

PROFESSIONAL DESIGN SERVICES AGREEMENT

This PROFESSIONAL DESIGN SERVICES AGREEMENT (Agreement), to be effective this 1st day of July, 2024, is made and entered into by and between:

ORANGE COUNTY SANITATION DISTRICT
hereinafter referred to as "OC San"

AND

BLACK AND VEATCH CORPORATION
hereinafter referred to as "CONSULTANT"

individually referred to as the "Party" and collectively as the "Parties".

RECITALS

WHEREAS, in accordance with Ordinance No. OC SAN-61 and pursuant to a Request for Qualifications ("Underlying RFQ"), the Board of Directors of OC San, by action on May 22, 2024, approved the award of the Agreement for **CONTRACT NO. FE24-00-02**, to CONSULTANT to provide services for selected projects on a task order (Task Order) basis from July 1, 2024 to June 30, 2027; and

WHEREAS, consistent with the Underlying RFQ, the CONSULTANT has been prequalified to perform services for the following project types: Project Type 2: Linear and Collections and Project Type 3: Process, Electrical and Instrumentation & Control (I&C); and

WHEREAS, for Task Orders estimated to cost \$100,000 or less, the Director of Engineering, with concurrence of the Purchasing Manager, may solicit a proposal from one (1) firm on the prequalified list, which will include the project types for which the consultants are prequalified; and

WHEREAS, the CONSULTANT is qualified to provide and has agreed to provide the necessary professional engineering and related services under this Agreement; and

WHEREAS, by this Agreement, the Parties intend to set forth the general terms and conditions that will apply to any specific project for which CONSULTANT is given a Task Order by OC San.

NOW, THEREFORE, OC San and the CONSULTANT mutually agree as follows:

SECTION 1. SCOPE OF AGREEMENT

OC San, at its sole discretion, may, from time to time during the term of this Agreement, issue a Request for Task Order Proposal ("RFTOP") setting forth the detailed requirements and scope of work to be performed on the identified project and thereafter, upon receipt of a proposal from the CONSULTANT, may issue a Task Order to proceed with the work. The scope of work will be in a form attached hereto as Attachment "A" – Sample Scope of Work.

Upon execution by OC San, the Task Order shall become an operative part of this Agreement. Should any conflict or inconsistency exist in the contract documents identified in this section, the conflict or inconsistency shall be resolved by applying the provisions in the highest priority document, which shall be determined in the following order of priority:

1. Agreement and any amendments thereto
2. the Task Order
3. the RFTOP

SECTION 2. TASK ORDER ISSUANCE BY OC SAN

The Task Order issued by OC San shall, specifically or by reference to the RFTOP and corresponding proposal, set forth the terms that will apply to the specific project for which the services will be rendered. Those terms shall include, but not be limited to, scope of work, time for performance, and compensation.

SECTION 3. TERM

This Agreement shall commence on the effective date of this Agreement and terminate on June 30, 2027, unless further extended by written agreement signed by the Parties. Any work that is required by a Task Order and is not finished by the date of termination shall be continued and completed by the CONSULTANT and the terms and conditions of this Agreement shall continue in effect for that time. OC San may, at its option, renew this Agreement for two (2) additional terms of one (1) year each, for a maximum contract duration of five (5) years.

SECTION 4. COMPENSATION

The total compensation payable to the CONSULTANT pursuant to this Agreement shall not exceed One Million Dollars (\$1,000,000) per year in accordance with the terms described in SECTION 3 - TERM. The compensation includes, but is not limited to, fees for professional engineering services based on the CONSULTANT's burdened labor rates, overhead, and profit, and fees from the CONSULTANT's subconsultants/subcontractors (Subconsultants/Subcontractors). The specific amount of compensation payable to the CONSULTANT for services rendered on an individual project, pursuant to a Task Order, shall be established for each Task Order and shall not exceed Five Hundred Thousand Dollars (\$500,000) per individual Task Order unless authorized by OC San's Board of Directors. The CONSULTANT agrees and acknowledges that the execution of this Agreement does not in any way guarantee that a Task Order will be issued to the CONSULTANT. Moreover, execution of this Agreement shall not entitle the CONSULTANT to any form of payment or compensation from OC San without OC San first having issued a written Task Order.

A. Total Compensation

Total compensation for any Task Order shall not exceed the amount indicated in the approved Task Order and any approved amendments thereto.

B. Labor

As a portion of the total compensation to be paid to CONSULTANT, OC San shall pay to CONSULTANT a sum equal to the burdened salaries (salaries plus benefits) actually paid

by CONSULTANT charged on an hourly-rate basis to the project and paid to CONSULTANT's personnel. For each Task Order, the cost of benefits for CONSULTANT shall be based on the fringe rates identified in Attachment "E" – Rates Proposal. Upon request of OC San, CONSULTANT shall provide OC San with certified payroll records of all employees' work that is charged to the project.

C. Overhead

As a portion of the total compensation to be paid to CONSULTANT, for each Task Order, OC San shall compensate CONSULTANT for overhead at the rates equal to the percentage of burdened labor as specified in Attachment "E" – Rates Proposal.

D. Profit

For each Task Order, profit shall be ten percent (10%) of burdened labor and overhead for all CONSULTANT fees and its Major Subconsultants (Architecture & Engineering [A&E] consulting services) whose fees for services are greater than or equal to \$100,000. Profit shall remain fixed through the term of this Agreement, inclusive of any renewals identified in Section 3 – TERM.

As a portion of the total compensation to be paid to CONSULTANT and its Major Subconsultants, OC San shall pay profit for all services rendered by CONSULTANT and its Major Subconsultants for the Task Order as specified in the previous paragraph.

E. Subconsultants

For each Task Order, any Minor Subconsultant (A&E consulting services) whose fees for services are less than \$100,000 and any Subconsultant/Subcontractor (non-A&E consulting services), CONSULTANT shall pay to Subconsultant/Subcontractor total compensation based on an established hourly rate schedule by personnel classification. The hourly rates shall cover burdened salary costs, overhead and profit. The compensation for each Minor Subconsultants and Subconsultants/Subcontractors (non-A&E consulting services), including both labor related fees, and direct costs shall not exceed the amount, as negotiated prior to award of a Task Order.

For each Task Order, any Major Subconsultant (A&E consulting services) whose fees for services are greater than or equal to \$100,000, total compensation for labor will be based on burdened labor rates, overhead, and profit, as negotiated prior to award of Task Order. Prior to award of Task Order, the CONSULTANT shall provide to OC San, if available, an audit performed for another public agency which documents the Major Subconsultant's labor burden rate and overhead rate. This audit shall be the most current available and have been conducted for a period that ended within twelve months of the task order proposal due date. This information shall be provided by CONSULTANT within ten (10) business days from request by OC San.

F. Direct Costs

OC San shall reimburse CONSULTANT and its Subconsultants/Subcontractors the actual costs of permits and associated fees, travel, licenses, and other services in an amount not to exceed the sums set forth in each approved Task Order. OC San shall also pay to CONSULTANT actual costs for equipment rentals, leases or purchases with prior written

approval of OC San. Upon request, CONSULTANT shall provide to OC San receipts and other documentary records to support CONSULTANT's request for reimbursement of these amounts, refer to Attachment "D" – Allowable Direct Costs. All incidental expenses shall be included in the overhead cost pursuant to this SECTION 4 – COMPENSATION.

G. Other Direct Costs

OC San will reimburse the CONSULTANT for Other Direct Costs incurred by CONSULTANT and its Subconsultants/Subcontractors due to modifications in the scope of work resulting from field investigations and field work required by the Task Order. These items may include special equipment, test equipment and tooling, and other materials and services not previously identified. Refer to Attachment "D" – Allowable Direct Costs for payment information.

H. Reimbursable Direct Costs

OC San will reimburse the CONSULTANT for reasonable travel and business expenses as described in this section and further described in Attachment "D" – Allowable Direct Costs. The reimbursement of the above-mentioned expenses will be based on an "accountable plan" as considered by the Internal Revenue Service (IRS). The plan includes a combination of reimbursements based upon receipts and a "per diem" component approved by the IRS. The most recent schedule of the per diem rates utilized by OC San may be found on the U.S. General Services Administration website at <https://www.gsa.gov/travel/plan-book/per-diem-rates>.

The CONSULTANT shall be responsible for the most economical and practical means of management of reimbursable costs inclusive, but not limited to, travel, lodging, and meals arrangements. OC San shall apply the most economic and practical method of reimbursement which may include reimbursements based upon receipts and/or "per diem" as deemed the most practical.

CONSULTANT shall be responsible for returning to OC San any excess reimbursements after the reimbursement has been paid by OC San.

Travel and travel arrangements – Any travel involving airfare, overnight stays, or multiple day attendance must be approved by OC San in advance.

Local travel is considered travel by the CONSULTANT within OC San general geographical area which includes Orange, Los Angeles, Ventura, San Bernardino, Riverside, San Diego, Imperial, and Kern Counties. Automobile mileage is reimbursable if CONSULTANT is required to utilize a personal vehicle for local travel.

Lodging – Overnight stays will not be approved by OC San for local travel. However, under certain circumstances overnight stay may be allowed at the discretion of OC San based on reasonableness of meeting schedules and the amount of time required for travel by the CONSULTANT. Such determination will be made on a case-by-case basis and at the discretion of OC San.

Travel Meals – Per diem rates as approved by the IRS shall be utilized for travel meals reimbursements. Per diem rates shall be applied to meals that are appropriate for travel times. Receipts are not required for the approved meals.

Additional details related to the reimbursement of the allowable direct costs are provided in Attachment "D" – Allowable Direct Costs.

I. Limitation of Costs

If, at any time, CONSULTANT estimates the cost of performing the services described in CONSULTANT's proposal will exceed seventy-five percent (75%) of the not to exceed amount of the Task Order, including any approved additional compensation, CONSULTANT shall notify OC San immediately, in writing. The written notice shall indicate the additional amount necessary to complete the services. Any cost incurred in excess of the approved not to exceed amount, without the express written consent of OC San's authorized representative, shall be at CONSULTANT's own risk. This written notice shall be provided separately from, and in addition to, any notification requirements contained in the CONSULTANT's invoice and monthly progress report. Failure to notify OC San that the services cannot be completed within the authorized not to exceed amount of a Task Order is a material breach of this Agreement.

J. Method of Payment:

The CONSULTANT shall submit for approval by OC San, monthly invoices based on the total services which have been satisfactorily completed and specifying a percentage of completion. The CONSULTANT's billings shall be certified for payment by OC San only after OC San has determined that the CONSULTANT has completed each applicable project task.

CONSULTANT shall submit separate invoices for each Task Order on a monthly basis. OC SAN will pay approved invoices within thirty days of receipt and approval by OC SAN of the payment request. OC SAN will notify CONSULTANT within fifteen days following receipt of an invoice, if any corrections to the invoice are required from the CONSULTANT and if OC SAN does not approve all or part of an invoice.

CONSULTANT understands that submitted costs are subject to Section 11 - AUDIT PROVISIONS, below.

K. Task Order Completion

Upon satisfactory completion by CONSULTANT of the work called for under the terms of the Task Order and upon acceptance of such work by OC San, CONSULTANT will be paid the unpaid balance of any money due for such work.

Upon satisfactory completion of the work performed under each Task Order and prior to final payment under each Task Order for such work or prior settlement upon termination of this Agreement, and as a condition precedent thereto, CONSULTANT shall execute and deliver to OC San a release of all claims against OC San arising under or by virtue of this Agreement other than such claims, if any, as may be specifically exempted by CONSULTANT from the operation of the release in stated amounts to be set forth therein.

L. False Claims

Pursuant to the California False Claims Act (Government Code Sections 12650-12655), any CONSULTANT that knowingly submits a false claim to OC San for compensation under the terms of this Agreement may be held liable for treble damages and up to a Ten Thousand Dollars (\$10,000) civil penalty for each false claim submitted. This section shall also be binding on all Subconsultants/Subcontractors.

The CONSULTANT or its Subconsultants/Subcontractors shall be deemed to have submitted a false claim when the CONSULTANT or its Subconsultants/Subcontractors: (a) knowingly presents or causes to be presented to an officer or employee of OC San a false claim or request for payment or approval; (b) knowingly makes, uses, or causes to be made or used a false record or statement to get a false claim paid or approved by OC San; (c) conspires to defraud OC San by getting a false claim allowed or paid by OC San; (d) knowingly makes, uses, or causes to be made or used a false record or statement to conceal, avoid, or decrease an obligation to OC San; or (e) is a beneficiary of an inadvertent submission of a false claim to OC San and fails to disclose the false claim to OC San within a reasonable time after discovery of the false claim.

M. California Department of Industrial Relations (DIR) Registration and Record of Wages:

To the extent the CONSULTANT's employees and/or its Subconsultants/Subcontractors who will perform work during the design, preconstruction, and construction phases of a construction contract for which Prevailing Wage Determinations have been issued by the DIR and as more specifically defined under Labor Code Section 1720 et seq., CONSULTANT and its Subconsultants/Subcontractors shall comply with the registration requirements of Labor Code section 1725.5. Pursuant to Labor Code section 1771.4, the work is subject to compliance monitoring and enforcement by the DIR.

The CONSULTANT and its Subconsultants/Subcontractors shall maintain accurate payroll records and shall comply with all the provisions of Labor Code section 1776 and shall submit payroll records to the Labor Commissioner pursuant to Labor Code section 1771.4(a)(3). Penalties for non-compliance with the requirements of Labor Code section 1776 may be deducted from progress payments per Labor Code section 1776.

Pursuant to Labor Code section 1776, the CONSULTANT and its Subconsultants/Subcontractors shall furnish a copy of all certified payroll records to OC San and/or general public upon request, provided the public request is made through OC San, the Division of Apprenticeship Standards or the Division of Labor Standards Enforcement of the DIR.

The CONSULTANT and its Subconsultants/Subcontractors shall comply with the job site notices posting requirements established by the Labor Commissioner per Title 8, California Code of Regulations section 16461(e).

N. Record of Expenses:

The CONSULTANT shall keep complete and accurate records of all costs and expenses incidental to services covered by this Agreement. Such records will be made available to OC San upon request.

O. Reallocation of Total Compensation:

OC San, by its Director of Engineering, shall have the right to approve a reallocation of the incremental amounts constituting the total compensation payable under the Task Order, provided that the total compensation for the Task Order is not increased.

SECTION 5. LIMITATIONS UPON SUBCONTRACTING AND ASSIGNMENT

The CONSULTANT shall not contract with any other person or entity to perform the services required without the written approval of OC San. This Agreement may not be assigned voluntarily or by operation of law without the prior written approval of OC San. If the CONSULTANT is permitted to subcontract any part of this Agreement by OC San, the CONSULTANT shall be responsible to OC San for the acts and omissions of its Subconsultant/Subcontractor, as it is for persons directly employed by the CONSULTANT. Nothing contained in this Agreement shall create any contractual relationship between any Subconsultant/Subcontractor and OC San. All persons engaged in the work will be considered employees of the CONSULTANT. OC San will deal directly with and will make all payments to the CONSULTANT.

SECTION 6. CHANGES TO SCOPE OF WORK

In the event of a change in the scope of work as requested by OC San or any other changes to the Task Order, the Parties shall execute an amendment to the Task Order setting forth with particularity all new terms of the Task Order, including, but not limited to, any additional compensation.

SECTION 7. DOCUMENT OWNERSHIP – CONSULTANT PERFORMANCE

- A. All documents in all forms (electronic, paper, etc.), including, but not limited to, studies, sketches, drawings, computer printouts, disk files, and electronic copies prepared in connection with or related to the scope of work shall be the property of OC San. OC San's ownership of these documents includes use of, reproduction or reuse of, and all incidental rights, whether or not the work for which they were prepared has been performed. OC San's ownership entitlement arises upon payment or any partial payment for work performed and includes ownership of any and all work product completed prior to that payment. This section shall apply whether the CONSULTANT's services are satisfied by the completion of the Agreement or are terminated in accordance with other provisions of this Agreement. Notwithstanding any other provision of this section or Agreement, the CONSULTANT shall have the right to make copies of all such plans, studies, sketches, drawings, computer printouts and disk files, and specifications.
- B. CONSULTANT shall not be responsible for damage caused by subsequent changes to or uses of the deliverables where the subsequent changes or uses are not authorized or approved by CONSULTANT, provided that the service rendered by CONSULTANT was not a proximate cause of the damage.
- C. Copies of Work Product

Upon completion of the work required for each Task Order, the CONSULTANT shall deliver to OC San the number of copies specified in the specific Task Order scope of work of the final report containing the CONSULTANT's findings, conclusions,

recommendations, and all supporting documentation and/or final design drawings and specifications. Each Task Order will define the requirements for the deliverables.

SECTION 8. INSURANCE

A. General:

- i. Insurance shall be issued and underwritten by insurance companies acceptable to OC San.
- ii. Insurers must have an "A-" Policyholder's Rating, or better, and Financial Rating of at least Class VIII, or better, in accordance with the most current A.M. Best's Guide Rating. However, OC San will accept State Compensation Insurance Fund for the required policy of Worker's Compensation Insurance subject to OC San's option to require a change in insurer in the event the State Fund financial rating is decreased below "B". Further, OC San will require CONSULTANT to substitute any insurer whose rating drops below the levels herein specified. Said substitution shall occur within twenty (20) days of written notice to CONSULTANT by OC San or its agent.
- iii. Coverage shall be in effect prior to the commencement of any work under this Agreement.

B. General Liability:

The CONSULTANT shall maintain during the life of this Agreement, including the period of warranty, Commercial General Liability Insurance written on an occurrence basis providing the following minimum limits of liability coverage: Two Million Dollars (\$2,000,000) per occurrence with Four Million Dollars (\$4,000,000) aggregate. If aggregate limits apply separately to this Agreement (as evidenced by submission of ISO form CG 25 03 or CG 25 04), then the aggregate limit may be equivalent to the per occurrence limit. Said insurance shall include coverage for the following hazards: Premises-Operations, blanket contractual liability (for this Agreement), products liability/completed operations (including any product manufactured or assembled), broad form property damage, blanket contractual liability, independent contractors liability, personal and advertising injury, mobile equipment, and cross liability and severability of interest clauses. A statement on an insurance certificate will not be accepted in lieu of the actual additional insured endorsement(s). If requested by OC San and applicable, XCU coverage (Explosion, Collapse and Underground) and Riggers/On Hook Liability must be included in the General Liability policy and coverage must be reflected on the submitted Certificate of Insurance.

C. Umbrella Excess Liability:

The minimum limits of general liability and automobile liability insurance required, as set forth herein, shall be provided for through either a single policy of primary insurance or a combination of policies of primary and umbrella excess coverage. Umbrella excess liability coverage shall be issued with limits of liability which, when combined with the primary insurance, will equal the minimum limits for general liability and automobile liability.

D. Automobile/Vehicle Liability Insurance:

The CONSULTANT shall maintain a policy of automobile liability insurance on a comprehensive form covering all owned, non-owned, and hired automobiles, trucks, and other vehicles providing the following minimum limit of liability coverage: combined single limit of One Million Dollars (\$1,000,000). A statement on an insurance certificate will not be accepted in lieu of the actual additional insured endorsement.

E. Drone Liability Insurance:

If a drone will be used, drone liability insurance must be maintained by the CONSULTANT in the amount of One Million Dollars (\$1,000,000) in a form acceptable to OC San.

F. Worker's Compensation Insurance:

The CONSULTANT shall provide such Workers' Compensation Insurance as required by the Labor Code of the State of California in the amount of the statutory limit, including Employer's Liability Insurance with a minimum limit of One Million Dollars (\$1,000,000) per occurrence. Such Worker's Compensation Insurance shall be endorsed to provide for a waiver of subrogation in favor of OC San. A statement on an insurance certificate will not be accepted in lieu of the actual endorsements unless the insurance carrier is the State of California Insurance Fund and the identifier "SCIF" and applicable endorsements are referenced on the certificate of insurance. If an exposure to Jones Act liability may exist, the insurance required herein shall include coverage for Jones Act claims.

G. Errors and Omissions/Professional Liability:

The CONSULTANT shall maintain in full force and effect, throughout the term of this Agreement, standard industry form professional liability/errors and omissions insurance coverage with coverage limits of not less than Two Million Dollars (\$2,000,000) in accordance with the provisions of this paragraph. If the policy of insurance is written on a "claims made" basis and in the aggregate, said policy shall be continued in full force and effect at all times during the term of this Agreement and for a period of five (5) years from the date of the completion of the services hereunder.

In the event of termination of said policy during this period, the CONSULTANT shall obtain continuing insurance coverage for the prior acts or omissions of the CONSULTANT during the course of performing services under the terms of this Agreement. Said coverage shall be evidenced by either a new policy evidencing no gap in coverage or by separate extended "tail" coverage with the present or new carrier.

In the event the present policy of insurance is written on an "occurrence" basis, said policy shall be continued in full force and effect during the term of this Agreement or until completion of the services provided for in this Agreement, whichever is later. In the event of termination of said policy during this period, new coverage shall be obtained for the required period to insure for the prior acts or omissions of the CONSULTANT during the course of performing services under the terms of this Agreement.

The CONSULTANT shall provide to OC San a certificate of insurance in a form acceptable to OC San indicating the deductible or self-retention amounts and the expiration date of said policy and shall provide renewal certificates not less than ten (10) days prior to the expiration of each policy term.

H. Proof of Coverage:

The CONSULTANT shall furnish OC San with original certificates and amendatory endorsements effecting coverage. Said policies and endorsements shall conform to the requirements herein stated. All certificates and endorsements must be received and accepted by OC San before work commences. CONSULTANT shall provide OC SAN with copies of its insurance certificates and amendatory endorsements affecting coverage. Confidential information may be redacted from said policies, provided that verification of coverage, name of carriers and agent/broker may not be redacted. Said policies and endorsements shall conform to the requirements herein stated. The following are approved forms that must be submitted as proof of coverage:

- Certificate of Insurance ACORD Form 25 or other equivalent Certificate of Insurance form
- Additional Insurance (General Liability) The combination of (ISO Forms) CG 2010 and CG 2037

All other additional insured endorsements must be submitted for approval by OC San and OC San may reject alternatives that provide different or less coverage to OC San.
- Additional Insured (Auto Liability) Submit Endorsement provided by carrier for OC San's approval.
- Waiver of Subrogation Submit workers' compensation waiver of subrogation endorsement provided by carrier for OC San's approval.
- Cancellation Notice No endorsement is required. However, Vendor/Contractor is responsible for notifying OC San of any pending or actual insurance policy cancellation, as described in Article I. Cancellation and Policy Change Notice below.

I. Cancellation and Policy Change Notice:

The CONSULTANT is required to notify OC San in writing of any insurance cancellation notice it receives or other knowledge of pending or actual insurance policy cancellation, within two (2) working days of receipt of such notice or acquisition of such knowledge. Additionally, the CONSULTANT is required to notify OC San in writing of any change in the terms of insurance, including reduction in coverage or increase in deductible/SIR, within two (2) working days of receipt of such notice or knowledge of same.

Said notices shall be mailed to OC San at:

Orange County Sanitation District
10844 Ellis Avenue
Fountain Valley, CA 92708
Attention: Contracts, Purchasing & Materials Management Division

J. Primary Insurance:

All liability policies shall contain a Primary and Non-Contributory Clause. Any other insurance maintained by OC San shall be excess and not contributing with the insurance provided by the CONSULTANT.

K. Separation of Insured:

All liability policies shall contain a "Separation of Insureds" clause.

L. Non-Limiting (if applicable):

Nothing in this document shall be construed as limiting in any way, nor shall it limit the indemnification provision contained in this Agreement or the extent to which the CONSULTANT may be held responsible for payment of damages to persons or property.

M. Deductibles and Self-Insured Retentions:

Any deductible and/or self-insured retention must be declared to OC San on the Certificate of Insurance. All deductibles and/or self-insured retentions require acceptance by OC San. At the option of OC San, either: a) the insurer shall reduce or eliminate such deductible or self-insured retention as respects OC San or b) the CONSULTANT shall provide a financial guarantee satisfactory to OC San guaranteeing payment of losses and related investigations, claim administration, and defense expenses. OC SAN will not invoke the option expressed in this paragraph unless it has reasonable cause to question CONSULTANT's financial strength.

N. Defense Costs:

Liability policies shall have a provision that defense costs for all insureds and additional insureds are paid in addition to and do not deplete any policy limits.

O. Subconsultants/Subcontractors:

The CONSULTANT shall be responsible to establish insurance requirements for Subconsultants/Subcontractors hired by the CONSULTANT. The insurance shall be in amounts and types reasonably sufficient to deal with the risk of loss involving the Subconsultants'/Subcontractors' operations and work.

P. Limits Are Minimums:

If the CONSULTANT maintains higher limits than any minimums shown above, then OC San requires and shall be entitled to coverage for the higher limits maintained by the CONSULTANT.

SECTION 9. PROJECT TEAM AND SUBCONSULTANTS

CONSULTANT shall provide to OC San, prior to execution of a Task Order, the names and full descriptions of all Subconsultants/Subcontractors and CONSULTANT's project team members anticipated to be used in performing work under a Task Order. In its proposal, CONSULTANT shall include a description of the work and services to be performed by each Subconsultant/Subcontractor and each of CONSULTANT's project team members. CONSULTANT shall include the respective compensation amounts for CONSULTANT and each Subconsultant/Subcontractor broken down as indicated in Section 4 – COMPENSATION, above.

There shall be no substitution of the listed Subconsultants/Subcontractors and CONSULTANT's project team members without prior written approval by OC San.

SECTION 10. ENGINEERING REGISTRATION

The CONSULTANT's personnel and its Subconsultants/Subcontractors shall be comprised of registered engineers and a staff of specialists and draftsmen in each department. The firm itself is not a registered engineer but represents and agrees that when the performance of this Agreement requires the services of a registered engineer, such services hereunder will be performed under the direct supervision of registered engineers who are registered in the State of California.

SECTION 11. AUDIT PROVISIONS

- A. OC San retains the reasonable right to access, review, examine, and audit any and all books, records, documents, and any other evidence of procedures and practices that OC San determines are necessary to discover and verify that the CONSULTANT is in compliance with all the requirements under this Agreement. The CONSULTANT shall include OC San's right as described above in any and all of their subcontracts and shall ensure that these rights are binding upon all its Subconsultants/Subcontractors.
- B. OC San retains the right to examine CONSULTANT's books, records, documents, and any other evidence of procedures and practices that OC San determines are necessary to discover and verify all direct and indirect costs, of whatever nature, which are claimed to have been incurred, or anticipated to be incurred, or to ensure CONSULTANT's compliance with all the requirements under this Agreement during the term of this Agreement and for a period of three (3) years after expiration or earlier termination of the Agreement.
- C. The CONSULTANT shall maintain complete and accurate records in accordance with generally accepted industry standard practices and OC San's policy. The CONSULTANT shall make available to OC San for review and audit all project-related accounting records and documents and any other financial data within fifteen (15) days after receipt of notice from OC San. Upon OC San's request, the CONSULTANT shall

submit exact duplicates of originals of all requested records to OC San. If an audit is performed, the CONSULTANT shall ensure that a qualified employee of the CONSULTANT will be available to assist OC San's auditor in obtaining all project related accounting records and documents and any other financial data.

SECTION 12. LEGAL RELATIONSHIP BETWEEN PARTIES

The legal relationship between the Parties is that of an independent contractor and nothing herein shall be deemed to transform the CONSULTANT, its staff, independent contractors, or its Subconsultants/Subcontractors, into agents or employees of OC San and shall obtain no rights to any benefits which accrue to OC San's employees. CONSULTANT's staff performing services under the Agreement shall at all times be employees and/or independent contractors of the CONSULTANT. The CONSULTANT shall monitor and control its staff and wages, salaries, and other amounts due directly to its staff in connection with the Agreement. The CONSULTANT shall be responsible for hiring, review, and termination of its staff and shall be accountable for all reports and obligations respecting them, such as social security, income tax withholding, unemployment compensation, workers' compensation insurance, and similar matters.

SECTION 13. NOTICES

All notices hereunder and communications regarding the interpretation of the terms of this Agreement, or changes thereto, shall be effected by delivery of said notices in person or by depositing said notices in the U.S. mail, registered or certified mail, return receipt requested, postage prepaid.

Notice shall be mailed to OC San at:

Orange County Sanitation District
10844 Ellis Avenue
Fountain Valley, CA 92708
Attention: Ludwig Lopus, Principal Contracts Administrator
Copy: Daniel Berokoff, Engineering Supervisor

Notice shall be mailed to CONSULTANT at:

Black and Veatch Corporation
220 Commerce, Suite 200
Irvine, CA 92602
Attention: Matthew Thomas

All communication regarding the Task Order will be addressed to the Project Manager. Direction from other OC San staff must be approved in writing by OC San's Project Manager prior to action from the CONSULTANT.

SECTION 14. TERMINATION

OC San may terminate this Agreement at any time, without cause, upon giving thirty (30) days written notice to the CONSULTANT. In the event of such termination, the CONSULTANT shall be entitled to compensation for work performed on a prorated basis through and including the effective date of termination.

The CONSULTANT shall be permitted to terminate this Agreement upon thirty (30) days written notice only if the CONSULTANT is not compensated for billed amounts in accordance with the provisions of this Agreement when the same are due. Notice of termination shall be mailed to OC San at the address listed in Section 13 – NOTICES, above.

SECTION 15. COMPLIANCE

The CONSULTANT certifies by the execution of this Agreement that it pays employees not less than the minimum wage as defined by law and that it does not discriminate in its employment with regard to race, color, religion, sex, or national origin; that it is in compliance with all Federal, State, and local directives and executive orders regarding non-discrimination in employment; and that it agrees to demonstrate positively and aggressively the principle of equal opportunity in employment.

The CONSULTANT shall comply with all applicable laws, ordinances, codes, and regulations of Federal, State, and local government in all aspects related to this Agreement and any work completed for OC San.

SECTION 16. AGREEMENT EXECUTION AUTHORIZATION

Both OC San and the CONSULTANT do covenant that each individual executing this document by and on behalf of each Party is a person duly authorized to execute this Agreement for that Party.

SECTION 17. DISPUTE RESOLUTION

In the event of a dispute arising between the Parties regarding performance or interpretation of this Agreement, the dispute shall be resolved by binding arbitration under the auspices of the Judicial Arbitration and Mediation Service (“JAMS”), or similar organization or entity conducting alternate dispute resolution services.

SECTION 18. ATTORNEY’S FEES, COSTS, AND NECESSARY DISBURSEMENTS

If any action at law or inequity or if any proceeding in the form of an Alternative Dispute Resolution is necessary to enforce or interpret the terms of this Agreement, the prevailing Party shall be entitled to reasonable attorney’s fees, costs and necessary disbursements in addition to any other relief to which it may be entitled.

SECTION 19. WARRANTY

CONSULTANT shall perform its services in accordance with generally accepted industry and professional standards. If, within the 12-month period following completion of its services, OC San informs the CONSULTANT that any part of the services fails to meet those standards, the CONSULTANT shall, within the time prescribed by OC San, take all such actions as are necessary to correct or complete the noted deficiency(ies).

SECTION 20. INDEMNIFICATION

To the fullest extent permitted by law, the CONSULTANT shall indemnify, defend (at the CONSULTANT’s sole cost and expense and with legal counsel approved by OC San,

which approval shall not be unreasonably withheld), protect and hold harmless OC San and all of OC San's officers, directors, employees, consultants, and agents (collectively the "Indemnified Parties"), from and against any and all claims, damages, liabilities, causes of action, suits, arbitration awards, losses, judgments, fines, penalties, costs, and expenses (including, without limitation, attorneys' fees, disbursements and court costs, and all other professional, expert, or CONSULTANT's fees and costs, and OC San's general and administrative expenses) individually, a "Claim" and collectively, "Claims", which may arise from or are in any manner related, directly or indirectly, to any work performed or any operations, activities, or services provided by the CONSULTANT in carrying out its obligations under this Agreement to the extent of the negligent, recklessness, and/or willful misconduct of the CONSULTANT, its principals, officers, agents, employees, CONSULTANT's suppliers, Subconsultants, Subcontractors, and/or anyone employed directly or indirectly by any of them, regardless of any contributing negligence or strict liability of an Indemnified Party. Notwithstanding the foregoing, nothing herein shall be construed to require the CONSULTANT to indemnify the Indemnified Parties from any Claim arising solely from:

- (A) the active negligence or willful misconduct of the Indemnified Parties; or
- (B) a natural disaster or other act of God, such as an earthquake; or
- (C) the independent action of a third party who is neither one of the Indemnified Parties nor the CONSULTANT, nor its principal, officer, agent, employee, nor the CONSULTANT's supplier, Subconsultant, Subcontractor, nor anyone employed directly or indirectly by any of them.

Exceptions (A) through (B) above shall not apply, and the CONSULTANT shall, to the fullest extent permitted by law, indemnify the Indemnified Parties from Claims arising from more than one cause if any such cause taken alone would otherwise result in the obligation to indemnify hereunder.

The CONSULTANT's liability for indemnification hereunder is in addition to any liability the CONSULTANT may have to OC San for a breach by the CONSULTANT of any of the provisions of this Agreement. Under no circumstances shall the insurance requirements and limits set forth in this Agreement be construed to limit the CONSULTANT's indemnification obligation or other liability hereunder. The terms of this Agreement are contractual and the result of negotiation between the Parties. Accordingly, any rule of construction of contracts (including, without limitation, California Civil Code section 1654) that ambiguities are to be construed against the drafting Party shall not be employed in the interpretation of this Agreement.

SECTION 21. DUTY TO DEFEND

The duty to defend hereunder is wholly independent of and separate from the duty to indemnify and such duty to defend shall exist regardless of any ultimate liability of the CONSULTANT and shall be consistent with Civil Code section 2782.8. Such defense obligation shall arise immediately upon presentation of a Claim by any person if, without regard to the merit of the Claim, such Claim could potentially result in an obligation to indemnify one or more Indemnified Parties and upon written notice of such Claim being provided to the CONSULTANT. Payment to the CONSULTANT by any Indemnified Party or the payment or advance of defense costs by any Indemnified Party shall not be a condition precedent to enforcing such Indemnified Party's

rights to indemnification hereunder. In the event a final judgment, arbitration, award, order, settlement, or other final resolution expressly determines that the Claim did not arise out of, pertain to, or relate to the negligence, recklessness, or willful misconduct of the CONSULTANT, to any extent, then OC San will reimburse the CONSULTANT for the reasonable costs of defending the Indemnified Parties against such Claims.

The CONSULTANT's indemnification obligation hereunder shall survive the expiration or earlier termination of this Agreement until such time as action against the Indemnified Parties for such matter indemnified hereunder is fully and finally barred by the applicable statute of limitations.

SECTION 22. COMPLIANCE WITH OC SAN POLICIES AND PROCEDURES

The CONSULTANT shall be required to comply with all OC San policies and procedures. OC San requires the CONSULTANT and its Subconsultants/Subcontractors to follow and ensure their employees follow all Federal, State, and local regulations as well as OC San's safety standards while working at OC San locations. If during the course of the contract it is discovered that OC San's safety standards do not comply with Federal, State, or local regulations, then the CONSULTANT is required to follow the most stringent regulatory requirement at no additional cost to OC San. The CONSULTANT and all of its employees and Subconsultants/Subcontractors shall adhere to all applicable Contractor Safety Standards attached hereto as Attachment "L".

SECTION 23. GOVERNING LAW

This Agreement shall be governed by and interpreted under the laws of the State of California and the Parties submit to jurisdiction in Orange County in the event any action is brought in connection with this Agreement or the performance thereof.

SECTION 24. TIME OF ESSENCE

Time is of the essence in the performance of this Agreement.

SECTION 25. CONFLICT OF INTEREST

The CONSULTANT covenants that it presently has no interest and shall not acquire any interest, direct or indirect, which would conflict in any manner or degree with the performance of the services contemplated by this Agreement. No person having such interest shall be employed by or associated with the CONSULTANT.

SECTION 26. ENTIRE AGREEMENT

This Agreement constitutes the entire understanding and agreement between the Parties and supersedes all previous negotiations between them pertaining to the subject matter hereof.

[THIS SECTION INTENTIONALLY LEFT BLANK]

IN WITNESS WHEREOF, this Agreement has been executed in the name of OC San and the CONSULTANT by their respective duly authorized officers, as of the date first written above.

BLACK AND VEATCH CORPORATION

By _____ Date _____

Printed Name & Title

ORANGE COUNTY SANITATION DISTRICT

By _____ Date _____
Chad P. Wanke
Board Chairman

By _____ Date _____
Kelly A. Lore
Clerk of the Board

By _____ Date _____
Ruth Zintzun
Finance & Procurement Manager

- Attachments:
- Attachment "A" Sample Scope of Work
 - Attachment "B" Not Used
 - Attachment "C" Not Used
 - Attachment "D" Allowable Direct Costs
 - Attachment "E" Rates Proposal
 - Attachment "F" Not Used
 - Attachment "G" Not Used
 - Attachment "H" Not Used
 - Attachment "I" Not Used
 - Attachment "J" Not Used
 - Attachment "K" Not Used
 - Attachment "L" Contractor Safety Standards
 - Attachment "M" Iran Contracting Act Verification

ATTACHMENT “A”

SAMPLE SCOPE OF WORK

ATTACHMENT "A"

SAMPLE SCOPE OF WORK DESCRIPTION

OC SAN staff will develop detailed scope of work to be included in each Request for Task Order Proposal (RFTOP). The RFTOP will require Consultants to base their proposals on the scope of work included in the RFTOP. The remainder of this document are the templates typically used for design projects. Notes to scope editor are shown, although they will be removed before a scope of work is included in a RFTOP. Yellow highlighted text indicates where project specific information or a hypothetical example is given.

Design Task Order

Attachment A - Scope of Work

1 PROJECT REQUIREMENTS

Provide professional design engineering services for the project described herein.

1.1 BACKGROUND

- A. The Secondary Clarifiers at Plant No. 1 were constructed under Project Nos. P1-16 (1973), P1-36-2 (1995), and P1-82 (2005). A buried ductile iron plant water line around the secondary clarifiers feeds the scum sprayers and hose bibs. Because the plant water chemical composition is so corrosive to ductile iron, many failures have occurred.

1.2 GENERAL PROJECT DESCRIPTION

- A. This project includes the replacement of approximately 1800 feet of existing 6-inch ductile iron buried plant water piping, valves, fittings, and connections.
- B. A location map is provided in **Figure 1**.

[insert location map]

Figure 1 - Project Location Map

1.3 PROJECT ELEMENTS

- A. **Element 1: Piping** – Replace the existing 1,800 feet of 6-inch buried ductile iron plant water piping with new 6-inch plant water piping.
- B. Assumptions for level of effort:
 - 1. 1,600 feet of piping shall be below grade and 200 feet shall be either above or below grade.
 - a. 1,600 feet of piping is located around the Secondary Clarifiers. Assume high-density polyethylene (HDPE) as the pipe material with appropriate dimension ratio value.
 - b. 200 feet of piping will re-route the existing plant water line on the northwest end of the Secondary Clarifiers. Recent projects disconnected the existing plant water line at various locations resulting in an incomplete loop. This piping will reconnect the lines to allow for a complete loop. See Exhibit 13.1 for photos and Exhibit 13.3 for proposed routing design.
 - (1) For above grade pipe material, assume cement-lined ductile iron or fiberglass-reinforced plastic.
 - 2. Follow existing alignment with new pipe. New alignments shall be kept as close to the existing alignment as feasible.
 - a. The Secondary Effluent Junction Box No. 4 (SEJB-4), located at the southwest corner of the Secondary Clarifiers, is congested with various utilities, such as plant water, secondary effluent, and reclaimed water lines, and associated valves. Follow the existing alignment in this important area.
 - b. Concrete encasement of HDPE, located on the west side of the Secondary Clarifiers on Fuentes Road, was installed under project P1-102 (2006). Assume potholing is necessary to survey the edge of the concrete and confirm the limits of the existing concrete encasement

do not interfere with this project. As much as possible, the new alignment shall avoid the concrete encasement.

1.4 PROJECT SCHEDULE

- A. **Table 1** lists major project deliverables along with Orange County Sanitation District’s (OC SAN) review and approval periods. CONSULTANT shall comply with the deadlines indicated in that table. OC SAN will consider an alternative CONSULTANT proposed schedule provided it is consistent with OC SAN resources, schedule constraints, and adds value. The negotiated durations will set the design baseline schedule.

Table 1 – Project Milestones and Deadlines

MILESTONE	DEADLINE
Kickoff Meeting	The kickoff meeting will be scheduled to coincide with the Project Notice to Proceed (NTP).
Preliminary Design Memo (PDM)	[XX] workdays from Preliminary Design Phase NTP.
OC SAN Review of PDM	10 workdays from receipt of PDM.
Submit Design Submittal 3 (DS3)	[YY] workdays from approval of PDM.
OC SAN Review of DS3	15 workdays from receipt of DS3.
Submit Final Design Submittal (FDS)	15 workdays from receipt of OC SAN comments on DS3.
OC SAN Review of FDS	10 workdays from receipt of FDS.
Submit Final Technical Plans and Specifications (FTPS)	15 workdays from receipt of OC SAN comments on FDS.
Total	[ZZZ] workdays

1.5 PROJECT MANAGEMENT

- A. CONSULTANT shall be responsible for managing CONSULTANT’s project execution, schedule, budget, subconsultants, and coordination with other projects.
- B. Per **Exhibit 18**, PMWeb will be used for the management of this agreement.
- C. [Monthly Progress Report: Submit monthly progress reports at the same time as monthly invoices that include the following contents:
1. Work activities completed to date, in the current reporting period, and projected for the coming month.
 2. A brief description of outstanding issues and potential cost, schedule, quality impacts.
 3. Potential changes in the project scope or design scope.
 4. Any corrective actions needed to avoid potential impacts.
 5. Budget status: actual costs to date, costs to complete, and costs at completion.
 6. Schedule status: variances between scheduled and forecasted milestone dates.]
- D. Monthly Invoices: Provide a monthly cost report and/or invoices, which shall document the man-hours and billing rate for each person that works on the project, and shall include the following:
1. Budget
 2. Current billing period invoicing
 3. Previous billing period “total invoiced to date”
 4. Budget Amount Remaining
 5. Current billing period “total percent invoiced to date”

1.6 QUALITY CONTROL

- A. Provide Quality Assurance and Quality Control of the work.
- B. Provide documentation upon request that the CONSULTANT has performed a quality control review in-house, and all the comments have been addressed prior to providing any submittals to OC SAN.

1.7 PROJECT MEETINGS

- A. CONSULTANT shall communicate throughout the project to keep OC SAN apprised of the job, review work-in-progress, share information, discuss project submittals, present findings of technical analyses, receive and resolve comments, and obtain decisions and direction by OC SAN staff.
 - 1. **Table 2** below lists the anticipated meetings and site visits. Microsoft Teams shall be used for meetings. CONSULTANT will provide an agenda 2 workdays prior to each meeting. Meeting minutes will be submitted to the OC SAN project manager for review within 3 workdays of the meeting.

Table 2 – Project Assumed Meetings and Site Visits

DESIGN ACTIVITY	MEETINGS	SITE VISITS
Kickoff Meeting	1 (1-hour)	
PDM	Progress meeting (1-hour, every 2 weeks)	8 hours
PDM Workshop	2 (1-hour)	
DS3	Progress meeting (1-hour, every 2 weeks)	8 hours
DS3 Workshop	2 (1-hour)	
FDS	Progress meeting (1-hour, weekly)	
FDS Workshop	1 (1-hour)	
FTPS	Progress meeting (1-hour, weekly)	
Construction Services	6 hours	24 hours
Closeout	4 hours	12 hours

1.8 SUBMITTAL REVIEWS

- A. Deliverables (other than specifications) shall be submitted in searchable PDF format with no hard copy. Deliverables shall be bookmarked and hyperlinked for navigation per **Exhibit 14**.
- B. OC SAN has standardized on the use of Bluebeam Revu for reviewing and providing comments to PDF files. The purpose of the studio session is to provide review and collaboration. OC SAN staff will create the Bluebeam studio session, invite attendees, configure, and manage the studio session. Make drawing submittals in Bluebeam and respond to OC SAN comments in Bluebeam per **Exhibit 15**.

1.9 SPECIFICATIONS

- A. Prior to preparing or editing specifications, CONSULTANT shall meet with OC SAN staff to determine which OC SAN and CONSULTANT provided specifications should be included in the design. After discussions, all specifications should be loaded in Microsoft Teams (Teams) early in design and prior to editing for DS3.
- B. Tailor all specifications to project and remove requirements that do not apply.
- C. Unless a CONSULTANT is using their own specification management software, Specifications should remain in Teams for editing throughout design. Make all edits to specifications hosted in Teams. Unless agreed to, Specifications should not be removed from Teams or edited elsewhere.
- D. Provide specifications as Microsoft Word (Word) files with Track Changes enabled throughout design.

- E. OC SAN staff will review specifications during submittal review periods. CONSULTANT shall respond to OC SAN comments using Word “Reply” and “Resolve.” CONSULTANT shall “Reply” to each OC SAN comment describing how the comment will be addressed and revise the specification, as needed, to address the comment. “Resolve” will be used by the reviewer or designee to confirm their comment has been addressed. For more information see **Exhibit 16**.
- F. Prior to advertisement, all Word comments and revisions shall be Track Changes accepted, rejected, resolved, or deleted by OC SAN staff prior to bid.

2 PRELIMINARY DESIGN

All significant material and equipment decisions are to be made before the start of Design. At the end Preliminary Design, major design elements shall be fixed, and major equipment, footprints, and utility connection locations shall be well established. The extent of the design and the number and type of drawings shall also be established.

2.1 PRELIMINARY DESIGN AND PDM

- A. The PDM shall consist of a PowerPoint presentation. Present PDM findings and recommendations to OC SAN in a stakeholder meeting using the PowerPoint presentation mentioned in this section for consensus before the start of Design.
- B. Identify any equipment that has one competitive supplier (i.e., sole source). In those cases, recommend an appropriate procurement strategy compatible with California Law and OC SAN policies.
- C. Develop 2 conceptual design alternatives for the plant water piping alignment.
 - 1. Alternatives:
 - a. Reuse exiting alignment and existing points of connection
 - b. Alternate alignment along tunnels in and around secondary clarifiers
 - 2. Perform the following with each alternative:
 - a. Cost, benefit, and life cycle analysis.
 - b. Identify plant water construction shutdown requirements with estimated durations.
 - c. Identify construction access requirements and limitations.
 - d. Prepare preliminary drawings (sketches).
 - 3. Discuss the available alternatives with OC SAN. The PDM shall include the recommendation alternative.
- D. Prepare drawings showing:
 - 1. Proposed alignment of piping
 - 2. Proposed piping materials and quantities
 - 3. Proposed quantity and type of valves and valve cans
 - 4. Proposed connection points which include the following:
 - a. New replacement pipes connecting to existing main plant water line
 - b. New replacement pipes connecting to new valves
 - c. New replacement pipes connecting to hose bibs
 - 5. Demolition of existing ductile iron pipes and valves
 - 6. Proposed design of new valves and valve cans
 - 7. Proposed design of connection points
 - a. New replacement pipes connecting to existing main plant water lines

- b. New replacement pipes connecting to new valves
 - c. New replacement pipes connecting to hose bibs
- 8. Proposed design of pipe supports by typical detail and max spacing table
- E. Summarize key constructability and construction sequencing constraints.
 - 1. Develop process flow schematic of the components of the plant water system at Plant No. 1 that impact the pipelines being replaced.
- F. Prepare preliminary construction schedule.
- G. Prepare P&IDs: Fully detailed for each design "module", e.g., 1 pump set typical of all with proposed tagging strategy.
- H. Perform any potholing activities required for the concrete encasement survey specified under Element 1.
- I. Quantify soil contamination by determining the volume of excavation work needed to perform the Work. Coordinate with OC SAN ENGINEER to determine the area of excavation. Soil testing is not necessary.
- J. Develop testing requirements. Assume:
 - 1. Pressure leak and valve testing shall be included.
 - 2. Plant water operating pressure is 110 PSI.

2.2 PRELIMINARY DESIGN CONSTRUCTION COST ESTIMATE

- A. Prepare an AACE International Class 3 cost estimate per OC SAN's Engineering Design Guidelines, Chapter 01. Data used to prepare the cost estimate shall be included as an attachment to the PDM.
 - 1. Determine project specific and appropriate values to use for the percentages for profit, bond, and insurance.
 - 2. Costs for project level allowance, insurance, profit, and bond shall be cumulative and listed as individual line items.
 - 3. Allowances or mark ups should be well explained and itemized.
 - a. Include "Market Volatility" allowance of xx%.(revise based on the market conditions)
 - b. Do not setup allowance for change orders.
 - c. Do not escalate to midpoint of construction - this is by OC SAN.
 - 4. Specialty work should be recently (under 6 months) estimated by vendor.
 - a. For example, sewer bypassing services should be estimated by vendor (i.e., Rain 4 Rent).
 - b. Provide vendor quotes for high-cost equipment.
 - c. Minor equipment costs may be documented by written telephone quotations.
 - 5. Provide breakdown of lump sum costs.
 - 6. Show labor rates so they can be checked.
 - 7. Provide all back back up for all documentation obtained for the cost estimate purposes. The cost estimate back up shall have the date and the vendor name/contact name. If catalog price is used, provide the year of that publication.
- B. Prepare estimate of construction duration. The suggested construction duration shall take in considerations the verifiable lead time for all equipment.

3 DESIGN

Prepare biddable plans, technical specifications, other Bid Documents, and any associated design calculations, required to complete the Project Elements.

3.1 DS3 DELIVERABLES

- A. Meet at a 50% completion level with OC SAN staff to review design progress. Formal deliverables are not necessary. QA/QC is also not required for this preview.
- B. At this submittal, the design is essentially finished and submitted as complete. DS3 shall include all finished and checked plans and specifications. OC SAN staff will review DS3 and provide comments to the drawings and specifications. The CONSULTANT should be finished with no remaining design work except for OC SAN comments provided at DS3 review and their incorporation at FDS.
- C. [Prepare construction drawings in CAD conforming to OC SAN's CAD Manual. A CAD compliance check will be performed at DS3 (Exhibit 17, Chapter 8 explains the CAD compliance check, and Appendix D contains the "CAD Standards Compliance Checklist" summarizing all items checked by OC SAN). OC SAN will provide base layers and utilities for Work locations within the treatment plant boundaries.]

3.2 DS3 COST ESTIMATE

- A. Prepare an AACE International Class 2 cost estimate per OC SAN's Engineering Design Guidelines, Chapter 01 based on the DS3 design. Data used to prepare the cost estimate shall be included as an attachment to DS3.
- B. Prepare estimate of construction duration.

3.3 FDS DELIVERABLES

- A. Final Design Submittal (FDS) is for OC SAN to confirm all comments from DS3 have been addressed and incorporated and add any additional comments.

3.4 FTSP DOCUMENTS

- A. Final Technical Plans and Specifications is for the CONSULTANT to address and incorporate all comments and provide all necessary stamps and signatures for a complete bid package suitable for advertisement by OC SAN.

3.5 CONSTRUCTION COST ESTIMATE "ENGINEER'S ESTIMATE"

- A. 30 calendar days prior to advertisement, refresh the DS3 Class 2 cost estimate. Get updated vendor quotes used to prepare the DS3 cost estimate. This will become the Engineer's Estimate published in the front-end documents.

3.6 PERMITTING ASSISTANCE ([ALLOCATE 60 HOURS] [NOT INCLUDED IN THIS AGREEMENT])

- A. [For all applicable Project Elements of this Scope of Work, provide Bid Documents that ensure that the design complies with all conditions of existing permits and permits required to construct and implement this project. Testing, construction drawings, specifications, and supplemental drawings shall be prepared, as necessary, in the format required to obtain all permits.]
- B. Assist OC SAN in obtaining permits. This assistance shall include identifying applicable permits, completing required design, plan preparation, application forms provided by OC SAN, preparing supporting documentation for the permit applications as required by the issuing agency, furnishing the required number of copies of all construction drawings and exhibits, and attend meetings with permitting agencies at the request of OC SAN.
- C. Except for construction contractor-furnished permits, OC SAN staff will execute all applications. CONSULTANT shall determine the cost and requirements of all permits. All permit fees will be paid directly by OC SAN and will not be part of CONSULTANT's fee.
- D. Submit all supporting documentation in a timely fashion for all permits required for this project as described below.
 - 1. Caltrans Encroachment Permits

- a. Determine if encroachment permits or other types of permits are required by Caltrans for the design and construction phases. Provide the work necessary to obtain such permits including coordinating and attending meetings.

2. City/County Encroachment Permits

- a. Provide coordination, work effort, and attend meetings, as required, to obtain encroachment permits from each city and agency who has jurisdiction. Process the plans through the cities and agencies for approval, revise plans, and meet with them, as required, to obtain approval.]

3.7 BID SUPPORT SERVICES

- A. Provide answers to bidder's questions related to the design. Provide revisions to specifications and drawings when needed for addendum.
- B. Within 2 weeks of the bid opening date, prepare conformed document set (drawings, databases, specification, and other required materials) that incorporates the addenda. See requirements of OC SAN's CAD Manual.

3.8 POPULATE PMWEB LIST OF SUBMITTALS (ALLOCATE 24 HOURS)

- A. PMWeb is used to manage communication with the contractor. OC SAN uses an Excel template to populate the list of all submittals. The CONSULTANT shall review each project specification and complete the Submittal Items Template as follows:
 1. Enter the list of project specifications.
 2. Enter the list of commissioning packages. Commissioning packages are defined by Section 01810, Commissioning.
 3. Enter the following information for each submittal item.
 - a. Specification section: enter the specification section requiring the submittal.
 - b. Submittal Item description: enter the description of the submittal. Submittal items that refer to multiple specifications shall include referenced specification sections in brackets.
 - c. Comments: enter notes, comments, or clarifications. This field is optional.
 - d. Commissioning package: enter the commissioning package of the submittal item. Submittal items shall be duplicated when the same submittal is required for multiple commissioning packages. Items shall be separated into mobilization, general construction, or a commissioning package defined by the project specifications.
 - e. Phase: Identify which phase each submittal is required to be approved.
 - f. Retention: Specify if the submittal is a Project File or Facility Record based on OC SAN's Records Retention Policy.
 - g. Lead time: Specify the appropriate number of workdays that OC SAN has to review the particular submittal.
 - h. Load: Specify if the submittal should be loaded into PMWeb prior to NTP, upon contractor approval, or prior to the start of commissioning.
- B. OC SAN will provide a PMWeb Master Submittal Items template that includes the submittals required by OC SAN's Master Specifications. The CONSULTANT shall not deviate from the Master PMWeb Submittal Items, except as required by the project specific specifications. The CONSULTANT shall develop submittal items for specifications that are not part of OC SAN's Master Specifications.
- C. OC SAN will provide a 1-hour virtual training on the use of the PMWeb Master Submittal Items Template.
- D. The CONSULTANT shall populate, receive comments, address comments, and provide completed submittal form as follows:
 1. 20 workdays after advertisement date.

3.9 SAFETY AND RISK MEETING

- A. Ensure that an OC San Risk Management safety and security professional has been assigned to the project.
- B. CONSULTANT shall prepare and meet with OC San Risk Management personnel at all design stages to review Exhibit 11 Sample Full Project Safety Review Plan and Exhibit 12 Sample Risk Management Check List. This shall be completed in accordance with Exhibit 4 Risk Management Requirements.
- C. CONSULTANT shall update Exhibits 11 and 12 throughout the design phases. CONSULTANT shall provide OC San Risk Management with the final copies of Exhibit 11 and Exhibit 12 at completion of the Design Project.

4 CONSTRUCTION SERVICES

OC SAN will administer and provide field inspection for construction contracts. Construction and installation support services shall be provided by the CONSULTANT on an as-needed basis and as requested by OC SAN. The services are indicated below.

4.1 SUBMITTAL REVIEWS (ALLOCATE 15 HOURS)

- A. OC SAN will manage submittal review. The CONSULTANT shall use PMWeb to review and return comments to OC SAN. Return comments within 5 workdays.

4.2 REQUESTS FOR INFORMATION (RFIS) (ALLOCATE 15 HOURS)

- A. OC SAN will manage the processing of RFI's. When requested by OC SAN, CONSULTANT shall return written responses to OC SAN within 5 workdays of receipt of RFI using PMWeb. Generate necessary sketches, figures, and modifications to the drawings for clarifications.

4.3 PROGRESS MEETINGS AND SITE VISITS

- A. Refer to **Table 2**.

4.4 RECORD DRAWINGS

- A. Verify that the Contractor's As-Built set correctly reflects the information included in the approved shop drawings, RFIs, approved Field Change Orders, plan clarifications, plan changes, and other deviations from the conformed drawings, and that the information in the set is complete.
- B. Draft Record Drawings shall be submitted to OC SAN within 4 weeks of receipt from OC SAN of the approved Contractor's As-Built drawings. The Final Record Drawings shall be submitted within one week of receipt of OC SAN comments on the Draft Record Drawings.
- C. Prepare Draft Record Drawings based on the Final Field Markup Set for all drawings in accordance with the requirements in the CAD Manual. Submit the Draft Record Drawings to the OC SAN Resident Engineer. The Draft Record Drawings will be reviewed for content and CAD compliance by OC SAN staff. If no comments are identified, CONSULTANT shall prepare the Final Record Drawings and submit them along with the Contractor's field markup set to the Project Manager. For content and placement of record drawing stamp, see CAD Manual.
- D. Submit an electronic copy of the record drawings to OC SAN for review and approval. The acceptance of the record drawings shall be deemed a condition for completion of work.
- E. Contractor-generated drawings described in the Design Guidelines and the shop drawings will not be updated by CONSULTANT. The format and quantities for delivery of the submittals shall be listed below:

Contents	Draft Record Drawings	Final Record Drawings
All related electronic files, including CAD and compiled PDFs.	One copy to be uploaded to Microsoft Teams.	One copy to be uploaded to Microsoft Teams.

4.5 EQUIPMENT INFORMATION DATABASE (EID) (ALLOCATE [X] HOURS [NOT INCLUDED IN THIS AGREEMENT])

- A. OC SAN uses Maximo software to manage and track asset information. When new assets are added or existing assets are modified by a project, an EID Excel spreadsheet is used to populate or update Maximo asset information. CONSULTANT shall meet with OC SAN EIM staff to request an EID spreadsheet pre-populated with the new or modified assets. OC SAN staff will provide training on how to populate the EID spreadsheet. Field work will be needed to apply equipment tags and record equipment nameplate information and serial numbers to populate the EID. Coordinate with Maintenance Specialists (David Haug or designee, Div. 870) to walk new facilities to verify accuracy of P&IDs and EID.

4.6 [UPDATE BASELINE DRAWINGS]

5 STAFF ASSISTANCE

OC SAN staff member or designee assigned to work with CONSULTANT on the design of this project is Jessica Cheung. Phone (714) 593-7147, e-mail jcheung@ocsan.gov.

6 EXHIBITS

- A. Exhibits 1-3, 5-10 – Not Used
- B. Exhibit 4 – Risk Management Requirements
- C. Exhibit 11 – Sample Full Project Safety Review Plan
- D. Exhibit 12 – Sample Risk Management Checklist
- E. Exhibit 13 – Project Reference Material
 - a. 13.1 – Photos
 - b. 13.2 – Plant 1 Plant Water System Map
 - c. 13.3 – Proposed Design Idea (The CONSULTANT may start with this conceptual design.)
 - d. 13.4 – Proposed Valve Cans (The CONSULTANT may start with this conceptual design.)
 - e. 13.5 – Record Drawings (Available Upon Request)
 - (1) P1-82, Activated Sludge Plant Rehabilitation (2005)
 - (2) P1-36-2, Secondary Treatment Improvements at Plant No. 1 (1995)
 - (3) P1-16, 46 MGD Activated Sludge Plant at Reclamation Plant No. 1 (1973)
 - (4) P1-102, Secondary Activated Sludge Facility 2 at Plant No.1 (2006)
- F. Exhibit 14 – BlueBeam Designer Training for Submission
- G. Exhibit 15 – BlueBeam Designer User Training
- H. Exhibit 16 – Spec Review using Microsoft Word and Teams
- I. Exhibit 17 – [CAD Standard Manual](#)
- J. Exhibit 18 – PMWeb

JC:tk