

CITY OF OCEANSIDE
AMENDMENT 3 (CONTRACT PRICE AMENDMENT) TO
PROFESSIONAL SERVICES AGREEMENT

**PROJECT: OCEANSIDE MESA GARRISON FORCE MAIN,
OCEANSIDE MESA GARRISON LIFT STATION,
MISSION AVE LIFT STATION FORCE MAIN
REPLACEMENT, AND LAND OUTFALL
REPLACEMENT PROGRESSIVE DESIGN-BUILD
PROJECT**

THIS AMENDMENT 3 TO PROFESSIONAL SERVICES AGREEMENT (hereinafter "Amendment 3") is made and entered this _____ day of _____, by and between the City of Oceanside, "CITY", a municipal corporation, hereinafter designated as "CITY", and JOINT VENTURE OF ORION CONSTRUCTION CORP. AND TC CONSTRUCTION CO., INC., hereinafter designated as "DESIGN-BUILDER."

RECITALS

WHEREAS, CITY and DESIGN BUILDER are the parties to that certain Professional Services Agreement dated May 18, 2022, Amendment 1 dated December 6, 2023, and Amendment 2 dated December 17, 2025, hereinafter referred to as "Agreement" wherein DESIGN BUILDER agreed to provide certain services to the CITY as set forth therein;

WHEREAS, the parties desire to amend the Agreement to provide terms and conditions for the procurement of the materials and labor required for the construction and installation necessary for the completion of the overall Project;

WHEREAS, this Amendment 3 is related to the entire scope of work of the Project except for the scope of the Cypress Point segment (which was completed as a part of Amendment 1), and except for the scope of the Early Materials Procurement Package (which was completed as a part of Amendment 2) consisting of the scope as provided in **Exhibit 1**- OCEANSIDE MESA GARRISON LIFT STATION and **Exhibit 2** - OCEANSIDE MESA GARRISON FORCE MAIN, MISSION AVE LIFT STATION FORCE MAIN REPLACEMENT, AND LAND OUTFALL REPLACEMENT of this Amendment; and

WHEREAS, DESIGN-BUILDER has completed the design and submitted a Guaranteed Price proposal for construction of the scope, as described in Exhibits 1 and 2 to this Amendment 3 (except for the Cypress Point Early Work Package completed as part of Amendment 1 dated December 6, 2023; and the Early Materials Procurement Package completed as a part of the Amendment 2 dated December 17, 2025).

AMENDMENT

NOW, THEREFORE, as set forth herein, the parties hereto do mutually agree that the Agreement shall be amended as follows:

1. The CITY and DESIGN-BUILDER mutually agree that the Project's design work has progressed to an appropriate stage of approximately 100% design level, and pursuant to Section 2.3.1 of the Agreement, the DESIGN-BUILDER has submitted a "Guaranteed Price Proposal" for the construction of the Project.
2. All terms, conditions, and provisions previously negotiated and adopted under **Amendment No. 1** (approved by the City Council on December 06, 2023) and **Amendment No. 2** (approved by the City Council on December 17, 2025) hereby incorporated by reference and shall remain in full force and effect as part of this **Amendment No. 3**, except as expressly modified herein.
3. Substantial Completion
 - A. Substantial Completion of the OCEANSIDE MESA GARRISON FORCE MAIN river crossing, described in Exhibit 2 of this Amendment 3, shall be achieved by September 30, 2027 (the "OMG River Crossing Substantial Completion Date").
 - i. Substantial Completion for the OMG river crossing, described in Exhibit 2 of this Amendment 3, is defined as follows:

The OCEANSIDE MESA GARRISON FORCE MAIN river crossing is a segment of the OCEANSIDE MESA GARRISON FORCE MAIN line, having passed all contractually specified tests (including pressure testing), with all lines flushed, cleaned, passing inspection, and capable of meeting all contractually specified design operational scenarios and flows pending future connection to the OCEANSIDE MESA GARRISON FORCE MAIN.
 - ii. The anticipated construction schedule for Substantial Completion of the OCEANSIDE MESA GARRISON FORCE MAIN river crossing, described in Exhibit 2 of this Amendment 3, is to be determined in business days. The OMG River Crossing Substantial Completion Date is based on the Notice to Proceed (NTP) of May 1, 2026. This duration does not include City-accepted delays, such as weather-related delays (beyond the allotted allowance), and supply chain delays outside of the DESIGN-BUILDER's control.
 - B. Substantial Completion of OCEANSIDE MESA GARRISON LIFT STATION and OCEANSIDE MESA GARRISON FORCE MAIN, described in Exhibit 1 of this Amendment 3, shall be achieved by

September 27, 2028 (the "Exhibit 1 Substantial Completion Date").

- i. Substantial Completion for the OCEANSIDE MESA GARRISON LIFT STATION and OCEANSIDE MESA GARRISON FORCE MAIN, described in Exhibit 1 and Exhibit 2 of this Amendment 3, is defined as follows:

The OCEANSIDE MESA GARRISON LIFT STATION and OCEANSIDE MESA GARRISON FORCE MAIN is a fully functional facility, passing all the contractually specified tests, passing inspection, capable of meeting all the contractually specified design operational scenarios and flows, all work on the Project is sufficiently complete in accordance with the Construction Documents, and safely placed in beneficial use by the CITY.

- ii. The anticipated construction schedule for Substantial Completion of the OCEANSIDE MESA GARRISON LIFT STATION and OCEANSIDE MESA GARRISON FORCE MAIN, described in Exhibit 1 and Exhibit 2 of this Amendment 3, is five hundred ninety-seven (597) business days. The Exhibit 1 Substantial Completion Date is based on the Limited Notice to Proceed (LNTP) of May 1, 2026. This duration does not include City-accepted delays, such as weather-related delays (beyond the allotted allowance), and supply chain delays outside of the DESIGN-BUILDER's control.

- C. Substantial Completion of OCEANSIDE MESA GARRISON FORCE MAIN, MISSION AVE LIFT STATION FORCE MAIN REPLACEMENT, AND LAND OUTFALL REPLACEMENT, described in Exhibit 2 of this Amendment 3, shall be achieved by March 20, 2029 (the "Exhibit 2 Substantial Completion Date").

- i. Substantial Completion for the OCEANSIDE MESA GARRISON FORCE MAIN, MISSION AVE LIFT STATION FORCE MAIN REPLACEMENT, AND LAND OUTFALL REPLACEMENT, described in Exhibit 2 of this Amendment 3, is defined as follows:

OCEANSIDE MESA GARRISON FORCE MAIN, MISSION AVE LIFT STATION FORCE MAIN REPLACEMENT, AND LAND OUTFALL REPLACEMENT are fully functional lines, passing all the contractually specified tests (including pressure test), all lines are flushed, cleaned, passing inspection, capable of meeting all the contractually specified design operational scenarios and flows, and safely placed in beneficial use by the CITY

- ii. The anticipated construction schedule for Substantial Completion of the OCEANSIDE MESA GARRISON FORCE MAIN, MISSION AVE LIFT STATION FORCE MAIN REPLACEMENT, AND LAND OUTFALL REPLACEMENT, described in Exhibit 2

of this Amendment 3, is seven hundred thirteen (713) business days. The Exhibit 2 Substantial Completion Date is based on Notice to Proceed (NTP) of May 1, 2026. This duration does not include City-accepted delays, such as weather-related delays (beyond the allotted allowance), and supply chain delays outside of the DESIGN-BUILDER's control.

D. Grant Funding and Future Amendment

DESIGN-BUILDER and the CITY acknowledge that certain grant funding requirements and associated conditions related to milestone dates are not fully finalized at the time of execution of this Amendment.

Accordingly, the parties agree that the Substantial Completion provisions set forth in Sections 3.A and 3.B shall be subject to further review and modification upon finalization of the applicable grant terms and conditions. The parties agree to negotiate in good faith and execute a future amendment to incorporate such finalized requirements.

Furthermore, the parties agree that only one Substantial Completion Date associated with grant-related milestone requirements (whether under Section 3.A. or 3.C.) shall be applicable, as determined by the finalized grant conditions.

4. Final Completion

A. Final Completion of OCEANSIDE MESA GARRISON LIFT STATION, OCEANSIDE MESA GARRISON FORCE MAIN, MISSION AVE LIFT STATION FORCE MAIN REPLACEMENT, AND LAND OUTFALL REPLACEMENT (the "Project") shall be achieved by April 24, 2029 (the "Final Completion Date").

B. Final Completion for the Project is defined as follows:

- i. All contractual requirements are met, all punch list items are completed, and the Notice of Completion is ready to be filed.
- ii. DESIGN-BUILDER provided the City with a Certificate of Completion, certifying to the City under penalty of perjury that the Project has been completed in accordance with the Construction Documents, all applicable building codes and regulations, all permits, licenses, and certificates of inspection, use and occupancy, and ordinances relating to the Project.
- iii. DESIGN-BUILDER provided one set of final record drawing documents at the end of construction and one copy in electronic format ("As-Built Drawings"). As-Built Drawings are to be accurate and legible records showing exact location by dimensions, and the exact depth by elevation of underground lines, valves, plugged tees, wiring, and utilities.
- iv. DESIGN-BUILDER provided a copy of, or made available before destruction, all records (which include all writings as defined in Evidence Code Section 250) to the CITY upon receipt

or generation, which shall include a copy of DESIGN-BUILDER's filing protocol.

5. Pursuant to Section 7.2.3, the CITY has elected to implement the Guaranteed Price for the Work for Phase 2 Services as a Lump Sum; therefore, the requirements of Section 7.4 will govern payment for such Work.
 - A. The Guaranteed Price for the Work for Phase 2 Services ("Contract Price") shall not exceed \$90,087,823 in accordance with Exhibit 3. The Contract Price is fixed and shall be modified only in accordance with the procedures for Change Orders specified in the Contract Documents.
 - B. The Design-Builder's Fee for Work for Phase 2 Services is included in the Contract Price.
6. Section 6.4.1 – Liquidated Damages for Substantial Completion – is hereby replaced in its entirety as follows:

6.4.1 Liquidated Damages for Substantial Completion.

- 6.4.1.1** Design-Builder understands that if Substantial Completion of the OCEANSIDE MESA GARRISON FORCE MAIN river crossing Substantial Completion Date, CITY will suffer damages that are difficult to determine and accurately specify. Design-Builder agrees that if Substantial Completion of such Work is not achieved by September 30, 2027 (the "LD1 Date"), Design-Builder shall pay CITY sixteen thousand two hundred Dollars (\$16,200) as liquidated damages for each day that Substantial Completion extends beyond the LD1 Date.

DESIGN-BUILDER and the CITY agree that any liquidated damages arising under this section shall be to the maximum aggregate amount of \$1,329,165 dollars. This cap shall serve as the total cumulative limit for any and all liquidated damages claims under this section.

- 6.4.1.2 Exhibit 1 Work.** DESIGN-BUILDER understands that if Substantial Completion of the OCEANSIDE MESA GARRISON LIFT STATION and OCEANSIDE MESA GARRISON FORCE MAIN described in Exhibit 1 of this Amendment 3 is not attained by the Exhibit 1 Substantial Completion Date, CITY will suffer damages that are difficult to determine and accurately specify. DESIGN-BUILDER agrees that if Substantial Completion of such Work is not achieved by September 27, 2028 (the "LD2 Date"), DESIGN-BUILDER shall pay CITY sixteen thousand two hundred Dollars (\$16,200) as liquidated damages for each day that Substantial Completion extends beyond the LD2 Date.

DESIGN-BUILDER and the CITY agree that any liquidated

damages arising under this section shall be to the maximum aggregate amount of \$1,329,165 dollars. This cap shall serve as the total cumulative limit for any and all liquidated damages claims under this section.

- 6.4.1.3 Exhibit 2 Work.** DESIGN-BUILDER understands that if Substantial Completion of the OCEANSIDE MESA GARRISON FORCE MAIN, MISSION AVE LIFT STATION FORCE MAIN REPLACEMENT, AND LAND OUTFALL REPLACEMENT described in Exhibit 2 of this Amendment 3 is not attained by the Exhibit 2 Substantial Completion Date, CITY will suffer damages that are difficult to determine and accurately specify. DESIGN-BUILDER agrees that if Substantial Completion of such Work is not achieved by March 20, 2029 (the "LD3 Date"), DESIGN-BUILDER shall pay CITY sixteen thousand two hundred Dollars (\$16,200) as liquidated damages for each day that Substantial Completion extends beyond the LD3 Date.

DESIGN-BUILDER and the CITY mutually agree that the Substantial Completion Date specified in this section shall be subject to revision if the Buccaneer Lift Station project, which is outside the scope of this Amendment, is delayed beyond March 20, 2029. In such an event, DESIGN-BUILDER and the CITY commit to negotiating in good faith an appropriate extension of the Substantial Completion Date commensurate with the impact of that delay.

- 6.4.1.4 Grant Funding and Future Amendment**
DESIGN-BUILDER and the CITY acknowledge that certain grant funding requirements and associated conditions related to milestone dates and liquidated damages are not fully finalized at the time of execution of this Amendment.

Accordingly, the parties agree that the liquidated damages provisions set forth in Sections 6.4.1.1 and 6.4.1.2 shall be subject to further review and modification upon finalization of the applicable grant terms and conditions. The parties agree to negotiate in good faith and execute a future amendment to incorporate such finalized requirements.

Furthermore, the parties agree that only one set of liquidated damages associated with grant-related milestone requirements (whether under Section 6.4.1.1 or 6.4.1.2) shall be applicable, as determined by the finalized grant conditions, and that such liquidated damages shall not be applied cumulatively.

7. Section 6.4.2 – Liquidated Damages for Final Completion – is hereby replaced in its entirety as follows:

6.4.2 Liquidated Damages for Final Completion. DESIGN-BUILDER

understands that if Final Completion of the Project is not achieved by the Final Completion Date, CITY will suffer damages that are difficult to determine and accurately specify. DESIGN-BUILDER shall pay to the CITY four thousand one hundred Dollars (\$4,100) as liquidated damages for each calendar day that Final Completion is delayed beyond the Final Completion Date.

8. The following sentence is hereby added to Section 7.4.4 -- DESIGN-BUILDER's Obligations Related to Funding Requirements:

The DESIGN-BUILDER is to comply with the requirements of the Water Infrastructure Finance and Innovation Act (WIFIA) loan from the Environmental Protection Agency and the Department of Water Resources.

9. Section 7.1 of General Provisions is hereby revised to read as follows:

The DESIGN-BUILDER shall, before the start of any applicable work, obtain and pay all costs incurred for any and all required permits, licenses, and other authorizations necessary to perform the work.

DESIGN-BUILDER should schedule the work to minimize permitting and mitigation requirements. DESIGN-BUILDER shall perform and schedule work to minimize environmental impacts and shall include mitigation measures in the EIR Mitigation Monitoring and Reporting Program. To minimize environmental impacts, DESIGN-BUILDER shall phase and schedule work within the parameters and requirements outlined by the City and various regulatory agencies. The impact minimization shall be performed in coordination with the CITY and its designated agents, and in accordance with their approval.

The permits, licenses, authorizations, and/or requirements that the DESIGN-BUILDER shall obtain and comply with include, but are not necessarily limited to, permits/authorizations issued by the following:

- 7.1.1 City of Oceanside
- 7.1.2 San Diego Gas and Electric
- 7.1.3 USACE
- 7.1.4 RWQCB
- 7.1.5 CDFW
- 7.1.6 Caltrans
- 7.1.7 SHPO

10. Section 7.2.6 is hereby added to the General Provisions to read as follows:

7.2.6 All submittals and RFIs provided by DESIGN-BUILDER for the Engineer's review must be accompanied by the review and

approval of the submittal or RFI by DESIGN-BUILDER's Engineer-of-Record, with its review notes and recommendations. The submittals provided for the Engineer's review without DESIGN-BUILDER's Engineer-of-Record's review and approval notes may be rejected and require resubmittal. Any deviations from approved project plans and specifications, City Standard Drawings, City Standards Specifications, City Engineering Design Manual, and City Water Utilities Design and Construction Manual shall be clearly marked.

Incomplete Submittals will not be reviewed by the City Representative. Delays resulting from incomplete submittals are not the responsibility of the CITY.

DESIGN-BUILDER shall not be entitled to any extension of the Guaranteed Completion Date as a result of the Submittal process.

11. Section 7.5.7 – Utilities – is hereby added to the General Provisions as follows:

7.5.7 The DESIGN-BUILDER shall be responsible for mapping both horizontally and vertically all reasonably discoverable utilities (overhead and buried) within the project area from record drawings, and by field potholing and surveying, including utilities in proximity of temporary and permanent excavations, utility crossings, and parallel utility encroachments. Any revisions of the approved plans to the horizontal and vertical alignment of the proposed pipelines shall require prior approval by the CITY. Field changes to horizontal and/or vertical alignment of pipelines, appurtenances, and structures, due to inaccurate mapping of existing utilities or appurtenances, shall be completed at no additional cost to the CITY.

12. Section 7.8.11 – Site Control – is hereby added to the General Provisions as follows:

7.8.11.1 Security will not be provided by the CITY for the DESIGN-BUILDER's materials, tools, and equipment lay down or storage area. The DESIGN-BUILDER may use the project site for such purposes during the Contract period at the sole risk of the DESIGN-BUILDER.

7.8.11.2 The DESIGN-BUILDER shall be responsible for security and facilities to protect work from unauthorized entry, vandalism, or theft. Any costs associated with it will be borne by the DESIGN-BUILDER.

13. Sections 7.14.4, 7.14.5, 7.14.6, and 7.14.7 are hereby added to the General Provisions as follows:

7.14.4 DESIGN-BUILDER is responsible for all specialty inspection and material testing inspections and providing the CITY with signed field reports within 48 hours of the inspection. The CITY will be

responsible for performing quality assurance inspections. It is the responsibility of DESIGN-BUILDER to coordinate and schedule all inspections 48 hrs in advance of the requested inspection or test.

7.14.5 DESIGN-BUILDER and all its subcontractors must provide the CITY, its consultants, subcontractors, independent testing laboratories, as well as other governmental agencies with jurisdictional interests, with full access at reasonable times for observation, inspection, and testing. DESIGN-BUILDER and its subcontractors must provide safe conditions for such access and advise them of DESIGN-BUILDER's and the CITY's safety procedures and programs so that they may apply.

7.14.6 DESIGN-BUILDER will make, or have made, such inspections and tests as the CITY deems necessary to see that the Work is being accomplished in accordance with the requirements of the Construction Documents. In the event such inspections or tests reveal non-compliance with the requirements of the Construction Documents, DESIGN-BUILDER shall bear the cost of corrective measures deemed necessary by CITY, as well as the cost of subsequent re-inspection and re-testing. Neither observations by the CITY nor inspections, tests, or approvals by others shall relieve DESIGN-BUILDER from its obligations to perform the Work in accordance with the Construction Documents, or shall in any way limit or modify DESIGN-BUILDER's indemnity obligations as provided for within this agreement. DESIGN-BUILDER shall cooperate with inspection and testing personnel to facilitate required inspections or tests. DESIGN-BUILDER shall give at least 48 hours' notice for inspections.

7.14.7 CITY has the right to stop or suspend Work activities which will conceal or cover up DESIGN-BUILDER Work product, which is to be inspected or tested, or which will interfere with the inspection or testing activities, for a reasonable time. DESIGN-BUILDER will have no right to additional compensation if specified notifications were not provided.

14. Section 7.15 of the General Provisions (MONTHLY PROGRESS REPORTS) is hereby renamed "SCHEDULING AND REPORTING REQUIREMENTS" and replaced in its entirety with Exhibit 4 hereto.
15. Sections 7.21.5(f) and 7.21.5(g) of the General Provisions are hereby replaced in their entirety as follows:
 - (f) **Markup.** The PDBT shall be entitled to a markup of twelve and a half percent (12.5%) of the actual net increase in the above direct costs, which are substantiated in accordance with this section 7.21.5. The markup shall cover all indirect costs, including but not limited to bond and insurance premiums, office overhead, profit, and the purchasing or renting of small tools and equipment.
 - (g) **Subcontractor's Work.** In order for the PDBT to be entitled to an adjustment in the Contract Price based upon the work of a subcontractor, the PDBT shall submit documentation in accordance

with section 7.21.5(a) through 7.21.5(f) above for the subcontractor's work. The PDBT shall be entitled to a markup on the subcontractor's costs (direct and markup) equal to eleven and a half percent (11.5%) on the first two thousand (\$2,000) dollars of the subcontractor's costs, and five percent (5%) on work in excess of two thousand (\$2,000) dollars of the subcontractor's costs.

16. Section 8.05 of the Special Provisions is hereby replaced as follows:

8.05 FACILITIES FOR CITY PERSONNEL

8.05.1 CONSTRUCTION MANAGER's Office: Weather-tight, with lighting, electrical outlets, heating, cooling, and ventilating equipment, and equipped with furniture. In addition, provide space for Project meetings, with desks and chairs to accommodate 6 persons.

8.05.2 Provide four separate private offices, similarly equipped and furnished.

8.05.3 Provide, from the start of construction to the date of the final certificate, a separate temporary field office on the construction site for the resident project representative of the CONSTRUCTION MANAGER and field inspectors. The temporary office shall be located at a location acceptable to CONSTRUCTION MANAGER and shall be of sufficient size to accommodate 6 permanent staff and 2 guests.

8.05.4 Cost of temporary office, including but not limited to the cost of heat, air conditioning, lighting, utilities, security fence, maintenance, and janitorial service, shall be paid by CONTRACTOR and included in the Contract price.

8.05.5 Temporary field office shall be 24 feet wide, a minimum of 1400 square feet, and shall be complete with the following items of equipment and furniture:

- a. Six desks (36 in. by 60 in.) and one chair each.
- b. One drafting table (36 in. by 60 in.), and one stool.
- c. One vertical drawing file.
- d. Three legal-size, four-drawer filing cabinets with locks and keys, equipped with a hanging folder system and 200 hanging folders. One of the cabinets shall be fireproof.
- e. Two 2'-6" by 8'-0" folding conference table with ten chairs.
- f. One copy/scanner machine capable of reproducing 8-1/2 by 11-inch, 8-1/2 by 14-inch, and 11 by 17-inch sheets. Provide and pay for routine service and maintenance on this equipment for the life of the project.
- g. One automatic defrost refrigerator has a minimum capacity of 20 cubic feet.
- h. One 18 by 26 by 72-inch-high freestanding bookshelf/storage unit containing a minimum of 6 adjustable shelves.

- i. One battery-operated, quartz-regulated, wall clock, with a minimum of 12-inch diameter.
- j. Eight steel wastebaskets, minimum of 6.5-gallon capacity.
- k. One 3 by 4 foot dry-erase board with 4 different colored markers and erasers.
- l. Provide wireless broadband internet access.

8.05.6 Provide janitorial and other maintenance services in all types of facilities provided. Such services should include the supply of appropriate paper products and dispensers. Outside trash receptacles shall be provided and emptied by the PDBT at weekly intervals or sooner as required. The trash shall be removed from the project site.

8.05.7 Provide water and sewer service for the temporary office.

8.05.9 Provide a built-in washroom facility and non-potable water storage tank. Maintain the storage tank as part of regular field office maintenance.

8.05.10 Provide suitable security for the field office, including but not limited to temporary chain link fencing with a lockable gate if the CONSTRUCTION MANAGER's field office is located away from the Work site. Security measures shall be accepted by the CONSTRUCTION MANAGER.

8.05.11 Temporary office shall present a neat, business-like appearance and shall be of substantial construction. A mobile-type office will be acceptable.

SIGNATURES. The individuals executing this Amendment represent and warrant that they have the right, power, legal capacity, and authority to enter into and to execute this Agreement on behalf of the respective legal entities of the CONSULTANT and the CITY.

IN WITNESS WHEREOF, the parties hereto being duly authorized on behalf of their respective entities to execute this Amendment, do hereby agree to the covenants contained in the Agreement, including this Amendment, and have caused this Amendment to be executed by setting hereunto their signatures this _____ day of _____, 2019.

CONSULTANT

CITY OF OCEANSIDE

By: _____

By: _____

Jonathan Borrego
City Manager

By: _____

APPROVED AS TO FORM:

Employer ID No.

City Attorney

NOTARY ACKNOWLEDGEMENTS OF CONSULTANT MUST BE ATTACHED.

General Conditions - Section 7.15 - "SCHEDULING AND REPORTING REQUIREMENTS"

1.0 THE REQUIREMENT

A. It is expressly understood and agreed that the time of beginning, the rate of progress, and the time of completion of the Work are of the essence of this Contract. Within five (5) calendar days after Limited Notice to Proceed (or Notice to Proceed) for each component of the project, the Design-Builder should obtain CITY's acceptance of the cost-loaded Construction Baseline Schedule before mobilization. The Construction Baseline Schedule shall meet the requirements of this Specification Section.

B. General

1. Schedule Methodology

The scheduling method to be used shall be a Critical Path Method schedule in the form of an activity-on-node Precedence Diagram Network (PDN), capable of identifying the critical path. The principles and definitions of the terms used herein shall be as set forth in the Associated General DESIGN BUILD ENTITY'S publication "CPM in Construction", latest edition. To the extent there are conflicts between the Associated General DESIGN BUILD ENTITY'S publication and the Specifications, the Specifications shall govern.

2. Work Breakdown Structure

The DESIGN BUILD ENTITY shall submit to the CITY for approval, the following:

- a. A Work breakdown structure.
- b. The associated alphanumeric coding structure to implement the Work Breakdown Structure.
- c. The activity identification system for labeling all Work activities.

3. Scheduling System

The DESIGN BUILD ENTITY shall use Primavera P6 (latest edition) and a hardware system commensurate with the size of the program. This shall be referred to as the Scheduling System. The Scheduling System shall be capable of handling, processing, printing, and plotting data to satisfy all requirements of this Section.

C. DESIGN BUILD ENTITY'S Construction Schedule

- 1.** The Schedule shall show the sequence and interdependence of activities required for complete performance of the Work, beginning with the date of the Notice to Proceed and concluding with the Contract Completion Date based on the completion time (working days) allowed in the Contract.
- 2.** Pursuant to the float sharing requirements of the Contract, the use of float suppression techniques such as preferential sequencing, special lead/lag logic restraints, extended activity times, or imposed dates shall be cause for rejection of the Schedule and any revisions or updates. The use of float time disclosed or implied by the use of alternative float suppression techniques shall be shared as directed by the CITY.
- 3.** If the DESIGN BUILD ENTITY submits a Baseline Schedule showing completion of the Work more than thirty (30) calendar days in advance of the Contract Completion Date, the DESIGN BUILD ENTITY agrees that the CITY may, at no cost to the CITY, decrease the Contract duration by issuance of a Change Order

which will change the appropriate Milestone Date(s) and the Contract Completion Date to the completion date reflected on the Schedule. Any approved Schedule, revision, or update having an early completion date shall show the time between the early completion date and the current Contract Completion Date as "project float".

4. Comments made by the CITY on the Schedule, during review, will not relieve the DESIGN BUILD ENTITY from compliance with requirements of the Contract Documents. To the extent that there are any conflicts between the approved Schedule and the requirements of the Contract Documents, the Contract Documents shall govern.
5. If requested by the CITY at any time during the project, the DESIGN BUILD ENTITY shall provide a highly detailed, short-term schedule for specific crucial items (conflicting work at the site, shut-downs, tie-ins, start-up, etc.).

2.0 NETWORK DETAILS

- A. The Schedule shall include time-scaled network diagrams, based on working days, as well as computer tabulations. Construct the Schedule to show the order in which the Work will be carried out, to indicate restrictions of access, and to show availability of Work areas, availability and use of manpower, materials, and equipment.
- B. Utilize the Schedule in planning, scheduling, coordinating, and performing the Work under the Contract (including all activities of Subcontractors, equipment vendors, and Suppliers).
- C. Determine logic based on which activity must be completed before a successor can start; maximum concurrent work; and manpower or equipment constraints that prevent concurrent work.
- D. The Schedule shall provide the CITY with a tool to monitor and follow the progress of all phases of the Work. The Schedule submitted to the CITY shall comply with all limits imposed by the scope of Work, with all contractually specified intermediate milestone and completion dates, and with all constraints, restraints, or sequences included in the Contract. The degree of detail shall include factors to the satisfaction of the CITY, including, but not limited to:
 1. Physical breakdown of the project.
 2. Contract milestones and completion dates, substantial completion dates, constraints, restraints, sequences of Work shown in the Contract, the planned substantial completion date, and the final completion date.
 3. Type of Work to be performed, the sequences, and the labor trades involved.
 4. All purchases, submittals, submittal reviews, manufacturing, tests, delivery, and installation activities for all major materials and equipment, and a separate list of all major material items or items of equipment for which payment will be requested prior to installation, when permitted by the Contract.
 5. Deliveries of the CITY furnished equipment and/or materials in accordance with the dates or schedule windows of such items set forth in the Contract or furnished by the CITY, or items to be salvaged and delivered to the CITY.
 6. Preparation, submittal and approval of Shop and/or Working Drawings and material samples showing a **[thirty (30) (for WW)]****[Twenty-one (21) (for MF)]** day minimum time specified for the CITY's review of normal or routine submittals and a thirty (30) day review time for all major submittals, so identified in the technical specifications, and the same time frame shall be allowed for at least one (1) resubmittal on all major submittals so identified in the Contract Documents.

7. Approvals required by regulatory agencies or other third parties
 8. Plans for all subcontract Work, [**concrete placement sequence, structural steel, plumbing, heat, ventilation, air conditioning, electrical, etc.**].
 9. Assignment of responsibility for performing specific activities,
 10. Access to and availability of Work areas, including all anticipated plant shutdowns, if applicable.
 11. Identification of interfaces and dependencies with preceding, concurrent, and follow-on CONTRACTORS and utilities as shown on the Plans or called out in the Specifications.
 12. Resource loading for cost, manpower, material, and equipment.
 13. Perform required tests; coordinate testing with the CITY as required; submit test reports; and obtain approval of test results.
 14. All start-up, testing, training, and assistance required under the Contract.
 15. Planning for phased or total takeover by the CITY.
 16. Punchlist and final cleanup.
 17. Identification of any manpower, material, or equipment restrictions, as well as any activity requiring unusual shift work, such as two shifts, six (6) day weeks, specified overtime, or work at times other than regular days or hours, shall be clearly identified in the Schedule.
- E.** Include the effects of adverse weather in the Schedule in terms of working days (wds). The number of wds, Monday through Friday, excluding any day designated as a holiday by the CITY or in a Master Labor Agreement applicable to the Work, of normal adverse weather per month is as follows: January-3 wds, February-2 wds, March-3 wds, April-1 wd, October-1 wd, November-2 wds, December-2 wds. Unusually severe is defined as the number of working days over what is normal adverse weather, as defined in the previous sentence. For partial months, the aforementioned numbers shall be prorated and rounded to the nearest whole number. There shall be no extension of time for adverse weather unless work is prevented during the first five (5) hours of a workday with at least sixty percent (60%) of the normal work force on more days per month than listed above. A non-compensable time extension will only be granted when the allowed weather impacts are exceeded.
- F.** Treat float, slack time, contingency, and total float within the Schedule (including the difference between any early completion date and the required Contract Completion Date) as a jointly owned, expiring resource available to the CITY and the project team. Do not use float suppression techniques. the CITY may reject the Schedule and any revisions or updates that use float suppression techniques.
- G.** Schedule Quality and Governance Leads are prohibited. Lags shall be limited to true waiting/curing periods that cannot reasonably be represented as discrete activities and must be justified. Constraints shall not be used to restrain or manipulate float or to mask missing logic; only contractual/external constraints are allowed without special approval. Schedules that contain float-manipulation techniques may be rejected.
- H.** Do not request or claim a time extension or delay damages unless a delay occurs that: (1) is beyond control and without the fault or negligence of the requesting party and its Subcontractors or Suppliers, at any tier; and (2) extends actual performance of the Work beyond both the current Contract Completion Date and the completion date projected by the current, approved, updated Schedule. If the current approved Schedule update already projects late completion prior to the addition of any CITY - caused delay, limit any time extension to the additional delay demonstrated by an

- approved Time Impact Analysis. Submit a Time Impact Analysis within fifteen (15) calendar days after the delay occurs that: (a) demonstrates the estimated impact on the end date of the Work; (b) is based upon the updated Schedule current as of the month the delay occurred; and (c) demonstrates that the delay cannot be mitigated, offset, or eliminated through actions such as revising the intended sequence of Work or other means. Because float time within the Construction Schedule is jointly owned, CITY-caused delays on the project may be offset by the CITY-caused time savings (e.g., critical path submittals returned in less time than allowed by the Contract or approval of substitution requests that result in time savings). No entitlement to a time extension or delay damages exists until all the CITY-caused time savings are exceeded and the Contract Completion Date is exceeded.
- I. If the Baseline Schedule submitted shows an early completion date, the CITY may, at no cost to the CITY, decrease the Contract duration by issuance of a Change Order, which changes appropriate Milestone Date(s) and the Contract Completion Date to the completion date reflected on the Baseline Schedule. Any approved Schedule, revision, or update having an early completion date shall show the time between the early completion date and the current Contract Completion Date as "project float".
 - J. The CITY's review comments on the Schedule do not relieve the parties of all requirements of the Contract. The CITY may request participation in Schedule reviews by the scheduling team and all major Subcontractors (defined herein as any Subcontractor, Sub-Subcontractor, or Supplier with five (5) percent or more of the value of the Contract). Submit all revisions within five (5) working days after the CITY review.
 - K. Submit two (2) copies of an updated Schedule to the CITY for approval with each monthly payment request submittal.
 - 1. For activities started but not yet completed at the time of submittal, reflect the percentage complete (as agreed at the update meeting with the CITY and the Inspector) and an estimate of the remaining duration.
 - 2. The monthly update of the Schedule shall include updated schedule outputs generated from the CPM network (time-scaled bar chart and logic diagram) and include the same additional data as required by Section 1.B above.
 - 3. Calculate the CPM schedule using remaining durations and the progress override option. Provide the predecessor/successor report to support the bar chart or the network diagram electronically (native file plus reports), as directed by the CITY . The monthly update shall also include a complete, hard-copy list of all the changes made from the previously approved submittal.
 - 4. If prepared in Primavera, include an XER Tool Kit report for the list of changes.
 - L. Update Integrity Requirements.
 - 1. Out-of-sequence progress and deviations from the approved logic shall be identified in the monthly narrative and corrected in the next update to maintain a logic-driven forecast. Constraints shall not be added to manage slippage except as approved by the CITY for contractual/external date requirements

3.0 SCHEDULE REPORTS

- A. The Schedule submitted to the CITY shall include the time-scaled network diagram. Network diagrams shall be based on the early start and early finish dates of the activities shown. The network diagrams submitted to the CITY shall also be accompanied by a computer-generated mathematical analysis for each activity included in the Schedule. Such mathematical analysis shall be submitted to the CITY

and shall include, at a minimum, the following:

1. A list of all activities sorted by Activity I.D. Number with predecessor and successor activity numbers and descriptions;
 2. Activity number and description.
 3. Activity code(s).
 4. Schedule and actual/remaining duration for each activity.
 5. Earliest start date (by calendar date).
 6. Earliest finish date (by calendar date).
 7. Actual start date (by calendar date).
 8. Actual finish date (by calendar date).
 9. Latest start date (by calendar date).
 10. Latest finish date (by calendar date).
 11. Float in work days.
 12. Monetary value and cost-to-date of each activity.
 13. Percentage of activity complete and remaining duration for incomplete activities.
 14. Cumulative value of Work completed based on the DESIGN BUILD ENTITY'S reported portion of activities completed and accepted.
 15. Imposed constraints.
- B.** The following printed computer outputs shall be required as part of the Schedule submittal and each revision or update thereafter as a condition precedent to receipt of progress payments:
1. Activity listing sorted by I.D. number showing predecessor and successor activities in numerical order, with original and remaining duration, early start, early completion, late start, late completion, and total float.
 2. A sublisting of materials and equipment sorted by Specification Section number. The sublisting of materials and equipment shall include the following activities: preparation of Shop Drawings, submittal to the CITY, review by the CITY, and fabrication, testing, and/or delivery of material and equipment, which shall be interfaced with the earliest start date that the material or equipment is to be installed on the project.
 3. Activity sort(s) by organizational responsibility, including submittals to the CITY for all major items or material and equipment, the number of shifts, crew sizes of each craft and construction equipment to accomplish the activity;
- C.** Outputs 1 and 2, above, shall show all activities, including restraints, for the duration of the project.

4.0 APPROVAL PROCESS:

- A.** THE CITY shall approve or disapprove, in writing, the submission within ten (10) working days after receipt of all required information. The Schedule, once approved, becomes the Baseline Schedule, which shall be used to monitor and evaluate all facets of Contract performance, including, but not limited to, progress, changes, and delays.
- B.** Attend and participate in all meetings required by THE CITY to reach mutual agreement and approval of the Baseline Schedule, the Manpower Requirements Forecast, and the Cash Flow Projection. Ensure participation by the Construction Scheduler and those major trade Subcontractors and Suppliers, as required by THE CITY.
- C.** Revise the Baseline Schedule, as required by THE CITY, to reflect project construction. If any required submissions are returned for corrections or revisions, resubmit them along with a new USB drive and a hard copy listing of each change

(XerTool Kit report) for approval within five (5) working days after receipt. Review and response by THE CITY shall be given within five (5) working days after receipt of each new submission.

- D. Should the Baseline Schedule, submitted for approval, show variances from the requirements of the Contract, make specific mention of such variations in the letter of transmittal, in order that, if accepted, proper adjustments to the Baseline Schedule can be made. Otherwise, compliance obligations remain unchanged, and execution of the Work shall remain in strict accordance with the requirements of the Contract Documents.

5.0 REVISIONS TO APPROVED BASELINE SCHEDULE

- A. Execute the Work in accordance with the approved Baseline Schedule. Out of sequence construction, defined as a change in the Baseline Schedule, requires prior approval of THE CITY as defined below.
- B. Upon approval of a Time Impact Analysis, reflect the change in the next schedule submittal.
- C. Do not make any change (except for resubmittals) to the approved Baseline Schedule without prior written approval of THE CITY. To request a change to the approved Baseline Schedule, submit a written request to THE CITY stating the reasons for the change and the specifics (e.g., revisions to activities, logic, durations, etc.). THE CITY will provide a response within five (5) working days. Actual status and/or forecast dates for revised submittals may be added without prior acceptance by THE CITY, but remain subject to THE CITY review.
- D. If THE CITY considers a change to the Baseline Schedule to be of a major nature, THE CITY may require revision and submittal for acceptance of all affected portion(s) of the Baseline Schedule, including an analysis showing the effect on the entire project. Submit the proposed revision and analysis to THE CITY within ten (10) working days after THE CITY notifies that the revision is of a major nature. A change will be considered of a major nature if the time estimated for an activity or sequence of activities is varied from the original plan to the degree that there is reasonable doubt that the Contract completion date will be met, or if the change impacts the Work of other parties at the Jobsite. Changes to activities having adequate float shall be considered as minor changes, except that an accumulation of minor changes may be considered a major change when such changes affect the Contract completion date. (Activities having adequate float are activities which are not critical after the change is made.).
- E. Reflect any change in the next Schedule update only after THE CITY approval.

6.0 Updates to the Approved Baseline Schedule and Progress Payments

- A. Monthly Updates:
 - 1. Submit all updated or revised Schedules in the same detail as the original submittal, unless otherwise directed in writing by THE CITY.
 - 2. The initial Schedule update shall be submitted within ten (10) working days after approval of the Baseline Schedule. The Schedule update shall be cost-loaded. Subsequent Schedule updates shall be submitted at the beginning of each month thereafter for the duration of the Contract. The data date shall be the first working day of the month unless otherwise directed by THE CITY. The Schedule and computer tabulations shall be reviewed by the Construction Scheduler at a joint

update meeting with THE CITY and the INSPECTOR.

B. Monthly Schedule Updates shall include:

1. For activities started and/or completed during the previous period: Actual start and actual completion dates, and number of days used to accomplish the activity.
2. For activities in progress, but not yet complete to date: Remaining duration of the Work, estimated percent complete, and estimated completion date. The schedule shall be calculated using remaining durations and progress override.
3. Update Integrity Requirements
Out-of-sequence progress shall be identified in the narrative and corrected in the next update to maintain a logic-driven forecast. Constraints shall not be added to manage slippage except as approved by THE CITY for contractual/external date requirements.
4. Maintained Baseline and Variance Reporting (Monthly Updates)
Each Monthly Update submittal shall include a Baseline Verification statement confirming: the maintained Baseline remains assigned in P6, and baseline variance fields/reports are reproducible after import of the submitted native schedule file.
5. Provide a Baseline Change Log in each Monthly Update identifying any authorized baseline adjustments (authorization reference, affected WBS/activities/milestones, effective date.
6. For activities not yet started: Estimated start dates, revised durations, and estimated completion dates, as necessary.
7. For authorized Change Orders, including Emergency Change Orders, Time and Material Change Orders, and Unilateral Change Orders: Revised and original activities, number of shifts, crew sizes by craft, construction equipment required, cost, and durations, and status of all outstanding Notices of Non-Compliance, where required.
8. The monthly update of the Network Diagram shall be for the whole project. The previous month's activities shall be reported as they actually took place and designated as complete, if actually completed, on the network diagram update.
9. The electronic file of the submitted Network Diagrams and the related reports shall constitute a clear record of progress of the Work from Notice to Proceed to final completion.
10. The monthly submittal to THE CITY shall be accompanied by the Schedule Narrative Report. The Schedule Narrative Report shall describe the physical progress during the report period, Plans for continuing the Work during the forthcoming report period, actions planned to correct any negative float predictions, and an explanation of potential delays and/or problems and their estimated impact on performance and the overall project completion date. In addition, alternatives for possible schedule recovery to mitigate any potential delay and/or cost increases shall be included for consideration by THE CITY.

C. Schedule Narrative Report Outline:

- 1) Transmittal Letter.
- 2) Description of problem areas.
- 3) Current and anticipated delays:
 - a) Cause of the delay.
 - b) Corrective action and schedule adjustments to correct the delay.
 - c) Impact of the delay on other activities, milestones, and completion dates.
- 4) Changes in construction sequences.

- 5) Pending items and status thereof:
 - a) Permits.
 - b) Change Orders.
 - c) Time extensions.
 - d) Non-Compliance Notices.
 - 6) Contract Completion Date(s) status:
 - a) Ahead of schedule and number of working days.
 - b) Behind schedule and number of working days.
 - 7) Other project or scheduling concerns, including any plant shutdowns, duration of each shutdown, and analysis of any Work to be performed during the shutdown period.
 - 8) Include reviewed and updated Network Diagram and Reports.
 - 9) Include revised Cost Loading and Cash Flow Information of this Section.
 - 10) Include substantial revisions to manpower and equipment requirements
- D. Weekly Progress Reports**
1. Once each week, on a day established by THE CITY, the DESIGN BUILD ENTITY shall submit:
 - a. A progress schedule (A.K.A. 3-week look ahead) listing the activities completed and in progress for the previous week and the activities scheduled for the succeeding two (2) weeks. The activity designations shall be consistent with those in the Current Schedule Update. A bar chart shall be used to display the information in pictorial form. The appropriate schedule activity number shall be listed for each bar.

7.0 Cost Loading and Cash Flow

- A.** With the initial Baseline Schedule submittal, each Monthly Schedule Update, and each revision, the DESIGN BUILD ENTITY shall also submit a schedule of cost loading and cash flow to THE CITY. There shall be a strict correlation between the sum of individual activity costs and the total values indicated for bid items. That is, each individual activity within the Schedule shall employ a code, which in summary, attaches its cost, if any, to the appropriate bid items, or in the approved schedule of values. The sum of activity costs within a specific code shall equal the cost of its corresponding bid items and approved Change Orders.
- B.** Expected payment requests for each month shall be included with proposed updates. The cash flow shall show the net payment requests for each month. The cumulative payment requests to date shall also be shown after deducting retention and any other monies withheld. The cash flow shall be shown in tabular format and in graphic format.
- C.** In accordance with the updating procedures, when an activity is deemed substantially complete by THE CITY, then such activity will no longer be treated as an activity affecting the critical path or successor activities on the project. The cost of correction of any punch list items associated with substantially completed activities will be covered by amounts deemed by THE CITY and the INSPECTOR to be adequate to cover such costs.

8.0 Responsibility For Completion

- A.** Whenever it becomes apparent from the current Monthly Schedule Update that phasing, milestone, constraint, restraint, or Contract Completion Date will not be met, the DESIGN BUILD ENTITY shall submit a plan to recover the delay using some or all of the following remedial actions;

1. Increase construction manpower in such quantities and crafts as necessary to eliminate the backlog of work and meet the current Contract Completion Date.
 2. Increase the number of working hours per shift, shifts per working day, working days per week, the amount of construction equipment, or any combination thereof to eliminate the backlog of Work.
 3. Reschedule the Work in conformance with the Specification requirements.
- B.** Prior to implementing any of the above actions, the DESIGN BUILD ENTITY shall notify THE CITY and obtain approval from THE CITY. If such actions are approved, the Schedule revisions shall be incorporated by the DESIGN BUILD ENTITY into the Network Diagram before the next Monthly Schedule Update is due.
- C.** Under no circumstances will the addition of equipment or construction forces, increasing the Working hours or any other method, manner, or procedure to return to the contractually required Contract Completion Date be considered justification for a Change Order or be treated as acceleration where the need for a recovery schedule has been caused by the DESIGN BUILD ENTITY and/or its Subcontractors or Suppliers, at any tier.
- D.** THE CITY may elect to withhold progress payments until the DESIGN BUILD ENTITY'S progress indicates that the milestone date(s) and/or the Contract Completion Date will be met.

9.0 Schedule Time Extensions

- A.** When Change Orders or delays are experienced by the DESIGN BUILD ENTITY and a time extension is requested, the DESIGN BUILD ENTITY shall submit to THE CITY, a written Time Impact Analysis illustrating the influence of all changes or all delays on the current Contract Completion Date. The Time Impact Analysis shall be based on the most recent updated schedule Analysis approach. This Time Impact Analysis shall incorporate all delays (including THE CITY, DESIGN BUILD ENTITY, and Third-Party delays without exception) in the time frame they occurred with actual logic ties. The data shall be obtained from the most recent accepted Baseline Schedule or Monthly Schedule Update as of the time the Preliminary Change Order, Emergency Change Order, Unilateral Change Order, or Allowance Order was issued to the DESIGN BUILD ENTITY. The Time Impact Analysis shall be created as an early start schedule and shall use the original activity durations for all incomplete work and the actual logic driving all activities. All requests for time extensions shall be based upon this T.I.A. The critical path will be established, and all delays caused by THE CITY on the critical path will be identified. The time extension will be based solely upon the cumulative duration of all THE CITY and Third Party caused delays (as set forth in other sections of the GENERAL CONDITIONS) which are on the critical path. Any time extensions to the project Interim Milestone Dates shall be non-compensable.
- B.** Time extensions will be granted only to the extent that equitable time adjustments for the activity or activities affected exceed the total or remaining float along the critical path of activities at the time of actual delay, or at the time the Preliminary Change Order, the Emergency Change Order, the Unilateral Change Order, or the Allowance Order was issued to the DESIGN BUILD ENTITY. Float or slack time is not for the exclusive use or benefit of THE CITY or the DESIGN BUILD ENTITY, but is an expiring resource available to all parties as needed to meet Contract milestones and the Contract Completion Date. Time extensions shall not be granted, nor delay damages paid until;
1. A delay occurs which is beyond the control and without the fault or negligence of

- the DESIGN BUILD ENTITY and its Subcontractors or Suppliers, at any tier; and
2. Which extends actual performance of the Work beyond the applicable current Contract Completion Date and the most recent date predicted for completion of the project on the approved Monthly Schedule Update, current as of the time of the delay or as of the time of issuance of the Preliminary Change Order, the Emergency Change Order, the Unilateral Change Order, or the Allowance Order was issued to the DESIGN BUILD ENTITY.
- C. Each Time Impact Analysis shall be submitted in triplicate, within five(5) working days after a delay occurs, or issuance of the Preliminary Change Order, Emergency Change Order, Time and Materials Change Order, or Unilateral Change Order. If the DESIGN BUILD ENTITY does not submit a Time Impact Analysis for a specific Change Order or delay within the specified period of time, the DESIGN BUILD ENTITY shall be deemed to have irrevocably waived any rights to additional time and cost.
 - D. Since float time within the Schedule is jointly owned, it is acknowledged and agreed by the DESIGN BUILD ENTITY that THE CITY caused delays on the project may be offset by THE CITY caused time savings (including, but not limited to: critical path submittals returned in less time than allowed for in the Contract, approval of substitution requests which result in a savings of time along the critical path for the DESIGN BUILD ENTITY, etc.). In such an event, the DESIGN BUILD ENTITY shall not be entitled to receive an extension of time or delay damages until all the time savings caused by the CITY are exceeded, and the Contract Completion Date is also exceeded.
 - E. Approval or rejection of each Time Impact Analysis by THE CITY shall be made within ten (10) working days after receipt of each Time Impact Analysis, unless subsequent meetings and negotiations are necessary. Upon approval, a copy of a Time Impact Analysis signed by THE CITY shall be returned to the DESIGN BUILD ENTITY for incorporation into the next Monthly Schedule Update.
 - F. Upon mutual agreement by both parties, fragnets illustrating the influence of Change Orders and delays shall be incorporated into the Schedule during the first update after agreement is reached.
 - G. In the event the DESIGN BUILD ENTITY does not agree with the decision of THE CITY regarding the impact of a change or delay, it shall be resolved in accordance with CLAIMS AND PROTESTS of the GENERAL CONDITIONS.

10.0 Submittal Of "As-Built" Schedule

- A. As a condition precedent to any release of retention, the last update to the Schedule submitted shall be identified by the DESIGN BUILD ENTITY as the "As-Built Schedule". The "As-Built Schedule" shall reflect the exact manner in which the project was actually constructed (including start and completion dates, activities, sequences, and logic) and shall be signed and certified by the DESIGN BUILD ENTITY'S Project Manager and Construction Scheduler as being a true reflection of the way in which the project was actually constructed.

Exhibit 3

Estimate Summary

ORION CONSTRUCTION

Job Code:251010 OCEANSIDE FINAL GMP REV1

Description:OCEANSIDE MESA GARRISON FORCE MAIN, EL CORAZON LIFT STATION, MISSION AVE. LIFT STATION FORCE MAIN REPLACEMENT, AND LAND OUTFALL REPLACEMENT.

From Cost Item: 1

To Cost Item: 8

Cost Item									
CBS	Quantity	UM	Description	Days	UM/Day	Cost Source	Currency	Unit Cost	Total Cost
1	1	LS	ENVIRONMENTAL AND OTHER PERMITTING RELATED COSTS	0.00	0.00	Detail	U.S. Dollar	\$175,000.00	\$175,000.00
2	1	LS	QUALITY CONTROL TESTING	0.00	0.00	Detail	U.S. Dollar	\$1,153,252.00	\$1,153,252.00
3	1	LS	CONSTRUCTION COST OF WORK	4955.90	0.00	Detail	U.S. Dollar	\$66,112,835.14	\$66,112,835.14
3.1	1	LS	OMG LIFT STATION	1547.88	0.00	Detail	U.S. Dollar	\$22,010,766.73	\$22,010,766.73
3.1.1	1	LS	DIV 2 - SITE WORK	1178.88	0.00	Detail	U.S. Dollar	\$7,168,432.56	\$7,168,432.56
3.1.2	3260	CY	DIV 3 - CONCRETE	184.00	17.72	Detail	U.S. Dollar	\$1,774.73	\$5,785,621.77
3.1.3	1	LS	DIV 4 - MASONRY	0.00	0.00	Detail	U.S. Dollar	\$246,758.40	\$246,758.40
3.1.4	1	LS	DIV 5 - METALS	12.50	0.08	Detail	U.S. Dollar	\$1,114,120.42	\$1,114,120.42
3.1.5	1	LS	DIV 6 - WOOD AND PLASTICS	4.00	0.25	Detail	U.S. Dollar	\$210,761.30	\$210,761.30
3.1.6	1	LS	DIV 7 - THERMAL AND MOISTURE PROTECTION	0.00	0.00	Detail	U.S. Dollar	\$469,370.41	\$469,370.41
3.1.7	1	LS	DIV 8 - HOLLOW METAL DOORS AND FRAMES	0.00	0.00	Detail	U.S. Dollar	\$162,027.00	\$162,027.00
3.1.8	1	LS	DIV 9 - FINISHES	5.00	0.20	Detail	U.S. Dollar	\$1,116,293.64	\$1,116,293.64
3.1.9	1	LS	DIV 10 - SPECIALTIES	4.00	0.25	Detail	U.S. Dollar	\$23,361.75	\$23,361.75
3.1.10	1	LS	DIV 11 - EQUIPMENT	59.50	0.02	Detail	U.S. Dollar	\$2,127,490.70	\$2,127,490.70
3.1.11	1	LS	DIV 14 - HOIST AND TROLLEYS	6.00	0.17	Detail	U.S. Dollar	\$421,413.30	\$421,413.30
3.1.12	1	LS	DIV 15 - MECHANICAL	69.00	0.01	Detail	U.S. Dollar	\$1,212,579.03	\$1,212,579.03
3.1.13	1	LS	DIV 16 - ELECTRICAL	25.00	0.04	Detail	U.S. Dollar	\$1,883,060.45	\$1,883,060.45
3.1.14	1	LS	DIV 17 - INSTRUMENTATION AND CONTROLS	0.00	0.00	Detail	U.S. Dollar	\$0.00	\$0.00
3.1.15	1	LS	OMGLS PERMANENT BYPASS	0.00	0.00	Plug	U.S. Dollar	\$69,476.00	\$69,476.00
3.2	1	LS	PIPE AND FITTING BUYOUT	0.00	0.00	Detail	U.S. Dollar	\$162,975.80	\$162,975.80
3.3	1	LS	MOBILIZATION / DEMOBILIZATION	245.00	0.00	Detail	U.S. Dollar	\$848,820.31	\$848,820.31
3.4	1	LS	SEGMENT 1 NEW PUMP STATION TO END OF MESA	1189.19	0.00	Detail	U.S. Dollar	\$14,973,728.38	\$14,973,728.38
3.4.1	1	LS	SWPPP	52.20	0.02	Detail	U.S. Dollar	\$101,335.00	\$101,335.00
3.4.2	980	LF	OMG FORCE MAIN (STA 100+00 - STA 101+25, STA 102+44 - STA 110+99)	105.52	9.29	Detail	U.S. Dollar	\$907.32	\$889,173.70
3.4.3	2508	LF	30" PVC LAND OUTFALL MAIN (STA 500+18 - STA 508+24, STA 508+92 - STA 508+92)	216.79	11.57	Detail	U.S. Dollar	\$821.58	\$2,060,528.12
3.4.4	1258	LF	27"30" GRAVITY SEWER MAIN (STA 700+00 - STA 701+81, STA 702+44 - STA 712+07)	151.00	8.33	Detail	U.S. Dollar	\$1,127.51	\$1,418,411.30
3.4.5	248	LF	8" GRAVITY SEWER IN STREET (STA 800+00 TO 802+48)	29.00	8.55	Detail	U.S. Dollar	\$1,037.02	\$257,181.96
3.4.6	662	LF	24"DUAL 18" GRAVITY SEWER (STA 900+00 - STA 904+80, STA 905+98 - STA 907+80)	57.50	11.51	Detail	U.S. Dollar	\$1,087.23	\$719,745.49
3.4.7	771	LF	18" BUCCANEER STATION LINE IN NEW OMG LIFT STATION ROAD (STA 1200+00 - STA 1207+71)	29.43	26.20	Detail	U.S. Dollar	\$375.74	\$289,697.07
3.4.8	590	LF	12" WATER MAIN AND APPURTENANCES (STA 1300+00 - STA 1305+90)	51.25	11.51	Detail	U.S. Dollar	\$605.57	\$357,287.84
3.4.9	300	LF	12" WATER MAIN AND APPURTENANCES (STA 1305+90 - STA 1308+90)	20.50	14.63	Detail	U.S. Dollar	\$523.06	\$156,918.24
3.4.10	1477	LF	12" WATER MAIN AND APPURTENANCES (STA 1308+90 - STA 1323+67)	114.00	12.96	Detail	U.S. Dollar	\$604.60	\$892,995.06
3.4.11	113	LF	JACK AND BORE (30" GRAVITY SEWER STA 701+31 - STA 702+44)	34.00	3.32	Detail	U.S. Dollar	\$4,864.35	\$549,671.78
3.4.12	119	LF	JACK AND BORE (OMGFM STA 101+25 - STA 102+44, LOM STA 507+73 - STA 508+92)	40.00	2.98	Detail	U.S. Dollar	\$6,903.19	\$821,479.90
3.4.13	118	LF	32" DUAL PIPE JACK AND BORE (DUAL 18" GRAVITY SEWER STA 904+80 - STA 905+98)	108.00	1.09	Detail	U.S. Dollar	\$16,950.45	\$2,000,153.09

Estimate Summary

ORION CONSTRUCTION

Job Code:251010 OCEANSIDE FINAL GMP REV1

Description:OCEANSIDE MESA GARRISON FORCE MAIN, EL CORAZON LIFT STATION, MISSION AVE. LIFT STATION FORCE MAIN REPLACEMENT, AND LAND OUTFALL REPLACEMENT.

From Cost Item: 1

To Cost Item: 8

Cost Item										
CBS	Position Code	Quantity	UM	Description	Days	UM/Day	Cost Source	Currency	Unit Cost	Total Cost
	3.4.14	859	LF	SLIPLINE 36" OMGFM (STA 1400+00 - STA 1408+59)	82.00	10.48	Detail	U.S. Dollar	\$720.56	\$618,956.92
	3.4.15	1	LS	CIPP 36" LINE FROM MESA DRIVE THROUGH THE TUNNEL (STA 1408+59 - STA 1417+59)	70.50	0.01	Detail	U.S. Dollar	\$2,877,219.98	\$2,877,219.98
	3.4.16	1200	LF	ABANDON 8" PIPE	3.00	400.00	Detail	U.S. Dollar	\$22.90	\$27,480.00
	3.4.17	2500	LF	ABANDON 24" PIPE	5.00	500.00	Detail	U.S. Dollar	\$25.57	\$63,924.00
	3.4.18	1	LS	SURFACE IMPROVEMENTS	19.50	0.05	Detail	U.S. Dollar	\$511,568.94	\$511,568.94
	3.4.19	200	LF	BUENA VISTA LIFT STATION PIPING (INCLUDING PAVING)	0.00	0.00	Plug	U.S. Dollar	\$1,800.00	\$360,000.00
	3.5	1	LS	SEGMENT 2 PORTAL TO 76 CROSSING	325.75	0.00	Detail	U.S. Dollar	\$3,179,349.07	\$3,179,349.07
	3.5.1	1	LS	SEGMENT 2 SWPPP	18.00	0.06	Detail	U.S. Dollar	\$79,717.89	\$79,717.89
	3.5.2	1	LS	CLEAR AND GRUB	15.25	0.07	Detail	U.S. Dollar	\$145,306.00	\$145,306.00
	3.5.3	1	LS	36" OMG MAIN FROM NORTH SIDE OF TUNNEL TO MISSION AVENUE (STA	126.50	0.01	Detail	U.S. Dollar	\$1,077,011.18	\$1,077,011.18
	3.5.4	1	LS	30" LAND OUTFALL MAIN FROM PROTAL TO 76 (STA 538+49 - STA 563+02)	91.50	0.01	Detail	U.S. Dollar	\$795,513.14	\$795,513.14
	3.5.5	1	LS	36" HOBAS PIPE (STA 1417+59 - STA 1421+19)	24.75	0.04	Detail	U.S. Dollar	\$421,221.72	\$421,221.72
	3.5.6	1	LS	MISC IMPROVEMENTS	49.75	0.02	Detail	U.S. Dollar	\$660,579.14	\$660,579.14
	3.6	1	LS	SEGMENT 3 76 CROSSING	244.25	0.00	Detail	U.S. Dollar	\$1,507,188.38	\$1,507,188.38
	3.6.1	173	LF	36" OMG MAIN (STA 156+56 - STA 158+29)	69.50	2.49	Detail	U.S. Dollar	\$3,392.31	\$586,869.14
	3.6.2	172	LF	30" LOM (STA 563+02 - STA 564+74)	69.50	2.47	Detail	U.S. Dollar	\$3,415.13	\$587,402.52
	3.6.3	2	MO	CALTRANS NIGHT WORK	100.00	0.02	Detail	U.S. Dollar	\$123,200.00	\$246,400.00
	3.6.4	1	LS	CALTRANS INSPECTION FEES	0.00	0.00	Detail	U.S. Dollar	\$50,000.00	\$50,000.00
	3.6.5	1	LS	SURFACE IMPROVEMENTS	5.25	0.19	Detail	U.S. Dollar	\$36,516.72	\$36,516.72
	3.7	1	LS	SEGMENT 4 MALS LIFT STATION TO SAN LUIS REY RIVER CROSSING	731.65	0.00	Detail	U.S. Dollar	\$9,706,058.59	\$9,706,058.59
	3.7.1	1	LS	SEGMENT 4 SWPPP	35.00	0.03	Detail	U.S. Dollar	\$167,204.86	\$167,204.86
	3.7.2	1	LS	CLEAR AND GRUB	35.25	0.03	Detail	U.S. Dollar	\$334,088.00	\$334,088.00
	3.7.3	5784	LF	36" OMG MAIN FROM NORTH OF 76 TO SAN LUIS REY RIVER (STA 158+29 - STA 182+76)(STA 184+00 - STA 210+78, STA 229+00 - STA 235+59)	180.00	32.13	Detail	U.S. Dollar	\$412.53	\$2,386,046.87
	3.7.4	1	LS	24" MALS LIFT STATION TO SAN LUIS	206.52	0.00	Detail	U.S. Dollar	\$2,305,580.53	\$2,305,580.53
	3.7.5	1	LS	30" LAND OUTFALL MAIN (STA 564+74 - STA STA 588+99, STA 590+26 - STA 617+17)	191.75	0.01	Detail	U.S. Dollar	\$2,307,554.78	\$2,307,554.78
	3.7.6	1	LS	16" SEWER RELOCATE (STA 1000+00 - STA 1000+69)	14.50	0.07	Detail	U.S. Dollar	\$113,076.14	\$113,076.14
	3.7.7	150	LF	10" WATER RELOCATE (STA 1100+00 - STA 1101+50)	18.50	8.11	Detail	U.S. Dollar	\$1,113.30	\$166,995.31
	3.7.8	1	LS	INSTALL PIPE BRIDGES OVER FIRESIDE CANAL	28.00	0.04	Detail	U.S. Dollar	\$1,233,102.32	\$1,233,102.32
	3.7.9	4500	SF	PAVE ROAD CROSSINGS	4.00	1125.00	Detail	U.S. Dollar	\$17.56	\$79,025.61
	3.7.10	1	LS	SURFACE IMPROVEMENTS	12.38	0.08	Detail	U.S. Dollar	\$294,693.76	\$294,693.76
	3.7.11	1	LS	CYPRESS POINT REPAIRS	5.75	0.17	Detail	U.S. Dollar	\$43,690.42	\$43,690.42
	3.7.12	1	LS	MALS/OMGFM CONNECTION AT STA 300+00	0.00	0.00	Plug	U.S. Dollar	\$275,000.00	\$275,000.00
	3.8	1	LS	SEGMENT 5 SAN LUIS REY RIVER CROSSING	61.38	0.02	Detail	U.S. Dollar	\$7,083,014.01	\$7,083,014.01
	3.8.1	1754	LS	24" MALS HDD (STA 374+92 - STA 392+45)	8.00	219.25	Detail	U.S. Dollar	\$944.19	\$1,656,116.72
	3.8.2	1757	LS	30" LOM HDD (STA 629+61 - STA 647+18)	8.00	219.63	Detail	U.S. Dollar	\$1,385.46	\$2,434,258.17
	3.8.3	1754	LF	36" OMGFM HDD (STA 234+75 - STA 252+29)	8.00	219.25	Detail	U.S. Dollar	\$1,622.69	\$2,846,199.12
	3.8.4	299	HR	HAUL SPOILS	37.38	8.00	Detail	U.S. Dollar	\$210.00	\$62,790.00
	3.8.5	239	LD	DUMP FEES FOR SPOILS	0.00	0.00	Detail	U.S. Dollar	\$350.00	\$83,650.00

Estimate Summary

ORION CONSTRUCTION

Job Code:251010 OCEANSIDE FINAL GMP REV1

Description:OCEANSIDE MESA GARRISON FORCE MAIN, EL CORAZON LIFT STATION, MISSION AVE. LIFT STATION FORCE MAIN REPLACEMENT, AND LAND OUTFALL REPLACEMENT.

From Cost Item: 1

To Cost Item: 8

Cost Item

CBS	Position Code	Quantity	UM	Description	Days	UM/Day	Cost Source	Currency	Unit Cost	Total Cost
	3.9	1	LS	SEGMENT 6 SAN LUIS REY HDD TO BRIDGE CROSSING	133.72	0.01	Detail	U.S. Dollar	\$1,548,576.56	\$1,548,576.56
	3.9.1	1	LS	SEGMENT 6 SWPPP	9.00	0.11	Detail	U.S. Dollar	\$42,109.64	\$42,109.64
	3.9.2	1	LS	CLEAR AND GRUB	4.63	0.22	Detail	U.S. Dollar	\$42,566.00	\$42,566.00
	3.9.3	1279	LF	36" OMG MAIN (STA 251+93 - STA 264+72)	35.50	36.03	Detail	U.S. Dollar	\$334.99	\$428,455.81
	3.9.4	1	LS	24" MALS FORCE MAIN (1,416 LF) (STA 392+04 - 404+96)	34.50	0.03	Detail	U.S. Dollar	\$376,636.61	\$376,636.61
	3.9.5	1201	LS	30" LAND OUTFALL MAIN (STA 646+81 - STA 658+82)	37.00	32.46	Detail	U.S. Dollar	\$336.36	\$403,965.20
	3.9.6	1	LS	MISC IMPROVEMENTS	13.10	0.08	Detail	U.S. Dollar	\$254,843.30	\$254,843.30
	3.10	1	LS	SEGMENT 7 PILGRIM CREEK BRIDGE CROSSING	15.00	0.07	Detail	U.S. Dollar	\$765,189.10	\$765,189.10
	3.10.1	1	LS	INSTALL PIPE BRIDGE NO.3 AT PILGRIM CREEK	15.00	0.07	Detail	U.S. Dollar	\$765,189.10	\$765,189.10
	3.11	1	LS	SEGMENT 8 PILGRIM CREEK BRIDGE CROSSING TO SLRWRF	394.08	0.00	Detail	U.S. Dollar	\$4,291,658.00	\$4,291,658.00
	3.11.1	1	LS	SWPPP	18.00	0.06	Detail	U.S. Dollar	\$34,585.00	\$34,585.00
	3.11.2	1	LS	CLEAR AND GRUB	1.50	0.67	Detail	U.S. Dollar	\$17,818.00	\$17,818.00
	3.11.3	1	LS	OMG FORCE MAIN (STA 266+17 TO STA 268+17, STA 269+59 TO STA 279+89)	146.25	0.01	Detail	U.S. Dollar	\$1,408,787.16	\$1,408,787.16
	3.11.4	1	LS	24" MALS FORCE MAIN (STA 406+36 - STA 408+25, STA 409+67 - STA 420+03)	135.33	0.01	Detail	U.S. Dollar	\$1,156,140.60	\$1,156,140.60
	3.11.5	142	LF	84" JACK AND BORE (OMGFM STA 268+17 - 269+59, MALS 408+25 - 409+67)	83.00	1.71	Detail	U.S. Dollar	\$7,851.04	\$1,114,847.09
	3.11.6	1	LS	INSTALL VALVES/FITTINGS ON MALS AND OMGFM FOR FINAL CONNECTIONS	5.00	0.20	Detail	U.S. Dollar	\$262,098.48	\$262,098.48
	3.11.7	1	LS	MISC. IMPROVEMENTS	5.00	0.20	Detail	U.S. Dollar	\$297,381.67	\$297,381.67
	3.12	1	LS	HYDROTESTING	68.00	0.01	Detail	U.S. Dollar	\$327,698.15	\$327,698.15
	3.12.1	1	LS	HYDROTEST OMGFM	21.00	0.05	Detail	U.S. Dollar	\$107,566.05	\$107,566.05
	3.12.2	1	LS	HYDROTEST LOM	19.00	0.05	Detail	U.S. Dollar	\$95,160.00	\$95,160.00
	3.12.3	5784	LF	HYDROTEST MALS LINE	16.00	361.50	Detail	U.S. Dollar	\$13.89	\$80,332.10
	3.12.4	1	LS	HYDROTEST 27"/30" GRAVITY SEWER MAIN	2.00	0.50	Detail	U.S. Dollar	\$7,440.00	\$7,440.00
	3.12.5	1	LS	HYDROTEST 8" GRAVITY SEWER	2.00	0.50	Detail	U.S. Dollar	\$7,440.00	\$7,440.00
	3.12.6	1	LS	HYDROTEST 24"/DUAL 18" GRAVITY	2.00	0.50	Detail	U.S. Dollar	\$7,440.00	\$7,440.00
	3.12.7	1	LS	HYDROTEST 18" BUCANEER LINE	2.00	0.50	Detail	U.S. Dollar	\$7,440.00	\$7,440.00
	3.12.8	1	LS	HYDROTEST SLIPLINING PIPE	2.00	0.50	Detail	U.S. Dollar	\$7,440.00	\$7,440.00
	3.12.9	1	LS	HYDROTEST 36" CIPP LINE	2.00	0.50	Detail	U.S. Dollar	\$7,440.00	\$7,440.00
	3.13	1	LS	2% EQUIPMENT REDUCTION	0.00	0.00	Plug	U.S. Dollar	-\$292,187.94	-\$292,187.94
	4	1	LS	COST OF WORK CONTINGENCY	0.00	0.00	Detail	U.S. Dollar	\$1,116,383.74	\$964,391.74
	4.1	1	LS	SUPPLIER CONTINGENCIES	0.00	0.00	Detail	U.S. Dollar	\$792,566.91	\$792,566.91
	4.1.1	1	LS	FONTAINE AQUANOX	0.00	0.00	Plug	U.S. Dollar	\$4,925.38	\$4,925.38
	4.1.2	1	LS	MH BUILDERS	0.00	0.00	Plug	U.S. Dollar	\$49,305.16	\$49,305.16
	4.1.3	1	LS	FERGUSON	0.00	0.00	Plug	U.S. Dollar	\$509,462.12	\$509,462.12
	4.1.4	1	LS	ROBERTSONS	0.00	0.00	Plug	U.S. Dollar	\$29,615.58	\$29,615.58
	4.1.5	1	LS	JEB SAND AND GRAVEL/MARTIN MARIETTA	0.00	0.00	Plug	U.S. Dollar	\$199,258.67	\$199,258.67
	4.2	1	LS	SUB CONTINGENCIES	0.00	0.00	Detail	U.S. Dollar	\$323,816.83	\$171,824.83
	4.2.1	1	LS	TEMECULA DRYWALL	0.00	0.00	Plug	U.S. Dollar	\$16,202.70	\$16,202.70
	4.2.2	1	LS	HURRICANE AND POWAY	0.00	0.00	Plug	U.S. Dollar	\$30,541.96	\$30,541.96
	4.2.3	1	LS	DAVIS FRAMING	0.00	0.00	Plug	U.S. Dollar	\$8,757.98	\$8,757.98
	4.2.4	1	LS	DAVE WHIPPLE	0.00	0.00	Plug	U.S. Dollar	\$8,602.32	\$8,602.32
	4.2.5	1	LS	THE HDD COMPANY	0.00	0.00	Plug	U.S. Dollar	\$65,990.38	\$65,990.38
	4.2.6	1	LS	SPECHT	0.00	0.00	Plug	U.S. Dollar	\$19,331.27	\$19,331.27
	4.2.7	1	LS	TITAL STEEL	0.00	0.00	Plug	U.S. Dollar	\$22,398.22	\$22,398.22
	5	1	LS	ALLOWANCES	0.00	0.00	Detail	U.S. Dollar	\$500,000.00	\$500,000.00
	5.1	1	LS	SPECIAL PERMITS OR FEES	0.00	0.00	Plug	U.S. Dollar	\$25,000.00	\$25,000.00
	5.2	1	LS	SDG&E UTILITY RELOCATIONS	0.00	0.00	Plug	U.S. Dollar	\$250,000.00	\$250,000.00

Estimate Summary

ORION CONSTRUCTION

Job Code:251010 OCEANSIDE FINAL GMP REV1

Description:OCEANSIDE MESA GARRISON FORCE MAIN, EL CORAZON LIFT STATION, MISSION AVE. LIFT STATION FORCE MAIN REPLACEMENT, AND LAND OUTFALL REPLACEMENT.

From Cost Item: 1

To Cost Item: 8

Cost Item										
CBS	Position Code	Quantity	UM	Description	Days	UM/Day	Cost Source	Currency	Unit Cost	Total Cost
	5.3	1	LS	SCOPE CHANGES DURING CONSTRUCTION	0.00	0.00	Plug	U.S. Dollar	\$125,000.00	\$125,000.00
	5.5	1	LS	NOISE MITIGATION MEASURES (OTHER THAN FOR PIPE INSTALLATION FROM STA 1417+59 - STA 1421+19)	0.00	0.00	Detail	U.S. Dollar	\$100,000.00	\$100,000.00
6		1	LS	FIXED GENERAL CONDITION COSTS	5603.00	0.00	Detail	U.S. Dollar	\$9,318,755.88	\$9,470,747.88
	6.1	1	LS	FIXED GENERAL CONDITION COSTS	4845.00	0.00	Detail	U.S. Dollar	\$7,168,166.88	\$7,168,166.88
	6.2	1	LS	FIELD SUPPORT SERVICES	758.00	0.00	Detail	U.S. Dollar	\$1,255,889.00	\$1,407,881.00
	6.2.1	30	MO	STORAGE TRAILERS (8 STORAGE TRAILERS AT \$100)	0.00	0.00	Plug	U.S. Dollar	\$800.00	\$24,000.00
	6.2.2	30	MO	RENT SPACE FIELD OFFICE/YARD	0.00	0.00	Plug	U.S. Dollar	\$7,000.00	\$210,000.00
	6.2.3	30	MO	TEMPARARY YARD FENCE	0.00	0.00	Plug	U.S. Dollar	\$500.00	\$15,000.00
	6.2.4	4	EA	TEMP POWER TO FIELD OFFICE AND LIFT STATION	0.00	0.00	Plug	U.S. Dollar	\$25,000.00	\$100,000.00
	6.2.5	60	MO	UTILITY FEES TO FIELD OFFICE	0.00	0.00	Plug	U.S. Dollar	\$500.00	\$30,000.00
	6.2.6	60	MO	TOILETS	0.00	0.00	Plug	U.S. Dollar	\$3,000.00	\$180,000.00
	6.2.7	1	LS	CONSTRUCTION WATER BACKFLOW AND HOOK UP	0.00	0.00	Plug	U.S. Dollar	\$30,000.00	\$30,000.00
	6.2.8	60	MO	POTABLE WATER	0.00	0.00	Plug	U.S. Dollar	\$125.00	\$7,500.00
	6.2.9	4	EA	YARD SWPPP (1 ACRE LOT)	98.00	0.04	Detail	U.S. Dollar	\$74,352.25	\$297,409.00
	6.2.10	30	MO	OFFICE TRAILERS	0.00	0.00	Plug	U.S. Dollar	\$3,500.00	\$105,000.00
	6.2.11	1	LS	YARD SUPPORT	660.00	0.00	Detail	U.S. Dollar	\$249,480.00	\$249,480.00
	6.2.12	30	MO	INTERNET (STARLINK)	0.00	0.00	Plug	U.S. Dollar	\$250.00	\$7,500.00
	6.2.13	36	MO	OFFICE TRAILER FOR CITY OF OCEANSIDE/NV5	0.00	0.00	Detail	U.S. Dollar	\$4,222.00	\$151,992.00
	6.3	160	HR	ENVIRONMENTAL TRAINING FOR CREWS (40 JV EMPLOYEES 4 HOURS EACH)	0.00	0.00	Plug	U.S. Dollar	\$120.00	\$19,200.00
	6.4	1	LS	INCREASED LABOR COSTS	0.00	0.00	Plug	U.S. Dollar	\$575,500.00	\$575,500.00
	6.5	1	LS	PREDICTED FUEL SURCHARGE	0.00	0.00	Plug	U.S. Dollar	\$300,000.00	\$300,000.00
7		1	LS	DESIGN BUILDERS FEE PHASE 2 12.5% FOR JV AND 11.5% FOR SUBS	0.00	0.00	Detail	U.S. Dollar	\$9,514,332.00	\$9,514,332.00
	7.1	1	LS	12.5% JV MARK-UP	0.00	0.00	Plug	U.S. Dollar	\$6,263,327.00	\$6,263,327.00
	7.2	1	LS	11.5% SUBCONTRACTOR MARK-UP	0.00	0.00	Plug	U.S. Dollar	\$3,251,005.00	\$3,251,005.00
8		1	LS	PREMIUMS FOR BONDS AND INSURANCE PHASE 2 (2.5%)	0.00	0.00	Plug	U.S. Dollar	\$2,197,264.00	\$2,197,264.00
	Report Total:									\$90,087,822.76

Category	Total
Labor	\$23,747,721.45
Owned Equipment	\$14,317,209.27
Rented Equipment	\$976,574.40
Supplies	\$667,408.31
Materials	\$8,140,317.59
Subcontract	\$28,269,614.45
Fees	\$13,468,977.28
Allowance	\$500,000.00
Total	\$90,087,822.76

1.0 THE REQUIREMENT

A. It is expressly understood and agreed that the time of beginning, the rate of progress, and the time of completion of the Work are of the essence of this Contract. Within five (5) calendar days after Limited Notice to Proceed (or Notice to Proceed), the DESIGN-BUILD ENTITY shall submit a Preliminary Baseline Schedule for review. Within thirty (30) calendar days, the DESIGN-BUILD ENTITY shall submit a detailed, cost-loaded Baseline Schedule for CITY acceptance. The Baseline Schedule shall be accepted prior to full mobilization of major construction activities unless otherwise authorized. Although this is a Design-Build Contract, the design is substantially complete at the time of Notice to Proceed. The Schedule shall therefore focus on construction execution. Design activities shall be limited to shop drawings, coordination, and residual design elements, and shall not be used to justify delays unless explicitly required by the Contract Documents or approved by the CITY.

B. General

1. Schedule Methodology

The scheduling method to be used shall be a Critical Path Method schedule in the form of an activity-on-node Precedence Diagram Network (PDN), capable of identifying the critical path. The principles and definitions of the terms used herein shall be as set forth in the Associated General DESIGN BUILD ENTITY'S publication "CPM in Construction", latest edition. To the extent there are conflicts between the Associated General DESIGN BUILD ENTITY'S publication and the Specifications, the Specifications shall govern. The Schedule shall represent the Contractor's complete and realistic plan for construction execution and shall be used as the basis for evaluating progress, delays, and payment.

2. Work Breakdown Structure

The DESIGN BUILD ENTITY shall submit to the CITY for approval, the following:

- a. A Work breakdown structure.
- b. The associated alphanumeric coding structure to implement the Work Breakdown Structure.
- c. The activity identification system for labeling all Work activities.
- d. The Work Breakdown Structure shall include segmentation by geographic areas or construction zones (e.g., pipeline reaches, tie-in locations), and shall distinguish procurement, construction, and closeout phases.

3. Scheduling System

The DESIGN BUILD ENTITY shall use Primavera P6 (latest edition) and a hardware system commensurate with the size of the program. This shall be referred to as the Scheduling System. The Scheduling System shall be capable of handling, processing, printing, and plotting data to satisfy all requirements of this Section.

C. DESIGN BUILD ENTITY'S Construction Schedule

1. The Schedule shall show the sequence and interdependence of activities required for complete performance of the Work, beginning with the date of the Notice to Proceed and concluding with the Contract Completion Date based on the completion time (working days) allowed in the Contract. The Schedule shall include all construction, procurement, submittal, utility coordination, and

Exhibit 4 – Scheduling Requirements

- permitting activities required to complete the Work.
2. Pursuant to the float sharing requirements of the Contract, the use of float suppression techniques such as preferential sequencing, special lead/lag logic restraints, extended activity times, or imposed dates shall be cause for rejection of the Schedule and any revisions or updates. The use of float time disclosed or implied by the use of alternative float suppression techniques shall be shared as directed by the CITY.
 3. If the DESIGN BUILD ENTITY submits a Baseline Schedule showing completion of the Work more than thirty (30) calendar days in advance of the Contract Completion Date, the DESIGN BUILD ENTITY agrees that if the Baseline Schedule shows completion earlier than the Contract Completion Date, the difference shall be considered project float. The Contract Completion Date shall not be adjusted based solely on early completion shown in the Schedule.
 4. Comments made by the CITY on the Schedule, during review, will not relieve the DESIGN BUILD ENTITY from compliance with requirements of the Contract Documents. To the extent that there are any conflicts between the approved Schedule and the requirements of the Contract Documents, the Contract Documents shall govern.
 5. If requested by the CITY at any time during the project, the DESIGN BUILD ENTITY shall provide a highly detailed, short-term schedule for specific crucial items (conflicting work at the site, shut-downs, tie-ins, start-up, etc.).

2.0 NETWORK DETAILS

- A. The Schedule shall include time-scaled network diagrams, based on working days, as well as computer tabulations. Construct the Schedule to show the order in which the Work will be carried out, to indicate restrictions of access, and to show availability of Work areas, availability and use of manpower, materials, and equipment.
- B. Utilize the Schedule in planning, scheduling, coordinating, and performing the Work under the Contract (including all activities of Subcontractors, equipment vendors, and Suppliers).
- C. Determine logic based on which activity must be completed before a successor can start; maximum concurrent work; and manpower or equipment constraints that prevent concurrent work.
- D. The Schedule shall provide the CITY with a tool to monitor and follow the progress of all phases of the Work. The Schedule submitted to the CITY shall comply with all limits imposed by the scope of Work, with all contractually specified intermediate milestone and completion dates, and with all constraints, restraints, or sequences included in the Contract. The degree of detail shall include factors to the satisfaction of the CITY, including, but not limited to:
 1. Physical breakdown of the project.
 2. Contract milestones and completion dates, substantial completion dates, constraints, restraints, sequences of Work shown in the Contract, the planned substantial completion date, and the final completion date.
 3. Type of Work to be performed, the sequences, and the labor trades involved.
 4. Submittal activities shall include preparation, submittal, review, resubmittal, and approval cycles, and shall be logically tied to procurement and installation activities.
 5. Deliveries of the CITY furnished equipment and/or materials in accordance with the dates or schedule windows of such items set forth in the Contract or furnished by the CITY, or items to be salvaged and delivered to the CITY.

Exhibit 4 – Scheduling Requirements

6. Preparation, submittal and approval of Shop and/or Working Drawings and material samples showing a **[thirty (30) (for WW)]**~~Twenty-one (21) (for MF)~~ day minimum time specified for the CITY's review of normal or routine submittals and a thirty (30) day review time for all major submittals, so identified in the technical specifications, and the same time frame shall be allowed for at least one (1) resubmittal on all major submittals so identified in the Contract Documents. Assumed review durations shall be identified in the Schedule Narrative and shall not be reduced without CITY concurrence.
7. These activities shall be represented as complete logic chains including submittal, review, comment resolution, and final approval.
8. Plans for all subcontract Work, **[concrete placement sequence, structural steel, plumbing, heat, ventilation, air conditioning, electrical, etc.]**.
9. Assignment of responsibility for performing specific activities,
10. Access to and availability of Work areas, including all anticipated plant shutdowns, if applicable.
11. Identification of interfaces and dependencies with preceding, concurrent, and follow-on CONTRACTORS and utilities as shown on the Plans or called out in the Specifications. This shall include utility coordination activities such as potholing, verification, conflict resolution, third-party coordination, relocation, and clearance for construction.
12. Resource loading for cost, manpower, material, and equipment.
13. Perform required tests; coordinate testing with the CITY as required; submit test reports; and obtain approval of test results.
14. All start-up, testing, training, and assistance required under the Contract.
15. Planning for phased or total takeover by the CITY.
16. Punchlist and final cleanup.
17. Identification of any manpower, material, or equipment restrictions, as well as any activity requiring unusual shift work, such as two shifts, six (6) day weeks, specified overtime, or work at times other than regular days or hours, shall be clearly identified in the Schedule. The Schedule shall clearly identify:
 - Tie-ins and shutdowns
 - Traffic control constraints
 - Access limitations
 - Bypass pumping (if applicable)
 - Work windows imposed by permits or third parties

2.1 Include the effects of adverse weather in the Schedule in terms of working days (wds). The number of wds, Monday through Friday, excluding any day designated as a holiday by the CITY or in a Master Labor Agreement applicable to the Work, of normal adverse weather per month is as follows: The Contractor shall allow ten (10) working days per year within the Baseline Construction Schedule for inclement weather, the unused portion shall be considered as Float to be used by either party. There shall be no extension of time for adverse weather unless work is prevented during the first five (5) hours of a workday with at least sixty percent (60%) of the normal work force on more days per month than listed above. A non-compensable time extension will only be granted when the allowed weather impacts are exceeded.

- A.** Treat float, slack time, contingency, and total float within the Schedule (including the difference between any early completion date and the required Contract Completion Date) as a jointly owned, expiring resource available to the CITY and the project team. Do not use float suppression techniques. the CITY may reject the Schedule and any revisions or updates that use float suppression techniques.
- B.** Schedule Quality and Governance Leads are prohibited. Lags shall be limited to true

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- waiting/curing periods that cannot reasonably be represented as discrete activities and must be justified. Constraints shall not be used to restrain or manipulate float or to mask missing logic; only contractual/external constraints are allowed without special approval. Schedules that contain float-manipulation techniques may be rejected. Open-ended activities (activities without predecessors or successors) are prohibited.
- C.** Do not request or claim a time extension or delay damages unless a delay occurs that: (1) is beyond control and without the fault or negligence of the requesting party and its Subcontractors or Suppliers, at any tier; and (2) extends actual performance of the Work beyond both the current Contract Completion Date and the completion date projected by the current, approved, updated Schedule. If the current approved Schedule update already projects late completion prior to the addition of any CITY-caused delay, limit any time extension to the additional delay demonstrated by an approved Time Impact Analysis. Submit a Time Impact Analysis within five (5) working days after the delay occurs that: (a) demonstrates the estimated impact on the end date of the Work; (b) is based upon the updated Schedule current as of the month the delay occurred; and (c) demonstrates that the delay cannot be mitigated, offset, or eliminated through actions such as revising the intended sequence of Work or other means. Because float time within the Construction Schedule is jointly owned, CITY-caused delays on the project may be offset by the CITY-caused time savings (e.g., critical path submittals returned in less time than allowed by the Contract or approval of substitution requests that result in time savings). No entitlement to a time extension or delay damages exists until all the CITY-caused time savings are exceeded and the Contract Completion Date is exceeded. The Schedule shall remain a predictive model and shall not be adjusted through the addition of constraints or logic revisions intended to mask delay.
- D.** If the Baseline Schedule submitted shows an early completion date, the CITY may, at no cost to the CITY, decrease the Contract duration by issuance of a Change Order, which changes appropriate Milestone Date(s) and the Contract Completion Date to the completion date reflected on the Baseline Schedule. Any approved Schedule, revision, or update having an early completion date shall show the time between the early completion date and the current Contract Completion Date as "project float".
- E.** The CITY's review comments on the Schedule do not relieve the parties of all requirements of the Contract. The CITY may request participation in Schedule reviews by the scheduling team and all major Subcontractors (defined herein as any Subcontractor, Sub-Subcontractor, or Supplier with five (5) percent or more of the value of the Contract). Submit all revisions within five (5) working days after the CITY review.
- F.** Submit two (2) copies of an updated Schedule to the CITY for approval with each monthly payment request submittal.
1. For activities started but not yet completed at the time of submittal, reflect the percentage complete (as agreed at the update meeting with the CITY and the Inspector) and an estimate of the remaining duration.
 2. The monthly update of the Schedule shall include updated schedule outputs generated from the CPM network (time-scaled bar chart and logic diagram) and include the same additional data as required by Section 1.B above.
 3. Calculate the CPM schedule using remaining durations and the retained logic calculation method, unless otherwise approved by the CITY. Provide the predecessor/successor report to support the bar chart or the network diagram

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electronically (native file plus reports), as directed by the CITY . The monthly update shall also include a complete, hard-copy list of all the changes made from the previously approved submittal. The Schedule shall maintain continuity of logic from the Baseline Schedule and shall not be resequenced without CITY approval.

4. If prepared in Primavera, include an XER Tool Kit report for the list of changes.
- G.** Update Integrity Requirements.
 1. Out-of-sequence progress and deviations from the approved logic shall be identified in the monthly narrative and corrected in the next update to maintain a logic-driven forecast. Constraints shall not be added to manage slippage except as approved by the CITY for contractual/external date requirements
 2. The addition of constraints or logic revisions to mitigate negative float without approval is prohibited.

3.0 SCHEDULE REPORTS

- A.** The Schedule submitted to the CITY shall include the time-scaled network diagram. Network diagrams shall be based on the early start and early finish dates of the activities shown. The network diagrams submitted to the CITY shall also be accompanied by a computer-generated mathematical analysis for each activity included in the Schedule. Such mathematical analysis shall be submitted to the CITY and shall include, at a minimum, the following:
 1. A list of all activities sorted by Activity I.D. Number with predecessor and successor activity numbers and descriptions;
 2. Activity number and description.
 3. Activity code(s).
 4. Schedule and actual/remaining duration for each activity.
 5. Earliest start date (by calendar date).
 6. Earliest finish date (by calendar date).
 7. Actual start date (by calendar date).
 8. Actual finish date (by calendar date).
 9. Latest start date (by calendar date).
 10. Latest finish date (by calendar date).
 11. Float in work days.
 12. Monetary value and cost-to-date of each activity.
 13. Percentage of activity complete and remaining duration for incomplete activities.
 14. Cumulative value of Work completed based on the DESIGN BUILD ENTITY'S reported portion of activities completed and accepted.
 15. Imposed constraints.
- B.** The following printed computer outputs shall be required as part of the Schedule submittal and each revision or update thereafter as a condition precedent to receipt of progress payments:
 1. Activity listing sorted by I.D. number showing predecessor and successor activities in numerical order, with original and remaining duration, early start, early completion, late start, late completion, and total float.
 2. A sublisting of materials and equipment sorted by Specification Section number. The sublisting of materials and equipment shall include the following activities: preparation of Shop Drawings, submittal to the CITY, review by the CITY, and fabrication, testing, and/or delivery of material and equipment, which shall be interfaced with the earliest start date that the material or equipment is to be installed on the project.

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3. Activity sort(s) by organizational responsibility, including submittals to the CITY for all major items or material and equipment, the number of shifts, crew sizes of each craft and construction equipment to accomplish the activity;
- C. Outputs 1 and 2, above, shall show all activities, including restraints, for the duration of the project. The Schedule shall clearly identify the current critical path and any near-critical paths (total float \leq 10 working days).

4.0 APPROVAL PROCESS:

- A. THE CITY shall approve or disapprove, in writing, the submission within ten (10) working days after receipt of all required information. The Schedule, once approved, becomes the Baseline Schedule, which shall be used to monitor and evaluate all facets of Contract performance, including, but not limited to, progress, changes, and delays.
- B. Attend and participate in all meetings required by THE CITY to reach mutual agreement and approval of the Baseline Schedule, the Manpower Requirements Forecast, and the Cash Flow Projection. Ensure participation by the Construction Scheduler and those major trade Subcontractors and Suppliers, as required by THE CITY.
- C. Revise the Baseline Schedule, as required by THE CITY, to reflect project construction. If any required submissions are returned for corrections or revisions, resubmit them along with a new USB drive and a hard copy listing of each change (XerTool Kit report) for approval within five (5) working days after receipt. Review and response by THE CITY shall be given within five (5) working days after receipt of each new submission.
- D. Should the Baseline Schedule, submitted for approval, show variances from the requirements of the Contract, make specific mention of such variations in the letter of transmittal, in order that, if accepted, proper adjustments to the Baseline Schedule can be made. Otherwise, compliance obligations remain unchanged, and execution of the Work shall remain in strict accordance with the requirements of the Contract Documents.

5.0 REVISIONS TO APPROVED BASELINE SCHEDULE

- A. Execute the Work in accordance with the approved Baseline Schedule. Out of sequence construction, defined as a change in the Baseline Schedule, requires prior approval of THE CITY as defined below.
- B. Upon approval of a Time Impact Analysis, reflect the change in the next schedule submittal.
- C. Do not make any change (except for resubmittals) to the approved Baseline Schedule without prior written approval of THE CITY. To request a change to the approved Baseline Schedule, submit a written request to THE CITY stating the reasons for the change and the specifics (e.g., revisions to activities, logic, durations, etc.). THE CITY will provide a response within five (5) working days. Actual status and/or forecast dates for revised submittals may be added without prior acceptance by THE CITY, but remain subject to THE CITY review.
- D. If THE CITY considers a change to the Baseline Schedule to be of a major nature, THE CITY may require revision and submittal for acceptance of all affected portion(s) of the Baseline Schedule, including an analysis showing the effect on the entire project. Submit the proposed revision and analysis to THE CITY within ten (10) working days after THE CITY notifies that the revision is of a major nature. A change

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will be considered of a major nature if the time estimated for an activity or sequence of activities is varied from the original plan to the degree that there is reasonable doubt that the Contract completion date will be met, or if the change impacts the Work of other parties at the Jobsite. Changes to activities having adequate float shall be considered as minor changes, except that an accumulation of minor changes may be considered a major change when such changes affect the Contract completion date. (Activities having adequate float are activities which are not critical after the change is made.)

E. Reflect any change in the next Schedule update only after THE CITY approval.

6.0 Updates to the Approved Baseline Schedule and Progress Payments

A. Monthly Updates:

1. Submit all updated or revised Schedules in the same detail as the original submittal, unless otherwise directed in writing by THE CITY.
2. The initial Schedule update shall be submitted within ten (10) working days after approval of the Baseline Schedule. The Schedule update shall be cost-loaded. Subsequent Schedule updates shall be submitted at the beginning of each month thereafter for the duration of the Contract. The data date shall be the first working day of the month unless otherwise directed by THE CITY. The Schedule and computer tabulations shall be reviewed by the Construction Scheduler at a joint update meeting with THE CITY and the INSPECTOR.

B. Monthly Schedule Updates shall include:

1. For activities started and/or completed during the previous period: Actual start and actual completion dates, and number of days used to accomplish the activity.
2. For activities in progress, but not yet complete to date: Remaining duration of the Work, estimated percent complete, and estimated completion date. The schedule shall be calculated using remaining durations and progress override.
3. Update Integrity Requirements
Out-of-sequence progress shall be identified in the narrative and corrected in the next update to maintain a logic-driven forecast. Constraints shall not be added to manage slippage except as approved by THE CITY for contractual/external date requirements.
4. Maintained Baseline and Variance Reporting (Monthly Updates)
Each Monthly Update submittal shall include a Baseline Verification statement confirming: the maintained Baseline remains assigned in P6, and baseline variance fields/reports are reproducible after import of the submitted native schedule file.
5. Provide a Baseline Change Log in each Monthly Update identifying any authorized baseline adjustments (authorization reference, affected WBS/activities/milestones, effective date).
6. For activities not yet started: Estimated start dates, revised durations, and estimated completion dates, as necessary.
7. For authorized Change Orders, including Emergency Change Orders, Time and Material Change Orders, and Unilateral Change Orders: Revised and original activities, number of shifts, crew sizes by craft, construction equipment required, cost, and durations, and status of all outstanding Notices of Non-Compliance, where required.
8. The monthly update of the Network Diagram shall be for the whole project. The previous month's activities shall be reported as they actually took place and

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- designated as complete, if actually completed, on the network diagram update.
9. The electronic file of the submitted Network Diagrams and the related reports shall constitute a clear record of progress of the Work from Notice to Proceed to final completion.
 10. The monthly submittal to THE CITY shall be accompanied by the Schedule Narrative Report. The Schedule Narrative Report shall describe the physical progress during the report period, Plans for continuing the Work during the forthcoming report period, actions planned to correct any negative float predictions, and an explanation of potential delays and/or problems and their estimated impact on performance and the overall project completion date. In addition, alternatives for possible schedule recovery to mitigate any potential delay and/or cost increases shall be included for consideration by THE CITY. The narrative shall specifically identify:
 - Changes to the critical path
 - Activities causing delay or recovery
 - Comparison to Baseline durations and sequencing
 11. The original Baseline Schedule shall remain assigned and unchanged in the scheduling software for the duration of the Project.

C. Schedule Narrative Report Outline:

- 1) Transmittal Letter.
- 2) Description of problem areas.
- 3) Current and anticipated delays:
 - a) Cause of the delay.
 - b) Corrective action and schedule adjustments to correct the delay.
 - c) Impact of the delay on other activities, milestones, and completion dates.
- 4) Changes in construction sequences.
- 5) Pending items and status thereof:
 - a) Permits.
 - b) Change Orders.
 - c) Time extensions.
 - d) Non-Compliance Notices.
- 6) Contract Completion Date(s) status:
 - a) Ahead of schedule and number of working days.
 - b) Behind schedule and number of working days.
- 7) Other project or scheduling concerns, including any plant shutdowns, duration of each shutdown, and analysis of any Work to be performed during the shutdown period.
- 8) Include reviewed and updated Network Diagram and Reports.
- 9) Include revised Cost Loading and Cash Flow Information of this Section.
- 10) Include substantial revisions to manpower and equipment requirements

D. Weekly Progress Reports

1. Once each week, on a day established by THE CITY, the DESIGN BUILD ENTITY shall submit:
 - a. A progress schedule (A.K.A. 3-week look ahead) listing the activities completed and in progress for the previous week and the activities scheduled for the succeeding two (2) weeks. The activity designations shall be consistent with those in the Current Schedule Update. A bar chart shall be used to display the information in pictorial form. The appropriate schedule activity number shall be listed for each bar.

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7.0 Cost Loading and Cash Flow

- A.** With the initial Baseline Schedule submittal, each Monthly Schedule Update, and each revision, the DESIGN BUILD ENTITY shall also submit a schedule of cost loading and cash flow to THE CITY. There shall be a strict correlation between the sum of individual activity costs and the total values indicated for bid items. That is, each individual activity within the Schedule shall employ a code, which in summary, attaches its cost, if any, to the appropriate bid items, or in the approved schedule of values. The sum of activity costs within a specific code shall equal the cost of its corresponding bid items and approved Change Orders.
- B.** Expected payment requests for each month shall be included with proposed updates. The cash flow shall show the net payment requests for each month. The cumulative payment requests to date shall also be shown after deducting retention and any other monies withheld. The cash flow shall be shown in tabular format and in graphic format.
- C.** In accordance with the updating procedures, when an activity is deemed substantially complete by THE CITY, then such activity will no longer be treated as an activity affecting the critical path or successor activities on the project. The cost of correction of any punch list items associated with substantially completed activities will be covered by amounts deemed by THE CITY and the INSPECTOR to be adequate to cover such costs.

8.0 Responsibility For Completion

- A.** Whenever it becomes apparent from the current Monthly Schedule Update that phasing, milestone, constraint, restraint, or Contract Completion Date will not be met, the DESIGN BUILD ENTITY shall submit a plan to recover the delay using some or all of the following remedial actions;
 - 1. Increase construction manpower in such quantities and crafts as necessary to eliminate the backlog of work and meet the current Contract Completion Date.
 - 2. Increase the number of working hours per shift, shifts per working day, working days per week, the amount of construction equipment, or any combination thereof to eliminate the backlog of Work.
 - 3. Reschedule the Work in conformance with the Specification requirements.
- B.** Prior to implementing any of the above actions, the DESIGN BUILD ENTITY shall notify THE CITY and obtain approval from THE CITY. If such actions are approved, the Schedule revisions shall be incorporated by the DESIGN BUILD ENTITY into the Network Diagram before the next Monthly Schedule Update is due.
- C.** Under no circumstances will the addition of equipment or construction forces, increasing the Working hours or any other method, manner, or procedure to return to the contractually required Contract Completion Date be considered justification for a Change Order or be treated as acceleration where the need for a recovery schedule has been caused by the DESIGN BUILD ENTITY and/or its Subcontractors or Suppliers, at any tier.
- D.** THE CITY may elect to withhold progress payments until the DESIGN BUILD ENTITY'S progress indicates that the milestone date(s) and/or the Contract Completion Date will be met.

9.0 Schedule Time Extensions

- A.** When Change Orders or delays are experienced by the DESIGN BUILD ENTITY and a time extension is requested, the DESIGN BUILD ENTITY shall submit to THE

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- CITY, a written Time Impact Analysis illustrating the influence of all changes or all delays on the current Contract Completion Date. The Time Impact Analysis shall be based on the most recent updated schedule Analysis approach. This Time Impact Analysis shall incorporate all delays (including THE CITY, DESIGN BUILD ENTITY, and Third-Party delays without exception) in the time frame they occurred with actual logic ties. The data shall be obtained from the most recent accepted Baseline Schedule or Monthly Schedule Update as of the time the Preliminary Change Order, Emergency Change Order, Unilateral Change Order, or Allowance Order was issued to the DESIGN BUILD ENTITY. The Time Impact Analysis shall be created as an early start schedule and shall use the original activity durations for all incomplete work and the actual logic driving all activities. All requests for time extensions shall be based upon this T.I.A. The critical path will be established, and all delays caused by THE CITY on the critical path will be identified. The time extension will be based solely upon the cumulative duration of all THE CITY and Third Party caused delays (as set forth in other sections of the GENERAL CONDITIONS) which are on the critical path. Any time extensions to the project Interim Milestone Dates shall be non-compensable.
- B.** Time extensions will be granted only to the extent that equitable time adjustments for the activity or activities affected exceed the total or remaining float along the critical path of activities at the time of actual delay, or at the time the Preliminary Change Order, the Emergency Change Order, the Unilateral Change Order, or the Allowance Order was issued to the DESIGN BUILD ENTITY. Float or slack time is not for the exclusive use or benefit of THE CITY or the DESIGN BUILD ENTITY, but is an expiring resource available to all parties as needed to meet Contract milestones and the Contract Completion Date. Time extensions shall not be granted, nor delay damages paid until;
1. A delay occurs which is beyond the control and without the fault or negligence of the DESIGN BUILD ENTITY and its Subcontractors or Suppliers, at any tier; and
 2. Which extends actual performance of the Work beyond the applicable current Contract Completion Date and the most recent date predicted for completion of the project on the approved Monthly Schedule Update, current as of the time of the delay or as of the time of issuance of the Preliminary Change Order, the Emergency Change Order, the Unilateral Change Order, or the Allowance Order was issued to the DESIGN BUILD ENTITY.
- C.** Each Time Impact Analysis shall be submitted in triplicate, within five(5) working days after a delay occurs, or issuance of the Preliminary Change Order, Emergency Change Order, Time and Materials Change Order, or Unilateral Change Order. If the DESIGN BUILD ENTITY does not submit a Time Impact Analysis for a specific Change Order or delay within the specified period of time, the DESIGN BUILD ENTITY shall be deemed to have irrevocably waived any rights to additional time and cost.
- D.** Since float time within the Schedule is jointly owned, it is acknowledged and agreed by the DESIGN BUILD ENTITY that THE CITY caused delays on the project may be offset by THE CITY caused time savings (including, but not limited to: critical path submittals returned in less time than allowed for in the Contract, approval of substitution requests which result in a savings of time along the critical path for the DESIGN BUILD ENTITY, etc.). In such an event, the DESIGN BUILD ENTITY shall not be entitled to receive an extension of time or delay damages until all the time savings caused by the CITY are exceeded, and the Contract Completion Date is also exceeded.

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- E.** Approval or rejection of each Time Impact Analysis by THE CITY shall be made within ten (10) working days after receipt of each Time Impact Analysis, unless subsequent meetings and negotiations are necessary. Upon approval, a copy of a Time Impact Analysis signed by THE CITY shall be returned to the DESIGN BUILD ENTITY for incorporation into the next Monthly Schedule Update.
- F.** Upon mutual agreement by both parties, fragnets illustrating the influence of Change Orders and delays shall be incorporated into the Schedule during the first update after agreement is reached.
- G.** In the event the DESIGN BUILD ENTITY does not agree with the decision of THE CITY regarding the impact of a change or delay, it shall be resolved in accordance with CLAIMS AND PROTESTS of the GENERAL CONDITIONS.
- H.** The Time Impact Analysis shall be based on the most recent accepted Schedule Update and shall preserve the logic and sequencing of the current schedule.

10.0 Submittal Of “As-Built” Schedule

- A.** As a condition precedent to any release of retention, the last update to the Schedule submitted shall be identified by the DESIGN BUILD ENTITY as the "As-Built Schedule". The "As-Built Schedule" shall reflect the exact manner in which the project was actually constructed (including start and completion dates, activities, sequences, and logic) and shall be signed and certified by the DESIGN BUILD ENTITY'S Project Manager and Construction Scheduler as being a true reflection of the way in which the project was actually constructed.