

**AMENDMENT NO. 1**

Arrowhead Hospital (COG-50) and Sierra Verde Park (COG-51) Wells  
(COG Project #212228, Contract No. C22-0595)

This Amendment No. 001 (“Amendment”) to the Professional Services Agreement (“Agreement”) is made this \_\_\_\_\_ day of \_\_\_\_\_, 2023, (“Effective Date”), by and between the City of Glendale, an Arizona municipal corporation (“City”) and Hazen and Sawyer, P.C., a New York Professional Corporation, authorized to do business in Arizona (“Contractor”).

**RECITALS**

- A. City and Hazen and Sawyer, P.C. (“Contractor”) previously entered into Professional Services Agreement, Contract No. C22-0595, dated June 14, 2022 (“Agreement”); and
- B. The initial services provided by the consultant was providing program management services for the development of a phased groundwater well program, in conjunction with the Integrated Water Master Plan (IWMP) recommendations, which lead to the first well program project, which the Contractor provided engineering services for the design, drilling, testing, and construction for two new replacement wells in Zone 3, by 2025.
- C. Water sampling, which followed well drilling, determined that the nitrate levels are or will exceed Maximum Contaminant Level (MCL) at all area wells. It was determined that nitrate treatment will be required. Expanding the scope of work under the original agreement will allow the improvements to be design for reducing the potable water nitrate levels.
- D. The use of the term " Contractor" under this Amendment No. 1 is used interchangeably with the term " Consultant" defined under the Agreement and used throughout the attached Exhibits.
- E. City and Contractor wish to modify and amend the Agreement subject to and strictly in accordance with the terms of this Amendment.

**AGREEMENT**

In consideration of the mutual promises set forth herein and other good and valuable consideration, the receipt and sufficiency of which are hereby acknowledged, the City and Contractor hereby agree as follows:

1. **Recitals.** The recitals set forth above are not merely recitals but form an integral part of this Amendment.
2. **Term.** The term of the Agreement is extended for a two-year period from June 14, 2024 through June 13, 2026, unless otherwise terminated or canceled as provided by the Agreement. All other provisions of the Agreement except as set forth in this Amendment shall remain in their entirety.
3. **Scope of Work.** This project will provide professional engineering services to complete the design and permitting of the select improvement as described in Exhibit B.

4. **Compensation.** Including allowances, Design Contract C22-0595 (Arrowhead Hospital (COG-50) and Sierra Verde Park (COG-51) Wells) resulted in a previous compensation of \$1,888,433. Including allowances, Amendment 1 (design and construction of nitrate treatment) at potable water wells COG50 and COG51 compensation will result in an additional increase in compensation of \$979,031 and as shown in the attached Exhibit D (for a total compensation including allowances of \$2,867,464.00
5. **Insurance Certificate.** Current certificate will expire on March 29, 2024 and a new certificate applying to the extended term must be provided prior to this date to Materials Management and the Contract Administrator.
6. **Non-discrimination.** Contractor must not discriminate against any employee or applicant for employment on the basis of race, color, religion, sex, national origin, age, marital status, sexual orientation, gender identity or expression, genetic characteristics, familial status, U.S. military veteran status or any disability. Contractor will require any Sub-contractor to be bound to the same requirements as stated within this section. Contractor, and on behalf of any subcontractors, warrants compliance with this section.
7. **No Boycott of Israel.** To the extent A.R.S § 35-393 through § 35-393.03 are applicable, the parties hereby certify that they are not currently engaged in, and agree for the duration of the Agreement to not engage in, a boycott of goods or services from Israel, as that term is defined in A.R.S § 35-393.
8. **Uyghur Forced Labor Prevention Act (UFLPA).** Contractor certifies that it does not currently, and during the term of this Agreement, will not use:
  - (a) the forced labor of ethnic Uyghurs in the People’s Republic of China;
  - (b) any goods or services produced by the forced labor of ethnic Uyghurs in the People’s Republic of China; and
  - (c) any contractors, subcontractors or suppliers that use the forced labor or any goods or services produced by the forced labor of ethnic Uyghurs in the People’s Republic of China.
9. **Attestation of PCI Compliance.** When applicable, the Contractor will provide the City annually with a Payment Card Industry Data Security Standard (PCI DSS) attestation of compliance certificate signed by an officer of Contractor with oversight responsibility.
10. **Ratification of Agreement.** City and Contractor hereby agree that except as expressly provided herein, the provisions of the Agreement shall be, and remain in full force and effect and that if any provision of this Amendment conflicts with the Agreement, then the provisions of this Amendment shall prevail.

[Signatures on the following page.]

CITY OF GLENDALE, an Arizona  
municipal corporation

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Kevin R. Phelps, City Manager

ATTEST:

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Julie K. Bower, City Clerk (SEAL)

APPROVED AS TO FORM:

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Michael D. Bailey, City Attorney

Hazen and Sawyer, P.C.  
a New York Professional Corporation



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By: Curtis D. Courter

Its: Authorized Agent / Associate Vice President



## **EXHIBIT B**

### **PSA C22-0595 Amendment No. 1**

#### **BACKGROUND**

The scope of this amendment is to provide engineering services for the design and construction of nitrate treatment at two potable water wells, COG-50 and COG-51, within Zone 3 of the City of Glendale (COG). Well drilling, followed by sampling, has determined that nitrate levels at COG-50 are near the City's goal and exceed the Maximum Contaminant Level (MCL) at COG-51, necessitating nitrate treatment. The design at both sites was delayed while the City contemplated how to proceed. Ultimately the City has decided to add nitrate treatment at the COG-50 in order to provide centralized treatment for existing wells AR-18 and AR-21, that both have elevated nitrates, as well as possible future treatment of COG-50. Additionally, the City has decided to add well site nitrate treatment at COG-51. The Consultant and CMAR developed IX bid packages and those bids are now under consideration to select a preferred vendor to base the design on. Until that decision is made by COG, the IX treatment design for COG-50 is on hold and the full well and IX treatment design for COG-51 is on hold. The impacts of these delays have resulted in currently projected delays of 10 months for design (Original Scheduled Completion May 2023; Current Scheduled Completion March 2024) and 7 months for construction (Original Scheduled Completion February 2025; Current GMP-2 Scheduled Completion September 2025). The extended schedule requires additional meetings and project oversight duration.

Additionally, at COG's request, what were planned as monthly progress meetings have been held weekly since the beginning of the project and the COG's decision to include art at the COG-51 site and pump-to-waste to the nearby lake has necessitated additional coordination meetings and public involvement efforts beyond what was originally anticipated in the base scope of work.

Moreover, the USEPA's Revised Lead and Copper Rule (LCRR), requires public water systems to provide corrosion control evaluations to their regulatory agency in the case of source water and treatment changes. ADEQ has started to provide guidance and expectations regarding the information that must be submitted with the "Approval to Construct" application, based on specific project types. Therefore, a Corrosion Control Evaluation will now be necessary and is included in this amendment.

## **A GENERAL PROGRAM MANAGEMENT SERVICES**

### **A1.1 PROGRAM MANAGEMENT STATUS REPORTS AND WEEKLY AND DESIGN MEETINGS**

Delays due to the treatment requirements and revised construction schedule have extended the overall project duration through GMP-2, necessitating additional meetings and progress reporting. Additionally, at COG's request the frequency of progress meetings during design increased from monthly to weekly during design through October 2023 and are anticipated to be twice monthly for the duration of the project. In addition to the weekly meetings, design meetings (workshops) will also be conducted to provide design progress updates.

### **A2.1 PUBLIC OUTREACH**

Due to the high level of interest from the community surrounding Sierra Verde Park, additional public outreach activities are necessary to communicate effectively with the HOA and general community and to mitigate impacts to the overall project.

Public Art is being designed and implemented for COG-51 to enhance the site appearance. Consultant participated in coordination meetings, provided numerous perspective figures of the site for the artist's use, and modified the wall design to allow for mounting of the planned art at the site.

In addition, pump-to-lake has been assessed to be the most cost-effective and time-saving approach for pump-to-waste during well startup. Consultant developed numerous conceptual alternatives and associated renderings, assessed pumping times and rates and associated pond water quality, developed collateral for COG's communication with the HOA, attended an HOA meeting to present some of the concepts, and provided input to the legal agreement with the HOA for pump-to-lake.

## **E CONSTRUCTION PHASE**

### **E.1.2 CONSTRUCTION ADMINISTRATION**

Construction Administration Procedures: Consultant shall establish and implement procedures for expediting and processing requests for information (RFI's); review and approval of shop drawings, material and equipment sample submittals related to the Ion Exchange design at COG 50 and 51. The Consultant shall establish and maintain logs for tracking all relevant information related to the above.

### **E.1.4.5 CORROSION CONTROL EVALUATION**

Consultant will attend a meeting with the Arizona Department of Environmental Quality (ADEQ) prior to the Approval to Construct (ATC) application for each proposed drinking water well. Preparation will include a proposed methodology for the desktop level corrosion control evaluation. Upon approval of the

methodology, the City shall conduct sampling for any additional water quality parameters (WQPs) listed below, as applicable, for the appropriate evaluation of existing WQPs before using new water sources and/or treatment changes. The City will also provide 5-year historical data to Consultant on WQPs, as available, for the water source and distribution system. An analysis of baseline/existing water quality conditions in the area most impacted by the new water source will be conducted. Maps of key distribution system water quality parameters will be prepared for understanding baseline conditions.

The following WQPs, as prescribed by the ADEQ in the “Safe Drinking Water Program Corrosion Control Treatment Matrix (Adapted from Colorado Water Quality Division and Edited by Arizona Department of Environmental Quality)” guidance, will be evaluated:

- pH
- Temperature
- Alkalinity
- Calcium
- Chloride
- Sulfate
- Ammonia
- Conductivity
- Total Dissolved Solids (TDS)
- Hardness
- Iron
- Manganese
- Dissolved Oxygen
- Total Organic Carbon
- Total and Free Chlorine Residual
- Corrosion Control Inhibitors (Orthophosphate, Silica)

Following required additional sampling, if applicable (locations and parameters to be determined by ADEQ), the City shall share the laboratory results with Consultant for evaluation of impacts on water quality parameters related to corrosion control at the entry point to the distribution system (EPDS) attributed to the proposed new water sources and/or treatment changes. Water quality conditions after implementing the new water sources and IX treatment will be calculated and analyzed with modeling tools in lieu of sampling as the analysis will need to be completed before the system is in place for operation. The evaluation will consider seasonal changes, water quality source changes, and common blending scenarios. Consultant will calculate dissolved inorganic carbon (DIC) and calcium saturation indices using Rothberg, Tamburini, & Winsor (RTW) Modeling and theoretical lead (and copper) solubility using MINEQL+ based on the water quality analysis. Treated water quality will be evaluated for impacts to corrosion control-related water quality parameters, and primary objective will be a comparison of existing water quality to proposed water quality to determine if adverse corrosion control impacts may occur. Consultant will coordinate with ADEQ, as needed, by email throughout the evaluation and lead one virtual coordination meeting.

All findings will be presented to the City in a Corrosion Control Evaluation Workshop (hours included in A1.1) for COG-50 and COG-51. Additionally, findings from the corrosion control evaluation will be provided in a report for concurrent ATCs, i.e., COG-50 and COG-51 Corrosion Evaluation Report. The

COG-50 and COG-51 Corrosion Evaluation Report will provide recommendations for additional testing needed to enhance the design, if necessary, and obtain approval, and recommended follow-up sampling or studies to be completed after implementing the change. If potential adverse impacts are identified, and if proven mitigation methods are available and clear at the time, recommendations will be provided. Otherwise, comprehensive mitigation strategies will be evaluated with additional bench-scale testing.

#### **Assumption(s) and Exclusions:**

- Up to 45 additional submittals and resubmittals at 2 hours per submittal
- Up to 10 additional RFIs at 3 hours per RFI
- No more than three blending scenarios will be evaluated for corrosion impacts at each well.
- All WQP sampling and monitoring needed for the corrosion control evaluation will be conducted by the City and are not included in this Scope of Work.
- In the event that potential adverse impacts of the source water and treatment change are identified that result in additional efforts to comply with the ADEQ Corrosivity Matrix (e.g., tap sampling, scale analysis, bench-scale testing, pipe loop testing, etc.) and/or additional design, those additional efforts will be negotiated separately to be completed in a subsequent Scope of Work.
- Water quality blending analyses will be conducted; however, source water tracing, pipe scale analyses, water age analyses, etc. are not included.
- AR-18 and AR-21 CCT studies are not included in this scope.
- The report will not consider the impacts to the primary drinking water standards.

#### **Deliverable(s):**

- ADEQ Corrosion Control Evaluation Meeting Presentation and Meeting Minutes
- Corrosion Control Evaluation Workshop Presentation and Meeting Minutes
- COG-50 and COG-51 Corrosion Evaluation Report

### **E1.4.6 START-UP SERVICES**

Start-up Support: Consultant will prepare a start-up plan for each site to include all relevant dry testing, wet testing, performance testing, start-up, and operational demonstration. Consultant will be on-site with the IX Vendor and Construction Manager at Risk (CMAR) to inspect, document, and photo log the testing, start-up, and demonstration. The entire start-up event is anticipated to last 7-9 weeks at each site:

- **Week 1: Instrument Calibrations, Vendor Equipment Setup, Loop Testing, and Function Testing:** Consultant Engineers will be on-site to witness instrument calibrations and loop testing. Instrument calibrations and ranges will be verified and documented at the local device, PLC, and SCADA in coordination with the City. Consultant will also witness vendor equipment setup and verify the vendor has signed off on the installation as required.
- **Weeks 2 and 3:** Consultant Engineers will be on-site daily for dry and wet testing.
- **Weeks 4 and 5:** Consultant Engineers will be on-site part time for resin addition, chlorination, performance testing, and start-up operation.
- **Weeks 6 and 7:** Consultant Engineers will be part time to monitor and document operational demonstration.

- Weeks 8 and 9: Consultant Engineers will be on-site 4 hours a week to address lingering issues, and to help optimize throughput and salt utilization rate.
- O&M Manual: Consultant will prepare a comprehensive IX system O&M manual for City following successful start-up and IX Vendor training.

Final Inspection: Consultant will provide final inspection services including a walk with the City and CONTRACTOR to go over the final punch-list following the substantial completion and start-up.

## **G51 NITRATE TREATMENT**

### **G51.1 PRELIMINARY DESIGN**

Preliminary design tasks are those tasks that are required to define the basis of the design.

#### **G51.1.1 HYDRAULIC ANALYSIS**

The Consultant will perform hydraulic analysis of treatment systems. This analysis will evaluate onsite pipeline sizes and treatment system pressure losses and determine required modifications to wellhead pumps to maintain well production capacity.

#### **G51.1.2 DESIGN CRITERIA IDENTIFICATION**

Consultant will identify design criteria for each component, including pipeline size, vessel size, Brine tank, Brine Pumps, connections, and associated appurtenances.

#### **G51.1.3 BASIS OF DESIGN REPORT (BODR)**

Consultant will prepare a draft BODR summarizing the treatment system evaluation and design criteria findings. The draft BODR will be a Technical Memorandum and include all backup information from the analysis in the appendices. An electronic file of the draft BODR will be provided to the City for review. An electronic PDF file of the final BODR incorporating the City's comments will be provided.

#### **G51.1.4 REGULATORY AGENCIES COMMUNICATION**

Consultant will coordinate with MCESD for Approval to Construct (ATC) and the City's Building safety department during detailed design, and for the MCESD Approval of Construction (AOC) and Approval of Proposed (Blending) Plan (AOPP) after the construction is complete.

#### **G51.1.5 PERFORMANCE SPECIFICATIONS**

The scope of work involves the preparation of a performance specification and the selection of a nitrate treatment vendor for the project. Consultant will work with the City and the CMAR to prepare the performance specification, which will describe the requirements for the nitrate treatment systems'

performance and other critical parameters such as water flow rate, operating pressure, treatment efficiency, and residual levels. The Consultant will confirm the front-end document requirements with the City and CMAR in preparation of the specifications. The performance specifications will serve as the basis for the solicitation to the IX vendors (RFP, to be prepared by CMAR) for the nitrate treatment vendor.

## **G51.1.6 IX VENDOR SELECTION**

Once responses to the RFP are received by the CMAR, Consultant will assist the CMAR in evaluating proposals from potential vendors and selecting the most suitable vendor for the project. Consultant will use its expertise in water treatment technologies to assess the vendors' proposals based on various criteria such as technology, cost, schedule, and experience. Consultant will assist and work with the City with the selection of the equipment vendor. After the selection of the nitrate treatment vendor, Consultant will finalize the design to equip the selected nitrate treatment system.

### **Task 1 Assumptions:**

- All deliverables are to be provided electronically unless otherwise specified.

### **Task 1 Deliverables:**

- Basis of Design – Draft
- Basis of Design – Final
- Performance Specifications for IX System bidding

## **G51.2 DETAILED DESIGN**

### **G51.2.1 DESIGN DEVELOPMENT**

The design process will involve preparing detailed engineering plans and specifications for the installation of the nitrate treatment system for the selected vendor at each well site, including its various components such as pumps, valves, filters, tanks, pipelines, and associated electrical and instrumentation equipment. Drawings will be prepared following the Maricopa Association of Governments (MAG) Standard Specifications and Details, City of Glendale MAG Supplemental Specifications and Details, and the current City of Glendale Engineering Design Standards and specifications will be based on standard Consultant design and technical specifications. Consultant will also work with the City and the CMAR to ensure that the design complies with all applicable regulations and standards. Throughout the design phase, Consultant will provide regular progress updates to the City and the CMAR, seeking their input and approval as required.

A joint workshop with the City and Consultant will be scheduled to review design development documents and discuss layout, operational considerations, and other design issues. Consultant will provide advance copies of preliminary design documents to the City in preparation for the Workshop.

## **G51.2.2 90% DESIGN AND PERMITTING**

Consultant will prepare all necessary documentation, including For Regulatory Approval (90% design) documents and permit applications, and will work closely with the MCESD to ensure that all regulatory requirements are met.

## **G51.2.3 FINAL DESIGN**

Consultant will prepare For Construction documents of finalized drawings, and finalized specifications. Consultant will incorporate final review comments from the City and applicable regulatory agencies. Consultant will submit electronic PDF versions of the final design documents for construction.

## **G51.2.4 GMP REVIEW**

The CMAR will prepare GMP(s). Consultant will review and comment on the GMP(s).

### **G51 Assumptions and Exclusions:**

- Arc flash analysis will be included in the specifications to be performed by the CMAR.
- SCADA and PLC configuration will be provided by the City.
- Conduit and cable schedules, and detailed wiring diagrams are not included. Instead, the one-line diagrams will provide conduit sizes and required cables with circuit tags and a duct bank schedule is provided with circuit tags matching one-line diagrams.
- Bench scale testing, pilot testing, materials testing and equipment witness testing are excluded.

### **G51 Deliverables:**

- Draft and Final 90% drawings and specifications
- Draft and Final For Construction drawings and specifications
- Design milestone utility coordination documentation
- Utility relocate record drawings

## **G ALLOWANCES**

### **G.1 SURVEY**

The survey to support the project was completed through the CMAR, so the budget is being reallocated to the amendment scope of work.

## **G.2 GEOTECHNICAL**

The anticipated geotechnical work to support the project was never completed, so the budget is being reallocated to the amendment scope of work.

## **G.5 CONTINUING PROGRAMMATIC SERVICES**

A portion of this allowance was utilized for an update to the Arrowhead Groundwater Cost of Service Analysis as previously negotiated. The remaining budget is being re-allocated to the amendment scope of work.

## **G.7 OWNER'S ALLOWANCE**

Ten (10%) percent of the base tasks as an Owner's allowance to cover efforts related to any unforeseen conditions and additional scope items that require additional pre-construction or engineering during construction phase services. For example, the City has approved GMP-1 and the CMAR has developed a proposed GMP-2. A third GMP is anticipated that will include IX treatment at both well sites, which will likely extend the construction and thus the project duration further.

## **G.8 CONSTRUCTION INSPECTION ALLOWANCE**

Construction Inspection services allowance accounts for 200 days of inspection based on inspection of specific construction activity identified in the CONTRACTOR'S GMP-2 Rev2 construction schedule. Assumes 4 hours per day, on average, of drive and inspection time based on conversations with Water Services.

## **G.9 SECURITY ALLOWANCE**

The City has provided specific requirements for site security at COG-50 and COG-51 that go beyond what was included in the base scope of work. Consultant, through our electrical, instrumentation and control Subconsultant will update the Basis of Design Report and prepare additional drawings and update existing drawings to add site security. The drawing revisions include:

- Site Lighting, Security and Access Control Plan (New Drawing)
- Miscellaneous Single Lines (New Drawing)
- Electrical – Enclosure Plan (Update Drawing)
- Electrical – Schedules (Update Drawing)
- Instrumentation – Control Block Diagram (Update Drawing)

**Assumptions:** Access control equipment, cameras, network switch, and DVR specifications will be provided by City.



**Exclusions:**

- Radio path studies by Southwest Lan Communications (SWLan) are not included in this amendment but can be completed through the CMAR or funded through the Owner's Allowance.
- Design of antenna, master radio and hardware at Arrowhead Ranch WRF

**DIRECT EXPENSES**

Additional direct costs including mileage related to increased trips to the site (estimated at \$6,050), applicable MCESD ATC/AOC fees (estimated at \$5,500), and sealed documents copying and courier costs.

**FEE SUMMARY**

GENERAL PROGRAM MANAGEMENT SERVICES	\$139,885
CONSTRUCTION PHASE	\$176,267
COG51 NITRATE TREATMENT DESIGN	\$499,760
DIRECT EXPENSES	\$12,550
ALLOWANCES	\$150,569
<b>TOTAL AMENDMENT ONE</b>	<b>\$979,031</b>

City of Glendale Wells 50 and 51

ID	Task Mode	Task Name	Duration	Start	Finish	Timeline											
						Nov	Dec	Qtr 1, 2024		Feb	Mar	Qtr 2, 2024		May	Jun	Qtr 3, 2024	
0		<b>COG 50&amp;51 Nitrate Treatment Design</b>	<b>303 days</b>	<b>Thu 4/27/23</b>	<b>Fri 6/28/24</b>	[Timeline bar from Nov 2023 to Jun 2024]											
1		COG 50 ATC Application and Review	50 days	Mon 5/29/23	Fri 8/4/23	[Timeline bar from May 2023 to Aug 2023]											
2		<b>COG 50 100% Design</b>	<b>47 days</b>	<b>Mon 6/12/23</b>	<b>Tue 8/15/23</b>	[Timeline bar from Jun 2023 to Aug 2023]											
3		100% Drawings, Specs, BODR	30 days	Mon 6/12/23	Fri 7/21/23	[Timeline bar from Jun 2023 to Jul 2023]											
4		Internal QA/QC	7 days	Mon 7/24/23	Tue 8/1/23	[Timeline bar from Jul 2023 to Aug 2023]											
5		Responses to City Comment	14 days	Mon 6/12/23	Thu 6/29/23	[Timeline bar from Jun 2023 to Jul 2023]											
6		MCESD ATC Permitting Finalization and Approval	7 days	Mon 8/7/23	Tue 8/15/23	[Timeline bar from Aug 2023 to Sep 2023]											
7		<b>COG 50 with IX Design</b>	<b>258 days</b>	<b>Thu 6/29/23</b>	<b>Fri 6/28/24</b>	[Timeline bar from Jun 2023 to Jun 2024]											
8		<b>COG 50 with IX 60%&amp;90% Design</b>	<b>222 days</b>	<b>Thu 6/29/23</b>	<b>Thu 5/9/24</b>	[Timeline bar from Jun 2023 to May 2024]											
9		60% IX Performance Specs	7 days	Thu 6/29/23	Fri 7/7/23	[Timeline bar from Jun 2023 to Jul 2023]											
10		City Review Comments	14 days	Mon 7/10/23	Thu 7/27/23	[Timeline bar from Jul 2023 to Aug 2023]											
11		90% IX Specs	7 days	Fri 7/28/23	Mon 8/7/23	[Timeline bar from Aug 2023 to Sep 2023]											
12		IX Vendor Selection	51 days	Fri 8/18/23	Fri 10/27/23	[Timeline bar from Sep 2023 to Nov 2023]											
13		90% Design Drawings Specs BODR	60 days	Mon 11/6/23	Thu 2/1/24	[Timeline bar from Nov 2023 to Feb 2024]											
14		City Review Comments	16 days	Fri 2/2/24	Fri 2/23/24	[Timeline bar from Feb 2024 to Mar 2024]											
15		COG 50 with IX ATC Application	70 days	Fri 2/2/24	Thu 5/9/24	[Timeline bar from Feb 2024 to May 2024]											
16		<b>COG 50 with IX 100% Design</b>	<b>90 days</b>	<b>Mon 2/26/24</b>	<b>Fri 6/28/24</b>	[Timeline bar from Feb 2024 to Jun 2024]											
17		100% Design Specs and Drawings and BODR	75 days	Mon 2/26/24	Fri 6/7/24	[Timeline bar from Feb 2024 to Jun 2024]											
18		Internal QA/QC & Responses to City Comment	14 days	Mon 6/10/24	Thu 6/27/24	[Timeline bar from Jun 2024 to Jul 2024]											
19		Final ATC Approval	15 days	Mon 6/10/24	Fri 6/28/24	[Timeline bar from Jun 2024 to Jul 2024]											
20		<b>COG 51 IX Design</b>	<b>302 days</b>	<b>Thu 4/27/23</b>	<b>Thu 6/27/24</b>	[Timeline bar from Apr 2023 to Jun 2024]											
21		<b>COG 51 IX 90% Design</b>	<b>267 days</b>	<b>Thu 4/27/23</b>	<b>Thu 5/9/24</b>	[Timeline bar from Apr 2023 to May 2024]											
22		90% IX Specs	18 days	Thu 4/27/23	Mon 5/22/23	[Timeline bar from May 2023 to Jun 2023]											
23		IX Vendor Selection	51 days	Fri 8/18/23	Fri 10/27/23	[Timeline bar from Sep 2023 to Nov 2023]											
24		90% Design Drawings Specs BODR	60 days	Mon 11/6/23	Thu 2/1/24	[Timeline bar from Nov 2023 to Feb 2024]											
25		City Review Comments	16 days	Fri 2/2/24	Fri 2/23/24	[Timeline bar from Feb 2024 to Mar 2024]											
26		COG 51 with IX ATC Application	70 days	Fri 2/2/24	Thu 5/9/24	[Timeline bar from Feb 2024 to May 2024]											
27		<b>COG 51 IX 100% Design</b>	<b>89 days</b>	<b>Mon 2/26/24</b>	<b>Thu 6/27/24</b>	[Timeline bar from Feb 2024 to Jun 2024]											
28		100% Design Specs and Drawings and BODR	75 days	Mon 2/26/24	Fri 6/7/24	[Timeline bar from Feb 2024 to Jun 2024]											
29		Internal QA/QC & Responses to City Comments	14 days	Mon 6/10/24	Thu 6/27/24	[Timeline bar from Jun 2024 to Jul 2024]											
30		Final ATC Approval	14 days	Mon 6/10/24	Thu 6/27/24	[Timeline bar from Jun 2024 to Jul 2024]											
31		<b>Corrosion Control Evaluation</b>	<b>61 days</b>	<b>Fri 12/1/23</b>	<b>Tue 2/27/24</b>	[Timeline bar from Dec 2023 to Feb 2024]											
32		ADEQ Meeting	1 day	Fri 12/1/23	Fri 12/1/23	[Timeline bar at Dec 1, 2023]											
33		Workshop	1 day	Fri 12/1/23	Fri 12/1/23	[Timeline bar at Dec 1, 2023]											
34		COG50&51 Corrosion Evaluation Report	60 days	Mon 12/4/23	Tue 2/27/24	[Timeline bar from Dec 2023 to Feb 2024]											

COG 50&51 Nitrate Treatment  
Wed 11/7/2023

Task		Project Summary		Manual Summary		Progress
Milestone		Manual Task		External Milestone		Manual Progress
Summary		Manual Summary Rollup		Baseline Summary		