevard Project for the City of Long Beach. With the new City Engineer in place, Lea continued to provide project updates and correspond with the stakeholders and managers of each project to help keep them on track.

ADA Annual Sidewalk and Ramp Construction Programs, City of Long Beach.* ADA Program Manager. The ADA annual sidewalk and ramp construction programs were developed as a result of the City's ADA Transition Plan. Projects included the annual sidewalk maintenance, annual curb ramp, and the Division Street ramp improvement program. These projects were completed with selected on-call contractors and required the review and advising of regular work orders to keep projects on track.

Valley Boulevard and Ramona Boulevard Intersection Improvement Project, City of El Monte.* Construction Manager. Work involved realignment of the street intersection, which included a relocated AT&T manhole, bus pad, Edison vault, new bioswales, city marquis, pavement rehabilitation, sidewalk, curb and gutter, and ramp improvements, traffic signal upgrades, lighting upgrades, new Edison service, sewer and water relocations, and striping. Managed construction activities, performed project coordination with the City and surrounding businesses, responded to RFIs, reviewed submittals, processed change orders, tracked construction quantities, reviewed monthly progress payments, coordinated project changes requested by residents and approved by the City, managed construction schedules, provided public outreach to coordinate work impacting nearby residents and businesses, and responded to claims.

Ramona Boulevard Resurfacing Project, City of El Monte.* Construction Manager. Work included new biofiltration systems, pavement rehabilitation, sidewalk, curb and gutter, and ramp improvements, new concrete intersection, lighting upgrades, sewer and water relocations, and striping. Managed construction activities, performed project coordination with the City and surrounding businesses, responded to RFIs, reviewed submittals, processed change orders, tracked construction quantities, reviewed monthly progress payments, coordinated project changes requested by residents and approved by the City, managed construction schedules, provided public outreach to coordinate work impacting nearby residents and businesses, and responded to claims.

**Work performed prior to Ardurra*

ARDURRA

EDUCATION

Master of Urban Planning,
San Jose State University

BA, Creative Arts, San Jose State University

YEARS OF EXPERIENCE

24 years

ALISON WINTER

GRANTS

Alison Winter is an experienced grant manager with a strong background in transportation. She has helped agencies secure millions of dollars in local, state, and federal funding. Knowledgeable of the grant life cycle, Alison can manage all aspects of grants, from the development of grant applications to post-award grant management. She has experience in transit, active transportation, air quality, parks and recreation, libraries, multi-modal transportation, climate resiliency, and emergency management grants. Alison is skilled in planning, grant writing, and stakeholder engagement and is a valuable asset to multi-disciplinary teams.

With civic leadership experience and exceptional organizational skills, Alison excels in coordinating complex multi-modal projects and collaborating with diverse teams. Her expertise in transportation planning involves evaluating conditions, identifying future needs, and laying the framework for the plans and funding to meet priorities. Notable achievements include pioneering a pilot zero-emission bus project, transportation planning for successful transit-oriented development, and advancing several multi-use trail projects. Alison understands how to write plans, policies, and public communications to achieve alignment with federal, state, and local regulations and goals. She has prepared numerous Federal Transit Administration (FTA) compliance policy documents, including grant management guidelines, procurement policies, a public transit agency safety plan, a Title VI program, and a Disadvantaged Business Enterprise (DBE) goal-setting methodology.

PROJECT EXPERIENCE

Grant Manager, Consultant.* Alison managed the development of grant proposals for submission to funding agencies. She evaluated funding opportunities and recommended grant strategies to align with funding needs. She interpreted federal, state, and local grant policies and procedures for clients. Alison managed grant-funded projects, administration of grants, and monitored grant awards to ensure compliance.

Alternative Transportation Analyst II, City of Roseville Public Works Department.* Alison led grant writing for regional, state, and federal transportation funding opportunities. She created and collaborated with interdisciplinary teams to carry out grant program objectives. Alison developed communications tailored to meet various audiences, including the public, businesses, city council, commissioners, and regional partners. She coordinated the citywide Transportation System Management (TSM) Program and the transit agency's Title VI program, safety plan, and capital purchases for grant compliance.

Administrative Analyst, City of Roseville Public Works Department.* Alison prepared and contributed successful grant applications for bikeway and transit projects and studies ranging from $100,000 to $6 M, including Federal Transit Administration (FTA) and regional air district funding for zero-emission buses (ZEBs) and California Active Transportation Program (ATP). She researched transportation-related data and best practices to develop grants and grant management policies. Alison prepared requests for proposals, served on consultant selection committees, and managed projects to implement grants and planning studies.

Vaca Valley Parkway/I-505 Multimodal Improvements Project, City of Vacaville. An Active Transportation Program (ATP) grant proposal. Managed the development of the state and regional grant applications to maximize funding potential and facilitated coordination with the funding agencies for submittal. Year Applied: 2024 | Request: $ 10,250,000

Safe Streets for Vacaville, City of Vacaville. A United States Department of Transportation (US DOT)/ Office of the Secretary of Transportation (OST) Safe Streets and Roads for All (SS4A) grant proposal. Coordinated with the client on the project scope to identify a project that aligns with the grant program, inclusive of both planning and capital construction activities. Managed development of the grant application, supporting documents, and exhibits. Year Applied: 2024 | Request: $ 11,020,000

Hanford's Urban and Community Forestry Project, City of Hanford. A CalFire Inflation Reduction Act (IRA) grant proposal. Guided the preparation of the grant application, including the development of the budget, coordination with multidisciplinary team members, and environmental review. Year Applied: 2024 | Request: $ 1,222,525

Fast Track Hanford, City of Hanford. A US DOT/FHWA Rebuilding American Infrastructure with Sustainability and Equity (RAISE) grant proposal. Led the development of the application for design and construction activities to make roadway and intersection safety improvements and enhancements, improve transit access, and transform an alley into a shared-use pathway for pedestrians and bicyclists. Year Applied: 2024 | Request: $ 15,500,000

Lake Dalwigk Improvement Project, City of Vallejo.* A contract to manage the Caltrans grant for the Clean California Local Grant Program. Served as grant manager to ensure grant compliance, reporting, and processing of reimbursements for grant-funded park design, improvements, and collaboration in outreach events. Year Awarded: 2022 | Award Value: $4,767,980

Hanford Goes Green, City of Hanford.* A United States Department of Agriculture (USDA) 2023 Urban and Community Forestry Program grant. The scope of the successful application was to develop an inclusive urban forestry program to expand the city's tree canopy, bolster tree care, and provide training opportunities to the historically underserved community. Managed the development of a successful application through the coordination of meetings with city staff and consultants, grant research, data analysis, design preparation, writing, submission, and outreach to local, state, and federal agencies. Year Awarded: 2023 | Award Value: $1,000,000

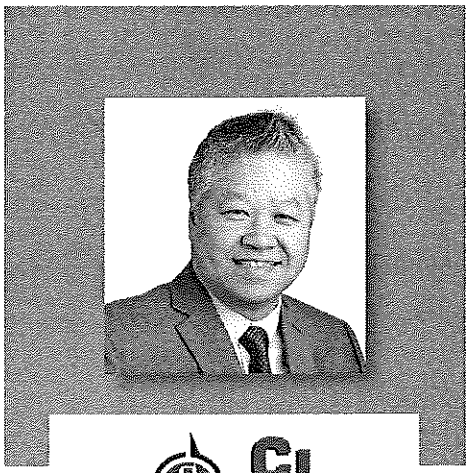
Hanford People's Bridge, City of Hanford.* A United States Department of Transportation (US DOT)/Federal Highway Administration (FHWA) Reconnecting Communities and Neighborhoods (RCN) grant. The scope was to build a bicycle and pedestrian overcrossing over State Route 198 to reconnect underserved communities in Hanford. Managed the development of research, data analysis, design, writing, preparation, and submission. This included managing the coordination of meetings with the city staff to develop the scope, and budget estimates. Year Applied: 2023 | Request: $13,706,000

North County Corridor (NCC)-Phase 1, Stanislaus County.* A US DOT/FHWA Rebuilding American Infrastructure with Sustainability and Equity (RAISE) proposal. Managed the development of highly competitive grant applications for the 2023 and 2024 cycles to construct phase 1 North County Corridor (NCC). While the RAISE 2023 application was not awarded, it was highly rated and scored high in eight out of eight merit categories. Year Applied 2024 | Request: $25,000,000

Airport Way and 6th Street Traffic Signal, City of Stockton.* A San Joaquin Council of Governments Congestion application for the Mitigation and Air Quality (CMAQ) Improvement Program/Carbon Reduction Program (CRP) grant. Managed the development of a successful grant application to reduce traffic congestion and improve air quality. Year Awarded: 2023 | Award Value: $ 1,321,000

North Sphere Regional Park Design, City of Palm Desert.* A Coachella Valley Mountains Conservancy proposal for the Climate Resilience and Community Access (CRCA) grant program. The scope of the project was to design a park that incorporated nature-based solutions, strategies for climate change, and inclusion of underserved communities. Managed the development, research, data analysis, design, preparation, and submission of a successful grant application. Also coordinated meetings with city staff, consultants, and area agencies. Year Awarded: 2023 | Award Value: $300,000

**Work performed prior to Ardurra*



CL SURVEY

LAM LE, PLS

CL SURVEYING & MAPPING

Lam has more than 30 years of experience as a project manager, project surveyor and CAD operator. His technical experience includes CAD drafting in Civil3D, creating DTMs for earthwork quantities, road profiling, creating coordinate geometry figures for boundary analysis, computer-aided design, and drafting. Lam's duties include project management and coordination along with field support on multiple projects. He has provided multiple legal descriptions for easements, lot line adjustments and property descriptions and has done extensive title analysis for property establishment and ALTA Surveys.

EDUCATION

Aerospace Engineering, California State Polytechnic University Pomona

REGISTRATION

Professional Land Surveyor
2007/PLS #8231

YEARS OF EXPERIENCE

30 years

PROJECT EXPERIENCE

Beach/Hamilton Avenue from Magnolia Street to East City Limit, City of Huntington Beach. CL Survey is currently performing a field topographic survey and centerline right-of-way mapping. This survey will document existing site topography and planimetrics where physical improvements are proposed such as landscaped medians and ADA ramps. The survey consisted of approximately 1 mile of topography and right-of-way mapping.

ATP Cycle 5 – Vine Avenue and B Street Bike Boulevard Project, Ontario. CL Survey was responsible for performing a field topographic survey and centerline right-of-way mapping. The survey documented existing site topography and planimetrics where physical improvements are proposed, such as curb extensions and ADA ramps. Storm drain manholes and catch basins along B Street east of Euclid Avenue were also dipped to get accurate invert elevations. The survey consisted of approximately 2 miles of topography and right-of-way mapping.

Caltrans District 7, 8, and 12 On-Call Survey Services, Los Angeles, Riverside/San Bernardino, and Orange Counties. Project Manager. Since 2014 CL Survey has served as a team member on these contracts to provide survey services on an as-needed basis for various Caltrans projects throughout Districts 7, 8 and 12. Lam is serving as a Project Manager performing professional and technical services required for conventional land surveying support services on an as-needed basis to support Caltrans in the development and construction of proposed Caltrans transportation facilities.

Annual Street Improvements, City of Long Beach. Project Manager. CL Survey has played an active role in the City's improvements since 2012. These services include the monument preservation of over a thousand monuments during the construction and overlay of asphalt, slurry seal projects, and replacement of curb and gutter throughout the streets. CL Survey also assisted in the actual construction of these improvements, working with multiple general contractors within the city, staking over 100 miles of curb ramps, curb and gutter throughout the city. The City of Long Beach Annual Street Improvement program provides for the improvement of deteriorating pavement and concrete curb and gutter throughout the city's residential streets, major arterial streets, airports and other public facilities.

Harbor Boulevard at Arbolita Drive Safety Improvements, City of La Habra. Project Surveyor. The project was located along Harbor Boulevard from approximately 300 feet north of the intersection of Harbor Boulevard with Arbolita Drive to the BCR at Brookdale Drive. Lam was responsible for performing field topographic surveys as well as supplemental design surveys. CL Survey also retraced the centerlines and rights-of-way along Harbor Boulevard from Arbolita Drive to Brookdale Avenue.

Palm Street Improvements, City of La Habra. Project Surveyor. The project was located on Palm Street from La Habra Boulevard to the north city limits. Lam was responsible for performing a field topographic survey as well as supplemental design surveys and right-of-way legal descriptions.

Firestone Boulevard Widening, Norwalk. Project Surveyor. The design is for the widening of three lanes in each direction from Hoxie Avenue to Imperial Highway, including an existing overpass of the Union Pacific Railroad line. Lam was responsible for performing a field topographic survey along with street cross-sections along with a base map of the adjacent properties.

Valencia Drive and Basque Area Reconstruction, Fullerton. Project Surveyor. This project consisted of street and sewer reconstruction on Valencia Drive and the Basque Area in the city of Fullerton. Lam was responsible for performing a field topographic survey of the project limits, including base mapping and monument preservation.

Caltrans District 8 On-Call Surveying Services, Riverside and San Bernardino County. Project Surveyor. CL Survey served on a survey team providing a wide range of design and construction survey support services directly through Caltrans. Design survey services included topographic surveys to assist in the design of future Caltrans construction projects. Construction survey services consisted of construction staking for a variety of Caltrans construction projects. During the extent of this contract, CL Survey performed work on the following highways and interstates: SR-79, SR-74, I-15, I-10, SR-18, SR-138, SR-38, SR-395, I-40, SR-58. This staking included Projected Plane of Paving (PPPs) and Storm Drain Staking.

CL SURVEY

ROBERT VASQUEZ, PLS

CL SURVEYING & MAPPING

Bob Vasquez's background is well-versed in all types of field and office survey functions. He has experience and knowledge in various rail, airport, highway, land development, flood control, water, and some unique projects. His project management experience includes managing and negotiating various size contract/task orders, public and private clients, using various standards and requirements. Bob is knowledgeable in the preparation of subdivision maps, survey maps, jurisdictional boundary changes, legal description documents and exhibits, right-of-way engineering, construction surveying, QC surveying, 3D laser scanning, topographic field, and boundary survey mapping.

EDUCATION

Certificate, Surveying and Mapping, Rancho Santiago College

Project and Business Management Coursework, University of California, Riverside

Management Leadership Academy, National University

REGISTRATION

Professional Land Surveyor
2007/PLS #7300

YEARS OF EXPERIENCE

30 years

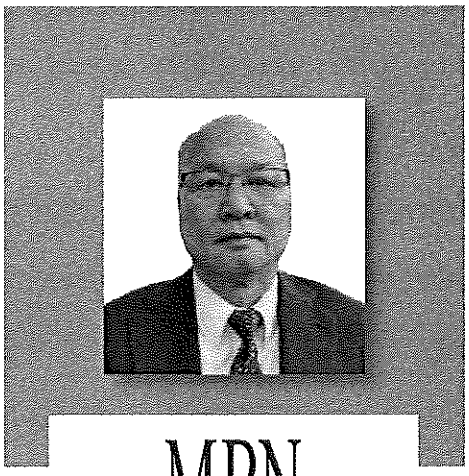
PROJECT EXPERIENCE

Cypress College Fine Arts Renovation Topographic Survey, Cypress. Project Manager to lead the survey group when asked by Cypress College to perform a topographic survey for its Fine Arts building renovation project. Vertical control was provided by the college and was established in 2016 by other consultants. Horizontal control used State Plan Coordinates. DEA field staff located spot elevations on paving and other hard surfaces. Existing surface features were located and included pavement, swales, gutters, striping, landscape features, fences, walls, light poles and above ground utilities. A topographic base map was prepared with these and other elements and provided to the client.

Kingsdale Homeless Shelter Improvements, Redondo Beach. Project Manager for this project to expand the existing pallet yard shelter to the new parcel dedicated to this effort. Services included a topographic survey of the existing and proposed sight along Kingsdale Avenue. A record base map was prepared and merged with the topographic survey which was provided to the design engineer in AutoCAD Civil 3D format.

City of Lakewood City Hall Drainage Improvements, Lakewood. Project Manager for this project to improve the drainage issues for the City's 13-acre compound and to update the 2 generators on the site. Services included the full topographic survey of the site including locating drain inlets, roof drain outlets, building locations, grade breaks, parking lot improvements and other critical features requested by the design engineer. An electronic CADD file was provided, along with a hard copy topographic map of the site.

On-Call Surveying Services, Orange County Public Works/Geomatics. Project Manager. This County of Orange contract to provide on-call land surveying services consisted of topographic surveying, control surveys, design surveys, field-to-finish mapping, boundary surveys, GPS surveying, 3D laser scanning, and special studies. A comprehensive 3D laser scanning task order was performed over 300 miles of streets in the unincorporated territory of the county. The data collected was to be used by county staff to extract street and road inventory for creation of a GIS platform and portal to be used by county maintenance staff.



MBN GROUP ARCHITECTS

MINH NGUYEN, AIA, LEED AP

MBN GROUP ARCHITECTS

Minh Nguyen has more than 35 years of experience providing architectural engineering services for the design of public facilities, including educational, local, state, and federal agencies. His experience encompasses design of wide range of projects – from water, wastewater, and recycled water infrastructure to car wash facilities, fuel pump stations, bachelor living quarters, and hotels. Minh understands local environments that is unique for each individual site/project.

EDUCATION
BA, Architecture, University of California Berkeley

REGISTRATION
Registered Architect
C24074 CA

CERTIFICATION
LEED AP

YEARS OF EXPERIENCE
35 years

PROJECT EXPERIENCE

IBWC South Bay IWTP, City of San Diego. PDB Architectural Review. Architectural QA/QC review for the South Bay IWTP facility that includes a multi-story Sludge dewatering building with mezzanine, new main electrical distribution building, a headworks/grit processing area, primary settling tanks, aeration basins and secondary settling tanks at four review cycles. Responsible for providing formalized review comments as deliverable for each cycle.

Miramar Clearwell Replacement Project, City of San Diego. This six-year, $91 million wastewater treatment project involves the design of a new operations and maintenance building, a guard shack at the entry, an electrical building, and a lift station. Each of the buildings will blend into the existing structures on site by utilizing a curved roof and smooth concrete facade. The guard shack will be visible from the street and will have an artistic curved exterior.

Lakeside Valve Station Replacement, City of San Diego. The existing valve station site was out of date and in a state of disrepair. The entire site was demolished for a new 7,650-square-foot valve station and 500-square-foot work area, with a construction value of $44 million. The architectural design was completed with the Community Planning Board and Historical Society's input. The buildings were designed to complement the architectural style of the Lakeside Historical District, as it is located on a busy section of town. The valve station includes daylighting and solar panels on the roof, along with various Green Building strategies to achieve a LEED Silver rating with the USGBC.

Pure Water - Phase 2, City of San Diego. Under a multi-year agreement, MBN Group is on a team providing City infrastructure in support of the Pure Water Program. Structures include operations, maintenance and pump station buildings, public tours facilities, equipment screening, and outreach trailers.

Vallecitos Water District Shops and Storage Building, San Marcos. Design includes a $3 million CMU building to house a meter shop, electrical shop and storage, landscape shop and storage, and construction storage facility. The meter shop is to include a meter test bench for the District to self-perform meter testing. The building site is constrained on three sides with existing structures. The design must also consider drainage issues, as existing site slopes into the new building footprint.

EXHIBIT "B"

Payment Schedule (Hourly Payment)

A. Hourly Rate

CONSULTANT'S fees for such services shall be based upon the following hourly rate and cost schedule:

SEE ATTACHED EXHIBIT B

B. Travel Charges for time during travel are not reimbursable.

C. Billing

1. All billing shall be done monthly in fifteen (15) minute increments and matched to an appropriate breakdown of the time that was taken to perform that work and who performed it.

2. Each month's bill should include a total to date. That total should provide, at a glance, the total fees and costs incurred to date for the project.

3. A copy of memoranda, letters, reports, calculations and other documentation prepared by CONSULTANT may be required to be submitted to CITY to demonstrate progress toward completion of tasks. In the event CITY rejects or has comments on any such product, CITY shall identify specific requirements for satisfactory completion.

4. CONSULTANT shall submit to CITY an invoice for each monthly payment due. Such invoice shall:

   A) Reference this Agreement;
   B) Describe the services performed;
   C) Show the total amount of the payment due;
   D) Include a certification by a principal member of CONSULTANT's firm that the work has been performed in accordance with the provisions of this Agreement; and
   E) For all payments include an estimate of the percentage of work completed.

   Upon submission of any such invoice, if CITY is satisfied that CONSULTANT is making satisfactory progress toward completion of tasks in accordance with this Agreement, CITY shall approve the invoice, in which event payment shall be made within thirty (30) days of receipt of the invoice by CITY. Such approval shall not be unreasonably withheld. If CITY does not approve an invoice, CITY shall notify CONSULTANT in writing of the reasons for non-approval and the schedule of performance set forth in **Exhibit "A"** may at the option of CITY be suspended until the parties agree that past performance by CONSULTANT is in, or has been brought into compliance, or until this Agreement has expired or is terminated as provided herein.

5. Any billings for extra work or additional services authorized in advance and in writing by CITY shall be invoiced separately to CITY. Such invoice shall contain all of the information required above, and in addition shall list the hours expended and hourly rate charged for such time. Such invoices shall be approved by CITY if the work performed is in accordance with the extra work or additional services requested, and if CITY is satisfied that the statement of hours worked and costs incurred is accurate. Such approval shall not be unreasonably withheld. Any dispute between the parties concerning payment of such an invoice shall be treated as separate and apart from the ongoing performance of the remainder of this Agreement.

ARDURRA

ARDURRA GROUP, INC. (CALIFORNIA)
Standard Billing Rate Schedule (July Fiscal Year 2025-26)
Rates Effective July 1, 2025 through June 30, 2026
(Future years subject to review for Consumer Price Index escalation or 3%, whichever is greater)

ENGINEERING, WATER, ENVIRONMENTAL, & TRAFFIC SERVICES

STAFF	HOURLY RATE
Principal/Project Manager VI	$352
Project Manager V	$344
QA/QC Manager	$308
Project Manager IV	$296
Project Manager III	$275
Project Manager II	$255
Project Manager I	$224
Project Engineer VI	$296
Project Engineer V	$235
Project Engineer IV	$224
Project Engineer III	$194
Project Engineer II	$168
Project Engineer I	$148
Project/CAD Designer VI	$204
Project/CAD Designer V	$194
Project/CAD Designer IV*	$179
Project/CAD Designer III*	$163
Project/CAD Designer II*	$158
Project/CAD Designer I*	$143
Administrative Assistant VI*	$133
Administrative Assistant V*	$122
Administrative Assistant IV*	$112
Administrative Assistant III*	$102
Administrative Assistant II*	$97
Administrative Assistant I*	$92
Senior Traffic Engineer	$276
Traffic Engineer III	$265
Traffic Engineer II	$223
Traffic Engineer I	$196
Traffic Engineering Associate II	$180

STAFF	HOURLY RATE
Traffic Engineering Associate I	$154
Traffic Engineering Technician III*	$159
Traffic Engineering Technician II*	$138
Traffic Engineering Technician I*	$111
Senior Grants Manager	$244
Grants Manager	$180
Senior Project Coordinator/Graphic Artist	$202
Project Coordinator/Graphic Artist	$154
Project Accountant	$146
Intern III*	$112
Intern II*	$102
Intern I*	$92
Senior Structural Engineer	$297
Structural Engineer	$233
SUE Technician*	$154
SWPPP Practitioner*	$186
Specialty Professional/Discipline	$297
Scientist VI	$224
Scientist V	$214
Scientist IV	$179
Scientist III	$168
Scientist II	$158
Scientist I	$138
Planner VI	$255
Planner V	$240
Planner IV	$224
Planner III	$184
Planner II	$153
Planner I	$133

(Continued on the following page)

ARDURRA

ARDURRA GROUP, INC. (CALIFORNIA)
Standard Billing Rate Schedule (July Fiscal Year 2025-26)
Rates Effective July 1, 2025 through June 30, 2026
(Future years subject to review for Consumer Price Index escalation or 3%, whichever is greater)

ENGINEERING, WATER, ENVIRONMENTAL, & TRAFFIC SERVICES

STAFF	HOURLY RATE
GIS Analyst*	$196
GIS Specialist*	$175
Graphic Designer*	$154
Drone Operator*	$196
Flow Monitoring Project/Data Manager	$212
Flow Monitoring Field Manager	$191
Flow Monitoring Field Supervisor*	$159
Flow Monitoring Field Technician III*	$133
Flow Monitoring Field Technician II*	$122
Flow Monitoring Field Technician I*	$101
Community Relations Strategic Advisor	$308
Community Relations Project Manager	$276
Community Relations Assistant Project Manager	$244

STAFF	HOURLY RATE
Community Relations Senior Account Coordinator	$180
Community Relations Account Coordinator	$154
Community Relations Specialist	$167
Community Relations Senior Graphic Artist	$202
Community Relations Graphic Artist	$170
Community Relations Account Assistant	$133
Field Representative III	$133
Field Representative II	$122
Field Representative I	$112

EXPERT WITNESS SERVICES	HOURLY RATE
Data Review and Preparation	$350
Testimony & Deposition	$531

NOTES AND ASSUMPTIONS

Engineering, Water, Environmental & Traffic Services Notes:

* Positions noted with an asterisk are subject to overtime rates billed at 1.5 times regular rates for all time over eight (8) hours in a single day or work performed on Saturday; and double time rates for work performed on Sundays and holidays.

Reimbursable Expenses (Other Direct Costs): Ordinary identifiable non-salary costs that are directly attributable to the project, such as regular commuter travel costs, standard equipment, tools and software, etc., are included in the fee estimated above. Extraordinary expenses, such as oversized and/or color reproduction costs, non-commuter project miles and/or other travel expenses to remote (over 50 miles one-way) sites, overnight postage/couriers, etc., are billed at actual cost plus fifteen percent (15%) to cover overhead and administration. Travel charges to remote sites will include the hourly billing rate plus travel expenses as listed in the Caltrans Travel Guide (State rates). Mileage is billed at the current IRS rate. Extraordinary charges above and beyond the estimated ODC allowance will not be billed to the Client unless specifically included in the contract or requested and approved by the Client in writing prior to incurring the additional expense.

Fees for Subconsultant Services: Billed at actual cost, plus fifteen percent (15%) to cover overhead and administration.

Web-Based Contract Administration: Selected/specified cloud-based service billed at cost plus fifteen percent (15%).

Escalation: Unless specified otherwise (such as for prevailing wage personnel), all billing rates are subject to annual review for Consumer Price Index escalation or 3%, whichever is greater.

Drone Photography: $250 per flight, plus labor.

Exclusions to Scope and Fee: The following items are specifically excluded:

- Legal advice
- Specialized software (other than MS Office Suite and MS Project)

CL SURVEYING & MAPPING

SURVEYING AND MAPPING SERVICES
FEE SCHEDULE

(This rate schedule is subject to a revision on October 1, 2025)

Office Staff:

Contract/ Survey Manager	$260
Project Surveyor	$220
Survey Analyst / Technician	$185
Admin / Clerical	$100

Note: Authorized overtime will be charged at 1.5 times the above rate.

Field Staff:

1 Person Field Crew *	$265
2 Person Field Crew *	$365
3 Person Field Crew *	$485

** CL Surveying and Mapping, Inc. is signatory to the International Union of Operating Engineers Local 12. Field surveyors are therefore paid prevailing wage rates for all work performed.*

Reimbursable Expenses:

1. *3D Laser Scanner equipment is not included in our overhead rate and will be invoiced at an additional separate daily rate.*
2. *All field staff are subject to prevailing wages.*
3. *Aerial Mapping costs by subconsultant will be invoiced as an ODC. A copy of invoices from the subconsultant will be submitted for reimbursement.*

400 E. Rincon Street, Ste 202
Corona, CA 92879

909.484.4200
www.CL-Survey.com

MBN GROUP ARCHITECTS

2025 Fee Schedule

Classification	Rate
Principal	$280.00
Project Manager/Project Architect	$197.00
Designer	$145.00
Technical Staff	$104.00
Intermediate Drafter	$93.00
Clerical Staff	$72.00

Note: Escalation rate is set at 3% per year