

NAPA SANITATION DISTRICT

WOODARD & CURRAN - TASK ORDER No. 2 66-INCH TRUNK SEWER REHABILITATION PROJECT (CIP 19701)

Date: _____

Issued under Professional Services Agreement dated July 10, 2018.

To: Woodard & Curran

Project Description:

66-inch Trunk Sewer Rehabilitation - Professional Design Services.

Description of Scope of Services to be performed by Consultant under this Task Order:

See Exhibit 'A' – Scope of Services

Description of Services to be Provided by District:	See Exhibit 'A' –Scope of Services
Deliverables:	See Exhibit 'A' –Scope of Services
Consultant Project Manager:	Jennifer Glynn, PE
Consultant Quality Control Manager:	Glenn Hermanson, PE
Schedule to Perform Services:	See Exhibit 'C' - Schedule
Time & Materials Not-to-Exceed Cost Limit:	\$475,352
	See Exhibit 'B' –Fee Schedule

APPROVALS:

WOODARD & CURRAN

By: ____

Authorized Representative

Date

NAPA SANITATION DISTRICT

By: _____

Purchasing Agent

Date

NSD Account No.: <u>CIP 19701</u>

Scope of Services Task Order 2 5/8/19

Description:

Scope of work is for rehabilitation alternatives evaluation, preliminary design, and final design of rehabilitation of approximately 6,452 feet of 66" diameter reinforced concrete pipe between MH R70-013 and MH Q73-001.

<u> Task 1 – Project Management</u>

Subtask 1.1 Project Meetings

Woodard & Curran will prepare for and attend up to four (4) project meetings with the District at key points throughout the design process. The meetings are anticipated to include:

- Rehabilitation Alternatives Analysis Review Meeting
- Preliminary Design Report Review Meeting
- 60% Design Review Meeting
- 90% Design Review meeting

Woodard & Curran will prepare an agenda and meeting minutes for each identified meeting and distribute to the District. At a minimum, Woodard & Curran's Project Manager will attend each meeting.

Subtask 1.2 Project Tracking, Invoicing and Communications

Woodard & Curran will prepare and submit progress reports with the monthly project invoice. Woodard & Curran will provide regular project coordination, communication and updates to the District and track the project scope, budget and schedule.

Task 1 Assumptions

- Any meetings not identified in Subtask 1.1 will occur via conference call and in-person attendance will not be required.
- Task Order 2 duration is approximately 13 months.

Task 1 Deliverables

- Project meeting agendas (PDF format, transmitted via email one day before the meeting)
- Project meeting minutes (PDF format, transmitted via email)
- Monthly invoice and progress report

Task 2 Rehabilitation Alternatives Evaluation

Subtask 2.1 Alternatives Evaluation

Woodard & Curran will evaluate existing large diameter sewer rehabilitation lining systems available in the marketplace and recommend one alternative for final design. The recommendation will be developed based on constraints identified on the project mapping, through a field reconnaissance visit to the site, and consideration of the following as they relate to the proposed project:

- Constructability
- Access requirements

- Typical construction durations
- Typical contractor productivity rates
- Easement and temporary construction easement requirements
- Permitting requirements
- Bypass pumping/piping requirements
- Size reduction of the rehabilitated pipeline and resulting hydraulic impacts to the trunk sewer
- Relative costs

The evaluation will culminate in a recommended method for the basis of final design.

Upon completion of this subtask, Woodard & Curran will meet with the District (see Subtask 1.1) to review condition assessment data, discuss rehabilitation recommendations, and next steps.

Recommendation will be carried forward and presented as part of the Preliminary Design Report in Task 3.

Subtask 2.2 Alternatives Evaluation QA/QC

Woodard & Curran will conduct internal Quality Assurance/Quality Control (QA/QC) reviews of the alternatives evaluation and recommendation. QA/QC review will be conducted by a technical reviewer that did not participate in development of the recommendation.

Task 2 Assumptions

- A structural rehabilitation solution will be required.
- Alternatives evaluation does not include utility research or mapping.

Task 2 Deliverables

• Presentation materials for Rehabilitation Alternatives Analysis Review Meeting. No TM or other written report will be provided for this task. Findings from this task will be presented as part of Task 3.

Task 3 Preliminary Design Report

Subtask 3.1 Draft Preliminary Design Report

Woodard & Curran will develop a draft Preliminary Design Report (PDR) presenting the work completed in Task 3. The intent of the PDR is to serve as the basis for final design. The PDR will include the following chapters:

- Project Background
- Project Objectives
- Project Overview and Mapping
- Trunk Sewer Rehabilitation Alternatives Evaluation (from Task 2)
- Manhole Rehabilitation or Replacement Alternatives Evaluation
- Sanitary Sewer Bypass
- List of Potential Permitting or Environmental Constraints
- Utility Coordination Requirements
- Preliminary Construction Cost
- Preliminary Project and Construction Schedule

The draft PDR will be submitted to the District for review and comment. The Preliminary Design Report Review meeting (see Subtask 1.1) will be conducted following submittal of the draft PDR.

Subtask 3.2 Final Preliminary Design Report

Woodard & Curran will incorporate District review comments on the draft PDR to prepare the final PDR.

Subtask 3.3 Preliminary Design QA/QC

Woodard & Curran will conduct internal Quality Assurance/Quality Control (QA/QC) reviews of the draft and final PDRs under this task. QA/QC reviews will be conducted by technical reviewers that did not participate in development of the PDR. QA/QC comments will be incorporated into the draft and final PDRs submitted to the District.

Task 3 Assumptions

- District will provide review of the draft PDR and provide consolidated comments within 10 working days of receiving the deliverable.
- District will provide review comments in electronic format, transmitted via email or FTP.

Task 3 Deliverables

- Draft Preliminary Design Report (PDF format, transmitted via email).
- Final Preliminary Design Report (PDF format, transmitted via email).

Task 4 – Field Investigations and Research

Subtask 4.1 Utility Research

- Underground Service Alert (U.S.A.) Design Ticket
- Contact and track communications with utility agencies/owners identified on the U.S.A. ticket
- Obtain record drawings or other available utility mapping from utility agencies/owners identified on the U.S.A. ticket

Task 4 Assumptions

• Utility research is dependent on response time from utility agencies/owners. Assume a 6-week turnaround period.

Task 4 Deliverables

• U.S.A. Design Ticket and obtained record drawings/utility mapping (PDF format, transmitted via email)

Task 5 – Permitting and CEQA Support

Subtask 5.1 CEQA Initial Study/Mitigated Negative Declaration

Woodard & Curran will prepare a CEQA Initial Study/Mitigated Negative Declaration (IS/MND) upon completion of the PDR and will utilize project information and figures from the PDR. The IS/MND may evaluate up to two alternatives for the Napa River Tributary bypass pipe crossing and the Soscol Creek/railroad bypass pipe crossing, depending on the results of the PDR. One site walk is included. The IS will be prepared in accordance with the recently adopted update to the state CEQA Guidelines.

- Administrative Draft IS/MND
- Public Review Draft IS/MND
- Notice of Intent (NOI), Notice of Completion (NOC)

- Response to Comments on the IS/MND
- Final IS/MND and Mitigation Monitoring and Reporting Program (MMRP)
- Notice of Determination (NOD)

Subtask 5.2 Prepare Technical Studies to Support CEQA and Resource Agency Permit Applications

The following technical studies are needed to support the CEQA IS/MND and Resource Agency permit applications. Woodard & Curran subconsultants WRA and Basin Research Associates will provide support on this task as noted below.

- Air Quality/Greenhouse Gas Analyses (analysis incorporated into CEQA IS/MND; model results included in Appendix)
- Biological Resources Assessment and Technical Report (prepared by WRA)
- Jurisdictional Wetland Delineation and Report (prepared by WRA)
- United States Fish and Wildlife Service Section 7 Endangered Species Act (ESA) Consultation and Biological Assessment (*prepared by WRA*)
- Cultural Resources Assessment and Technical Report (prepared by Basin Research Associates; includes compliance with Section 106 of the National Historic Preservation Act which is required as a result of federal agency permitting).

Subtask 5.3 Prepare Permit Applications

Permit acquisition work is assumed to be based on a CIPP rehabilitation project with sanitary sewer bypass and crossing of the Napa River Tributary and/or Soscol Creek/railroad. The following are permits that we assume need to be acquired for this work:

- United States Army Corps of Engineers (USACE) Clean Water Act (CWA) Section 404 Nationwide Permit
- Regional Water Quality Control Board (RWQCB)– CWA Section 401 Water Quality Certification
- California Department of Fish and Wildlife (CDFW) Section 1600 Streambed Alteration Agreement
- City of Napa Encroachment Permit (*if access to manholes is required in the public right-of-way*)
- Regional Water Quality Control Board discharge permit (for CIPP cure water discharge as necessary)
- Union Pacific/California Northern Railroad letter of permission (CIPP would be a maintenance activity for locations where the existing pipe crosses the railroad. Since no excavation near the rails is required, no permit/notification is anticipated for work associated with CIPP. However, a letter of permission may be required for installation of temporary bypass within RR right-of-way.)

This subtask assumes phone calls and written communication and coordination with the permitting agencies. This subtask assumes no face-to-face meetings with permitting agencies will be required.

Task 5 Assumptions

- District will file the NOC and NOD with the County Clerk's office and pay required CEQA filing fees. District will post the NOI in the local newspaper.
- Woodard & Curran will mail hard copies of the NOI and CDs of the IS/MND to agencies, organizations and individuals on a mailing list provided by the District.

- Woodard & Curran will provide an electronic copy of the IS/MND as well as three (3) hard copies that can be used for public review at the District office and local libraries.
- Woodard & Curran will file the NOC with the State Clearinghouse along with 15 CDs of the IS/MND.
- No more than 16 hours of staff time will be necessary to respond to comments on the IS/MND.
- District will conduct AB 52 Tribal Consultation. Woodard & Curran will assist with outreach letters if requested. See Optional Task 8 AB 52 Tribal Consultation.
- Scope assumes Project can proceed with a USACE Nationwide Permit. If an Individual Permit is required, additional scope and budget will be submitted.
- Scope assumes no compensatory mitigation will be required for impacts to jurisdictional wetlands/waters. If the agencies require mitigation, additional scope and budget will be submitted.
- District can provide access / right-of-entry to each manhole along the alignment.
- District will acquire temporary construction easements as necessary to complete the work. Woodard & Curran will identify where temporary construction easements are required. Development of plat and legal descriptions for the District's use are outside of this scope of work.

Task 5 Deliverables

- Administrative Draft IS/MND (up to two rounds of review; WORD and PDF format, transmitted via email or FTP)
- Public Review Draft IS/MND (three (3) hard copies and WORD and PDF format, transmitted via email or FTP)
- NOI and NOC (one round of review; PDF format for signature by the District)
- Response to Comments (one round of review; and WORD and PDF format transmitted via email or FTP)
- Final IS/MND and MMRP (one round of review; WORD and PDF format transmitted via email or FTP)
- NOD (PDF format for signature by the District)
- Draft and Final Biological Resources Report (one round of review; WORD and PDF format transmitted via email or FTP)
- Draft and Final Cultural Resources Assessment (one round of review; WORD and PDF format transmitted via email or FTP)
- Draft and Final Jurisdictional Delineation (one round of review; WORD and PDF format transmitted via email or FTP)
- Permitting applications (one round of review; PDF format transmitted via email or FTP, for signature by the District)
- Preparation and submittal of permit applications.
- Provision of technical support to District to obtain environmental (CEQA) clearances for the work.

<u> Task 6 – Design Documents</u>

At all stages of the design (60%, 90%, and 100%), W&C will use AutoCAD to prepare a CAD model for the proposed project. The model will reflect only the portion of the project necessary to communicate the proposed scope of work to the District and contractors. The model will be laid on top of aerial imagery as provided by the District. No survey work is provided as part of this scope.

Subtask 6.1 60% Design

• Provide plans, list of technical specifications, and engineer's estimate of construction cost at a 60% design level.

Subtask 6.2 90% Design

- Respond to District and CM 60% constructability review comments.
- Provide plans, technical specifications, marked-up front end specifications (as provided by the District), and engineer's estimate of construction cost at a 90% design level.

Subtask 6.3 100% Design – Bid Documents

- Respond to District 90% review comments.
- Provide plans, front-end and technical specifications, and engineer's estimate of construction cost at a 100% design level.

Subtask 6.4 Design QA/QC

• Internal QA/QC Review of 60%, 90%, and 100% design documents.

Task 6 Assumptions

- Project rehabilitation method will be Cured in Place Pipe (CIPP)
- CIPP launch locations will require complete removal and replacement of manholes for CIPP installation. CIPP reception locations (manholes) will not require removal and replacement.
- District will provide front-end specifications for W&C review and update.
- No survey will be provided. AutoCAD drawings will be placed on aerial photograph backgrounds provided by the District.
- No geotechnical investigation will be completed.
- Review comments for each submittal will be aggregated into one file containing one set of comments.

Task 6 Deliverables

- 60% plans, specifications and cost estimate (PDF format, transmitted via email or FTP)
- (2) 11" X 17" hard copies of the 60% plans
- 90% plans, specifications and cost estimate (PDF format, transmitted via email or FTP)
- (2) 11" X 17" hard copies of the 90% plans
- Signed/stamped final design plans (PDF and AutoCAD format, transmitted via FTP)
- Signed/stamped final design specifications (PDF and MS Word format, transmitted via FTP)
- Final cost estimate (PDF format, transmitted via email)
- (2) 11" X 17" hard copies of the final plans

Task 7 – Bid Assistance

Subtask 7.1 Answer Contractor Questions

Woodard & Curran will be available to respond to Contractor's questions on the contract specifications and plans as necessary during the bid period. This scope assumes that W&C will answer up to twenty (20) contractor questions.

Subtask 7.2 Prepare Drawings/Spec Revisions for Each Addendum

Subtask includes preparation of up to twenty (20) drawing/specification revisions for up to three Addenda. Revisions will be provided electronically (PDF format, transmitted via email or FTP).

Subtask 7.3 Conformed Documents

Subtask includes preparation of one set of conformed plans and specifications for the project. Conformed documents will be transmitted electronically (PDF format, transmitted via email or FTP) for attachment to addenda issued for the project.

Subtask 7.4 Attend Pre-Bid Meeting and Site Walk

Woodard & Curran will attend one (1) pre-bid meeting and site walk (as necessary).

Optional Task 8 – AB 52 Tribal Consultation

Woodard & Curran will provide support for the District in communications with up to three tribal representatives. As part of this assistance, Woodard & Curran will arrange and attend up to three 1-hour consultation meetings via conference call with the District and tribal representatives.



Napa Sanitation District 66-inch Trunk Sewer Rehabilitation Design

Tasks							L	abor								Outside Ser	vices		ODC	s	Total
	Mike Matson	Jen Glynn	Madison Veggian	Justin Kraetsch	Glenn Hermanson	Jennifer Ziv	Haley Johnson	Alexis Cahalin	Robin Cort	CAD	Admin	Graphics			Basin Research	WRA, Inc.					
	Principal-In- Charge	Project Manager	Deputy PM	Project Engineer	QA/QC Review (Design)	CEQA/Permit Lead	3	CEQA Planner 2	(CEQA/Permitting)		Admin	Graphics	Total Hours	Total Labor Costs (1)	Cultural Resources	Biological Assessment, JD, USFWS Consultation, Permit Support	Subtotal	Sub Consultant Total Cost (2)	ODCs	Total ODCs (3)	Total Fee
	SLL	STPL	PE1	E3	STPL	STPL	E3	E2	STPL	D3	PA	GA									(1
	\$310	\$310	\$221	\$212	\$310	\$282	\$212	\$187	\$310	\$160	\$110	\$118									
TASK ORDER 2																					
Task 1: Project Management							1							<u> </u>			A a	10		A A	
1.1 Project Meetings													0	\$0			\$0	\$0		\$0	\$0
1.1.1 Rehabilitation Alternatives Analysis Review Meeting		4	4											\$2,124			\$0	\$0	\$200	\$220	\$2,344
1.1.2 Preliminary Design Report Review Meeting	4	4	4											\$3,364			\$0	\$0	\$200	\$220	\$3,584
1.1.3 60% Design Review Meeting		4	4										8	\$2,124			\$0	\$0	\$200	\$220	\$2,344
1.1.4 90% Design Review Meeting		-	4	40									8	\$2,124			\$0	\$0	\$200	\$220	\$2,344
1.2 Project Tracking, Invoicing and Communications (13 months)	4	56 72	60 76	12	0	0	0	0	0	0	26	0	158 194	\$37,264 \$47,000	\$0	* 0	\$0 \$0	\$0 \$0	\$200	\$220	\$37,484
Subtotal Task 1:	: 8	/2	76	12	0	0	0	0	0	0	26	0	194	\$47,000	\$0	\$0	\$0	\$0	\$1,000	\$1,100	\$48,100
Task 2: Rehabilitation Alternatives Evaluation 2.1 Alternatives Evaluation		16		24	1		1	1					40	\$10.048			\$0	\$0	¢0,	\$0	\$10,048
2.1 Alternatives Evaluation 2.2 Alternatives Evaluation QA/QC	1	10		24	4								40	\$10,048			\$0	\$0 \$0	\$0 \$0	\$0 \$0	\$10,048
2.2 Alternatives Evaluation QAVQC Subtotal Task 2	1	40	0	04	4	0	0	0	0	0	0	0	-	1 7	* 0	¢0	1.1	\$0 \$0	1.1	1.1	1 7
		16	0	24	4	0	0	0	0	0	0	0	45	\$11,598	\$0	\$0	\$0	\$0	\$0	\$0	\$11,598
Task 3: Preliminary Design Report		40	20	60	1		1	1			0	0	400	¢05.000			¢0	¢0	\$ 0	¢0	#05 000
3.1 Draft Preliminary Design Report		12	32	60 24							8	8	120 44	\$25,336 \$9.864			\$0 \$0	\$0 \$0	\$0 \$0	\$0 \$0	\$25,336 \$9.864
3.2 Final Preliminary Design Report 3.3 Preliminary Design QA/QC	2	4	10	24	0								10	\$9,004			\$0	\$0 \$0	\$0 \$0	\$0 \$0	\$9,864
3.3 Preliminary Design QA/QC Subtotal Task 3	2	16	48	84	8	0	0	0	0	0	8	0	174	\$3,100	\$0	\$0	\$0	\$0 \$0	\$0 \$0	\$0 \$0	\$3,100
Task 4: Field Investigations	. 2	10	40	04	0	0	0	0	0	0	0	0	174	\$36,300	φ 0	\$0	Φ 0	Ф О	\$ 0	şО	\$30,300
4.1 Utility Research		1	4	16			[[1			[20	\$4,276			\$0	\$0	\$150	\$165	\$4,441
4.1 Ounty Research Subtotal Task 4	· 0	0	4	16	0	0				0	0	0	20	\$4,276	\$0	\$0	\$0	\$0 \$0	\$150 \$150	\$165	\$4,441
Task 5: Permitting and CEQA Support	. 0	0	4	10	0	0				0	0	0	20	φ4,270	ψŪ	ψŪ	φυ	ψŪ	\$150	\$105	φ 4,44 1
5.1 CEQA Initial Study/Mitigated Neg Dec	1	0	4	[28	80	112	16		8	14	271	\$56,966			\$0	\$0	\$750	\$825	\$57,791
5.2 Prepare Technical Studies to Support CEQA and Permit Applications	1	4	4	8		16	40	2	4		0	14	74	\$17,542	\$12.468	\$21,700	\$34.168	\$35.876	\$730 \$0	\$100	\$53.518
5.3 Prepare Permit Applications/Agency Coordination		16	40	80		10	40	2	8		8	8	160	\$35,064	φ12,400	\$5,000	\$5,000	\$5,250	\$200	\$220	\$40,534
Subtotal Task 5	. 1	28	44	88	0	44	120	114	28	0	16	22	505	\$109,572	\$12,468	\$26,700	\$39,168	\$41,126	\$950	\$1,145	\$151,843
Task 6: Design Documents		20		00	Ŭ		120	114	20	0	10	22	000	\$100,012	φ12,400	φ20,100	<i>\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\</i>	φ+1,120		φ1,140	\$101,040
6.1 60% Design		32	60	160					1	120			372	\$76.300			\$0	\$0	\$75	\$83	\$76.383
6.2 90% Design		24	40	100						90			254	\$51,880			\$0	\$0	\$75	\$83	\$51,963
6.3 100% Design		12	20	40						50	16		138	\$26,380			\$0	\$0	\$100	\$110	\$26,490
6.4 Design QA/QC	2			20	48								70	\$19,740			\$0	\$0	\$0	\$0	\$19,740
Subtotal Task 6	2	68	120	320	48	0	0	0	0	260	16	0	834	\$174,300	\$0	\$0	\$0	\$0	\$250	\$276	\$174,576
Task 7: Bid Services																					
7.1 Answer Contractor Questions		6	8	16			1						30	\$7,020			\$0	\$0	\$0	\$0	\$7,020
7.2 Prepare Drawing/Spec Revisions for Each Addendum		12	16	32	4					24			88	\$19,120			\$0	\$0	\$0	\$0	\$19,120
7.3 Conformed Documents		4	8	16						16	4		48	\$9,400			\$0	\$0	\$100	\$110	\$9,510
7.4 Attend Pre-Bid Meeting and Site Walk		6	8										14	\$3,628			\$0	\$0	\$200	\$220	\$3,848
Subtotal Task 7	: 0	28	40	64	4	0	0	0	0	40	4	0	180	\$39,168	\$0	\$0	\$0	\$0	\$300	\$330	\$39,498
Task 8: Optional - AB 52 Tribal Consultation																					
8.1 AB 52 Tribal Consultation						12		16	2				30	\$6,996			\$0	\$0	\$0	\$0	\$6,996
Subtotal Task 8	: 0	0	0	0	0	12	0	16	2	0	0	0	30	\$6,996	\$0	\$0	\$0	\$0	\$0	\$0	\$6,996
TASK ORDER 2 TOTAL	14	228	332	608	64	56	120	130	30	300	70	30	1,982	431,210	12,468	26,700	39,168	41,126	2,650	3,016	475,352
INSITORDER 2 TOTAL													,		7.00			,			.,

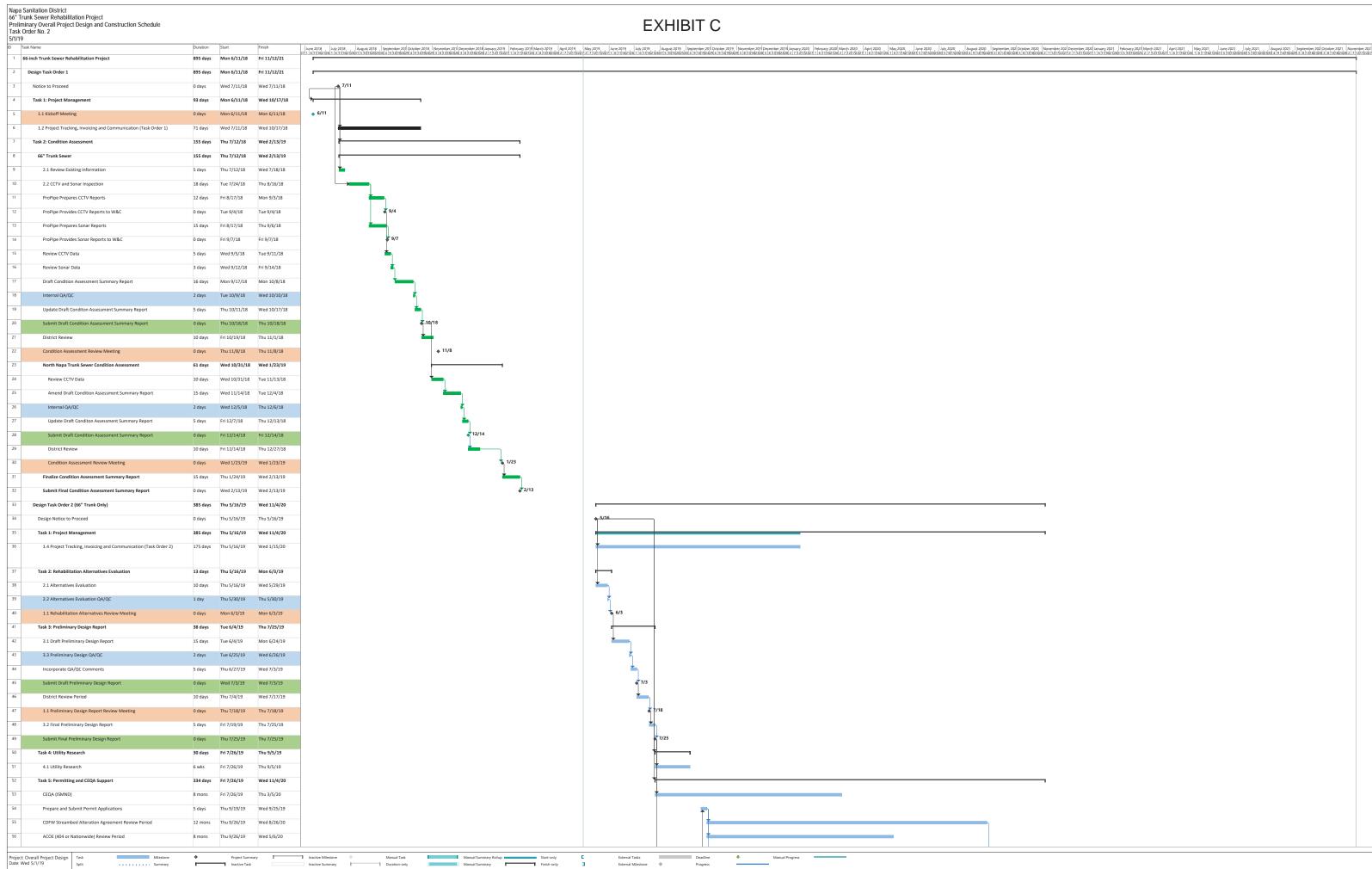
1. The individual hourly rates include salary, overhead and profit.

Subconsultants will be billed at actual cost plus 5%.
 Other direct costs (ODCs) such as reproduction, delivery, mileage (rates will be those allowed by current IRS guidelines), and travel expenses, will be billed at actual cost plus 10%.

4. Woodard & Curran reserves the right to adjust its hourly rate structure and ODC markup at the beginning of the calendar year for all ongoing contracts.

Fee Estimate

5/8/2019



Page 1

Napa Sanitation District 66" Trunk Sewer Rehabilitation Project Preliminary Overall Project Design and Construction Schedule Task Order No. 2

Task Uldel	INO.	2
5/1/19		

9				
	ask Name		Start	Finish
57	Regional Board Review Period	8 mons	Thu 9/26/19	Wed 5/6/20
58	Receive All Permit Agency Comments	0 days	Wed 8/26/20	Wed 8/26/20
59	Resubmit Design to Permit Agency(ies)	10 days	Thu 8/27/20	Wed 9/9/20
60	Permit Agency Review Period	2 mons	Thu 9/10/20	Wed 11/4/20
61	Obtain Permits	0 wks	Wed 11/4/20	Wed 11/4/20
62	Task 6: Design Documents	125 days	Fri 7/26/19	Thu 1/16/20
63	6.1 60% Design	50 days	Fri 7/26/19	Thu 10/3/19
64	Develop 60% Design Plans, Specifications & Estimate (PS&E)	30 days	Fri 7/26/19	Thu 9/5/19
65	7.4 QA/QC Review	3 days	Fri 9/6/19	Tue 9/10/19
66	Incorporate QA/QC Comments	5 days	Wed 9/11/19	Tue 9/17/19
67	Submit 60% Design PS&E to District	0 days	Wed 9/18/19	Wed 9/18/19
68	District Review Period	10 days	Thu 9/19/19	Wed 10/2/19
69	60% Design Review Meeting	0 days	Thu 10/3/19	Thu 10/3/19
70	6.2 90% Design	45 days	Fri 10/4/19	Thu 12/5/19
71	Develop 90% Design Plans, Specifications & Estimate (PS&E)	25 days	Fri 10/4/19	Thu 11/7/19
72	7.4 QA/QC Review	3 days	Fri 11/8/19	Tue 11/12/19
73	Incorporate QA/QC Comments	5 days	Wed 11/13/19	Tue 11/19/19
74	Submit 90% Design PS&E to District	0 days		Tue 11/19/19
75	District Review Period	10 days	Wed 11/20/19	
76	90% Design Review Meeting	0 days	Thu 12/5/19	Thu 12/5/19
77	6.3 100% Design - Bid Documents	30 days	Fri 12/6/19	Thu 1/16/20
78	Develop 100% Design Plans, Specifications & Estimate (PS&E)	20 days	Fri 12/6/19	Thu 1/2/20
79	6.4 QA/QC Review	5 days	Fri 1/3/20	Thu 1/9/20
80				
	Incorporate QA/QC Comments	5 days	Fri 1/10/20	Thu 1/16/20
81	Submit 100% Design PS&E to District	0 days	Thu 1/16/20	Thu 1/16/20
82	Bidding and Construction	257 days	Thu 11/19/20	Fri 11/12/21
83	Bid Period	4 wks	Thu 11/19/20	Wed 12/16/20
84	Bid Opening	0 days	Wed 12/16/20	
85	Award Construction Contract	0 days	Wed 2/10/21	Wed 2/10/21
86	Construction	177 days	Wed 3/10/21	Fri 11/12/21
87	Contractor NTP	0 days	Wed 3/10/21	Wed 3/10/21
88	Submittals	45 days	Thu 3/11/21	Wed 5/12/21
89	Measure Pipe Diameter in Live Flow	1 day	Thu 4/8/21	Thu 4/8/21
90	Lining Order and Delivery	15 days	Fri 4/16/21	Thu 5/6/21
91	Set Up Bypass	10 days	Fri 5/7/21	Thu 5/20/21
92	Remove Manhole Cones for Insertion Pits	10 days	Fri 5/21/21	Thu 6/3/21
93	Clean Trunk Sewer (8 segments)	4 wks	Fri 6/4/21	Thu 7/1/21
94	PreLining CCTV	8 days	Fri 7/2/21	Tue 7/13/21
95	Lining (8 segments)	8 wks	Wed 7/14/21	Tue 9/7/21
96	Post Lining CCTV	8 days	Wed 9/8/21	Fri 9/17/21
97	Construct Manholes Removed for Insertion	20 days	Mon 9/20/21	Fri 10/15/21
98	Dismantle Bypass	10 days	Mon 10/18/21	Fri 10/29/21
99	Punch List		Mon 11/1/21	

Project: Overall Project Design Date: Wed 5/1/19	Task Split	Milestone Summary	*	Project Summary Inactive Task	Inac	ctive Milestone 🔍	Manual Task Duration-only	Manual Summary Rollup Start-on Start-on Manual Summary Finish-o	y E Ily 3	External Tasks External Milestone	Deadline Progress	+	Manual Progress		
											Dama 2				

