

COUNCIL DOCKET OF

July 29, 2008

Supplemental Adoption Consent Unanimous Consent Rules Committee Consultant Review

R -

O -

Amendment No. 5 to Agreement with Lee & Ro, Consulting Engineers, Inc., for the Grit Processing Improvements Project

Reviewed Initiated By NR&C On 6/25/08 Item No. 1c

RECOMMENDATION TO:

Approve.

VOTED YEA: Frye, Faulconer, Peters, Atkins

VOTED NAY:

NOT PRESENT:

CITY CLERK: Please reference the following reports on the City Council Docket:

REPORT TO THE CITY COUNCIL NO.

INDEPENDENT BUDGET ANALYST NO.

COUNCIL COMMITTEE CONSULTANT ANALYSIS NO.

OTHER:

Engineering and Capital Projects Department's June 18, 2008, Executive Summary Sheet

COUNCIL COMMITTEE CONSULTANT



000149

EXECUTIVE SUMMARY SHEET

DATE REPORT ISSUED: June 18, 2008 REPORT NO:
 ATTENTION: Natural Resources & Culture Committee Meeting
 Agenda of June 25, 2008
 ORIGINAL DEPT.: Engineering and Capital Projects, Architectural; Engineering & Parks
 SUBJECT: Amendment No. 5 to the Agreement with Lee & Ro, Consulting
 Engineers, Inc for the Grit Processing Improvements Project
 COUNCIL DISTRICTS: 2 (Faulconer)
 STAFF CONTACT: D. Greenhalgh (619) 533-5660/I. Asgharzadeh (619)533-5105

REQUESTED ACTION:

Approve and authorize FY 2009 – Phase III of \$1,276,759 with Lee & Ro Consulting Engineers, Inc. for design revisions, updating the past design, and construction engineering services.

STAFF RECOMMENDATION:

Adopt the Ordinance

EXECUTIVE SUMMARY:

The Grit Processing Improvements Project (GIP) is located at the existing Point Loma Wastewater Treatment Plant (PLWTP). Presently the PLWTP has six aerated grit basins constructed between 1962 and 1988. The south grit tanks were part of the original PLWTP construction. The central and north pair of grit tanks was added in 1983 and 1988 respectively. This project will reconstruct the south grit tanks and its adjacent pump gallery; replace the head works building with a drive through facility and new grit processing equipment. It also includes an interim grit processing facility to allow processing to continue during construction.

Adequacy of the grit removal is a major issue because of the wear and tear the material causes on the down stream equipment and the decrease in treatment capacity and efficiency. It is estimated that PLWTP spends \$1,000,000 a year on grit removal from plant digesters. The material also effects the operations, maintenance and performance of the Metro Bio-solids Center.

The design for the original project was approved in December 2000 (Resolution No. 294342) and the authorization to advertise and award given in June 2003 (Resolution No. 298298). However, prior to the award; pilot testing for secondary wastewater treatment at the PLWTP was approved and conceptual layout of the secondary treatment facilities conflicted with the GIP project. To insure prudent spending it was decided to complete the secondary pilot testing technology before proceeding with the proposed GIP. While the GIP was delayed a need to construct a portion of the project remained. The Lee & Ro GIP contract was modified to allow the Grit Aeration System (GAS) originally a portion of the GIP to be repackaged, advertised and bid under Resolution 301217 March 10, 2004. The GAS was awarded and constructed in 2005 for \$1,905,000.

Amendment No. 5 will authorize FY 2009 Phase III of \$1,276,759 of which \$300,000 was previously authorized and the additional \$976,759 in this phase is for additional services.

This will allow for the repackaging and revised design of the GIP project. Since the original design the building codes have been dramatically updated. The new documents will incorporate all building code changes and the most recent technological advances.

000150

EQUAL OPPORTUNITY CONTRACTING:

Funding Agency: City of San Diego
Goals: 15% Voluntary (MBE/WBE/DBE/DVBE/OBE)
Sub consultant Participation: \$112,500 Certified Firms (11.52%)
\$ 50,000 Other Firms (5.12%)
Other: Workforce Report Submitted- Equal Opportunity Plan required. Staff will monitor plan and adherence To Nondiscrimination Ordinance.

FISCAL CONSIDERATIONS:

The total cost for professional engineering services with Lee & Ro Consulting Engineers, Inc. is \$3,911,121. Funding of \$2,934,362 was previously authorized and is available in CIP 45-943.0 Point Loma - Grit Processing Improvements, Fund 41508, Metro Sewer Utility Fund, and funding for the additional \$976,759 is available in CIP 45-943.0, Point Loma - Grit Processing Improvements, Fund 41508, Metro Sewer Utility Fund for this purpose.

The total cost for professional engineering services with Lee & Ro Consulting Engineers, Inc. of \$3,911,121 may be reimbursed approximately 80% by current or future debt financing. This agreement is scheduled to be phase funded thru FY2009. No future funding is anticipated for this agreement.

PREVIOUS COUNCIL AND COMMITTEE ACTIONS:

Council approved this project on December 5, 2000 (R-294342, \$2,134,362). On February 13, 2002 Council approved Amendment #1 (C-10619), December 9, 2002 Amendment #2 (R-297457, \$800,000), June 20, 2005 Amendment #3 (00-19391) and January 18, 2006 Amendment #4 (C-13612). The subject item will be presented to the Committee on Natural Resources and Culture prior to the Council Docket date.

COMMUNITY PARTICIPATION AND PUBLIC OUTREACH EFFORTS:

N/A

KEY STAKEHOLDERS & PROJECTED IMPACTS (if applicable):

Upon approval of Amendment No. 5, Lee & Ro Consulting Engineers, Inc. will receive an additional \$976,759 towards their contract, bringing the total contract amount to \$3,911,121. Funds for the construction contract estimated to be greater than \$30,000,000 for this project will be requested later at the time of bidding.


Patti Boekamp
Director, Engineering & Capital Projects


David Jarrell
Deputy Chief of Public Works

000151
EQUAL OPPORTUNITY CONTRACTING PROGRAM EVALUATION

DOCKET SUPPORTING INFORMATION
 CITY OF SAN DIEGO

DATE:
 June 13, 2008 52
 07/29

SUBJECT: 5th Amendment Agreement with Lee & Ro Consulting Engineers, Inc. for Grit Processing Improvements Project

GENERAL CONTRACT INFORMATION

Recommended Consultant: Lee & Ro
 Amount of this Action: \$ 976,759
 Original Contract: \$ 2,134,362
 All Other Actions: \$ 800,000
 Cumulative: \$ 3,911,121
 Funding Source: City
 Goal: 15% Voluntary

SUBCONSULTANT PARTICIPATION

	<u>This Action</u>		<u>Cumulative</u>	
Simon Wong Engineering (Asian Pacific Male/DBE)	\$ 110,000	11.26%	\$ 225,000	5.75%
Platt Whitelaw Architects (Other)	\$ 50,000	5.12%	\$ 115,000	2.94%
Pacific Noise (Other)	\$ 0	0%	\$ 10,500	0.27%
Fiberglass Structural Engineers (Other)	\$ 0	0%	\$ 25,000	0.64%
Cybernet Consulting (Other)	\$ 0	0%	\$ 80,000	2.05%
Environments West (Other)	\$ 0	0%	\$ 28,000	0.72%
Southland Geotechnical (White Female/DBE)	\$ 2,500	0.26%	\$ 10,500	0.26%
Total Certified Participation	\$ 112,500	11.52%	\$ 235,500	6.02%
Total Other Participation	\$ 50,000	5.12%	\$ 258,500	6.61%
Total Participation	\$ 162,500	16.64%	\$ 494,000	12.63%

EQUAL EMPLOYMENT OPPORTUNITY COMPLIANCE

Equal Opportunity: Required

Lee & Ro submitted a Work Force Report for their Los Angeles County office dated May 1, 2008. The firm's Administrative workforce consists of 90 employees and reflects under representations as shown below:

- African American – A&E, Science, Computer, Technical, Administrative Support
- Hispanics – Management & Financial, A&E, Science, Computer
- Filipino – A&E, Science, Computer, Administrative Support
- Female – Management & Financial, A&E, Science, Computer, Technical

Lee & Ro has been requested to submit an Equal Opportunity Plan which details strategies to remedy deficiencies in their workforce.

ADDITIONAL COMMENTS

The *Work Force Analysis* is attached.

Beryl Rayford
 EOCP Program Manager by:AMJ

File: Admin WOFO 2000

Date WOFO Submitted: 5/1/2008
 Input by: kh

Goals reflect statistical labor force availability for the following: 2000 CLFA
 Los Angeles County, CA

City of San Diego/Equal Opportunity Contracting
WORK FORCE ANALYSIS REPORT

FOR
 Company: Lee & Ro

I. TOTAL WORK FORCE:

	Black		Hispanic		Asian		American Indian		Filipino		White		Other		
	Goals	M	F	Goals	M	F	Goals	M	F	Goals	M	F	Goals	F	
Mgmt & Financial	7.3%	0	0	18.7%	0	0	14.9%	1	0	0.3%	0	0	14.9%	1	0
Professional	8.9%	0	0	16.5%	0	0	12.3%	0	0	0.3%	0	0	12.3%	0	0
A&E, Science, Computer	6.0%	1	0	10.5%	2	0	26.1%	12	2	0.2%	0	0	26.1%	6	1
Technical	12.2%	0	1	24.7%	7	1	20.8%	3	1	0.3%	0	0	20.8%	4	0
Sales	7.3%	0	0	33.7%	0	0	14.6%	0	0	0.3%	0	0	14.6%	0	0
Administrative Support	13.1%	0	0	36.0%	0	4	12.8%	0	2	0.3%	0	0	12.8%	0	0
Services	9.5%	0	0	54.2%	0	0	11.1%	0	0	0.2%	0	0	11.1%	0	0
Crafts	6.1%	0	0	49.1%	0	0	10.5%	0	0	0.3%	0	0	10.5%	0	0
Operative Workers	3.2%	0	0	73.3%	0	0	10.2%	0	0	0.1%	0	0	10.2%	0	0
Transportation	11.2%	0	0	61.1%	0	0	4.7%	0	0	0.4%	0	0	4.7%	0	0
Laborers	7.1%	0	0	69.6%	0	0	4.4%	0	0	0.3%	0	0	4.4%	0	0
TOTAL		1	1		9	5		16	5		0	0		11	1
														31	5
															5
															0

HOW TO READ TOTAL WORK FORCE SECTION:

The information blocks in Section 1 (Total Work Force) identify the absolute number of the firm's employees. Each employee is listed in their respective ethnic/gender and employment category. The percentages listed under the heading of "CLFA Goals" are the County Labor Force Availability goals for each employment and ethnic/gender category.

Mgmt & Financial
 Professional
 A&E, Science, Computer
 Technical
 Sales
 Administrative Support
 Services
 Crafts
 Operative Workers
 Transportation
 Laborers

TOTAL EMPLOYEES			Female Goals
ALL	M	F	
8	6	2	40.7%
0	0	0	53.9%
50	47	3	22.3%
23	20	3	48.9%
0	0	0	47.5%
9	0	9	69.6%
0	0	0	60.8%
0	0	0	9.2%
0	0	0	37.7%
0	0	0	16.0%
0	0	0	11.8%
TOTAL	90	73	17

HOW TO READ EMPLOYMENT ANALYSIS SECTION:

The percentages listed in the goals column are calculated by multiplying the CLFA goals by the number of employees in that job category. The number in that column represents the percentage of each protected group that should be employed by the firm to meet the CLFA goal. A negative number will be shown in the discrepancy column for each underrepresented goal of at least 1.00 position.

II. EMPLOYMENT ANALYSIS

	Black			Hispanic			Asian			American Indian			Filipino			Female		
	Goals	Actual	Discrepancy	Goals	Actual	Discrepancy	Goals	Actual	Discrepancy	Goals	Actual	Discrepancy	Goals	Actual	Discrepancy	Goals	Actual	Discrepancy
Mgmt & Financial	0.58	0	N/A	1.50	0	(1.50)	1.19	1	N/A	0.02	0	N/A	1.19	1	N/A	3.26	2	(1.26)
Professional	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00
A&E, Science, Computer	3.00	1	(2.00)	5.25	2	(3.25)	13.05	14	N/A	0.10	0	N/A	13.05	7	(6.05)	11.15	3	(8.15)
Technical	2.81	1	(1.81)	5.68	8	2.32	4.78	4	N/A	0.07	0	N/A	4.78	4	N/A	11.25	3	(8.25)
Sales	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00
Administrative Support	1.18	0	(1.18)	3.24	4	N/A	1.15	2	N/A	0.03	0	N/A	1.15	0	(1.15)	6.26	9	2.74
Services	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00
Crafts	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00
Operative Workers	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00
Transportation	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00
Laborers	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00	0.00	0	0.00

Goals are set by job categories for each protected group. An underrepresentation is indicated by a negative number, but if the DISCREPANCY is less than -1.00 position, a N/A will be displayed to show there is no underrepresentation.



City of San Diego
EQUAL OPPORTUNITY CONTRACTING (EOC)
 1010 Second Avenue • Suite 500 • San Diego, CA 92101
 Phone: (619) 533-4464 • Fax: (619) 533-4474

WORK FORCE REPORT

000155

ADMINISTRATIVE

The objective of the *Equal Employment Opportunity Outreach Program*, San Diego Municipal Code Sections 22.3501 through 22.3517, is to ensure that contractors doing business with the City, or receiving funds from the City, do not engage in unlawful discriminatory employment practices prohibited by State and Federal law. Such employment practices include, but are not limited to unlawful discrimination in the following: employment, promotion or upgrading, demotion or transfer, recruitment or recruitment advertising, layoff or termination, rate of pay or other forms of compensation, and selection for training, including apprenticeship. Contractors are required to provide a completed *Work Force Report (WFR)*.

CONTRACTOR IDENTIFICATION

Type of Contractor: Construction Vendor/Supplier Financial Institution Lessee/Lessor
 Consultant Grant Recipient Insurance Company Other

Name of Company: LEE & RO, Inc.

AKA/DBA: _____

Address (Corporate Headquarters, where applicable): 1199 S. Fullerton Road

City City of Industry County Los Angeles State California Zip 91748

Telephone Number: (626) 912-3391 FAX Number: (626) 912-2015

Name of Company CEO: M. Steve Ro

Address(es), phone and fax number(s) of company facilities located in San Diego County (if different from above):

Address: 10225 Barnes Canyon Road, Suite A-200

City San Diego County San Diego State California Zip 92121

Telephone Number: (858) 558-4411 FAX Number: (858) 558-9522

Type of Business: Engineering Type of License: _____

The Company has appointed: Pablo Viramontes

as its Equal Employment Opportunity Officer (EEOO). The EEOO has been given authority to establish, disseminate, and enforce equal employment and affirmative action policies of this company. The EEOO may be contacted at:

Address: 1199 S. Fullerton Road City of Industry, California 91748

Telephone Number: (626) 912-3391 Ext. 203 FAX Number: (626) 912-2015

- One San Diego County (or Most Local County) Work Force - Mandatory
- Branch Work Force *
- Managing Office Work Force

Check the box above that applies to this WFR.

**Submit a separate Work Force Report for all participating branches. Combine WFRs if more than one branch per county.*

I, the undersigned representative of LEE & RO, Inc.

(Firm Name)

San Diego, California hereby certify that information provided

(County)

(State)

herein is true and correct. This document was executed on this 1st day of May 2008

(Authorized Signature)

Frank M. Biehl

(Print Authorized Signature)

WORK FORCE REPORT - NAME OF FIRM: LEE & RO. Inc. DATE: May 1, 2008

OFFICE(S) or BRANCH(ES): City of Industry (Headquarters) COUNTY: Los Angeles

INSTRUCTIONS: For each occupational category, indicate number of males and females in every ethnic group. Total columns in row provided. Sum of all totals should be equal to your total work force. Include all those employed by your company on either a full or part-time basis. The following groups are to be included in ethnic categories listed in columns below:

- (1) Black, African-American
- (2) Hispanic, Latino, Mexican-American, Puerto Rican
- (3) Asian, Pacific Islander
- (4) American Indian, Eskimo
- (5) Filipino
- (6) White, Caucasian
- (7) Other ethnicity; not falling into other groups

OCCUPATIONAL CATEGORY	(1) Black		(2) Hispanic		(3) Asian		(4) American Indian		(5) Filipino		(6) White		(7) Other/Ethnicities	
	(M)	(F)	(M)	(F)	(M)	(F)	(M)	(F)	(M)	(F)	(M)	(F)	(M)	(F)
Management & Financial					1				1		3	2	1	
Professional														
A&E, Science, Computer	1		2		12	2			6	1	22		4	
Technical		1	7	1	3	1			4		6			
Sales														
Administrative Support				4		2						3		
Services														
Crafts														
Operative Workers														
Transportation														
Laborers*														

*Construction laborers and other field employees are not to be included on this page

Totals Each Column	1	1	9	5	16	5			11	1	31	5	5	
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Grand Total All Employees 90

Indicate by Gender and Ethnicity the Number of Above Employees Who Are Disabled

Disabled														
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Non-Profit Organizations Only:

Board of Directors														
Volunteers														
Artists														

000157 REQUEST FOR COUNCIL ACTION
CITY OF SAN DIEGO

1. CERTIFICATE NUMBER (FOR AUDITOR'S USE ONLY)
2900026 52
3. DATE: 05/27/2008 07/29

TO: CITY ATTORNEY
2. FROM (ORIGINATING DEPARTMENT): ENGINEERING & CAPITAL PROJECTS

4. SUBJECT: Amendment No. 5, Agreement with Lee & Ro Consulting Engineers, Inc. for Grit Processing Improvements Project

5. PRIMARY CONTACT (NAME, PHONE, & MAIL STA.): Darren Greenhalgh (619) 533-5660 MS.908
6. SECONDARY CONTACT (NAME, PHONE, & MAIL STA.): Asgharzadeh/Seymour (619)533-5105/533-4627 MS908
7. CHECK BOX IF REPORT TO COUNCIL IS ATTACHED

8. COMPLETE FOR ACCOUNTING PURPOSES

FUND	DEPT.	ORGANIZATION	OBJECT ACCOUNT	JOB ORDER	C.I.P. NUMBER	AMOUNT	9. ADDITIONAL INFORMATION / ESTIMATED COST:
41508	778	N/A	4118	176022	45-943.0	\$1,276,759	Agreement with Lee & Ro: Phase 1 \$ 1,025,120 ✓ Phase 2 \$ 1,609,242 ✓ Phase 3 \$ 300,000 Total Previously Authorized \$ 2,934,362 Phase 3 -FY'09 (This Request) \$ 976,759 Total Contract Cost \$ 3,911,121
							Original Agreement \$ 2,134,362 Amendment #1 \$ 0 Amendment #2 \$ 800,000 Amendment #3 \$ 0 Amendment #4 \$ 0 Amendment #5 \$ 976,759 Total Contract Cost \$ 3,911,121

10. ROUTING AND APPROVALS

ROUTE (#)	APPROVING AUTHORITY	APPROVAL SIGNATURE	DATE SIGNED	ROUTE (#)	APPROVING AUTHORITY	APPROVAL SIGNATURE	DATE SIGNED
1	ORIG. DEPT	<i>[Signature]</i>	6/5/08	9	C.O.O.	<i>[Signature]</i>	7/5/08
2	MWWD	APPROVAL SIGNATURES		10	CITY ATTORNEY	<i>[Signature]</i>	7/10/08
3	E.A.S.	ON FILE		11	ORIG. DEPT	<i>[Signature]</i>	7/14/08
4	EOCP						
5	DOCKET LIAISON	<i>[Signature]</i>	6/11				
6	FM-CIP/DEBT MGMT	<i>[Signature]</i>	6/27/08		DOCKET COORD:	<i>[Signature]</i>	7/16/08
7	AUDITOR	<i>[Signature]</i>	7/3/08		COUNCIL PRESIDENT	<input type="checkbox"/> SPOB <input checked="" type="checkbox"/> CONSENT <input type="checkbox"/> ADOPTION	
8	DEPUTY CHIEF	<i>[Signature]</i>	7/7/08		REFER TO:	COUNCIL DATE: 7/29/08	

11. PREPARATION OF: RESOLUTIONS ORDINANCE(S) AGREEMENT(S) DEED(S)

1. Authorize the Mayor or his designee to execute Amendment No. 5 with Lee & Ro Consulting Engineers, Inc. for the Grit Processing Improvements Project in CIP 45-943.0, Point Loma - Grit Processing Improvements in an amount not to exceed \$976,759, and; (Please see continuation page)

11A. STAFF RECOMMENDATIONS: Adopt the Ordinance

12. SPECIAL CONDITIONS (REFER TO A.R. 3.20 FOR INFORMATION ON COMPLETING THIS SECTION.)

COUNCIL DISTRICT(S): 2 (Falconer)

COMMUNITY AREA(S): Point Loma (2)

ENVIRONMENTAL IMPACT: This activity is statutorily exempt from CEQA pursuant to State CEQA Guidelines Section 15262. (Feasibility and Planning)

CHARTER REQUIREMENTS: In accordance with Charter Section 99, this ordinance must be adopted by a 2/3 majority vote by Council after holding a public hearing which will be noticed in the newspaper at least 10 days in advance.

ATTACHMENTS: 4 signed original, Amendment No. 5 agreements, Determination Form, Consultant Award Tracking Form

CITY CLERK INSTRUCTION: Upon Council approval, please forward two (2) copies of the 1472 and Ordinance to Joanne Ferrer at Project Implementation & Technical Services Division, MS 908A.

000158

SECTION 11 – PREPARATION OF: RESOLUTIONS, ORDINANCES, ETC. (CONTINUED):

2. Authorizing the additional expenditure of \$976,759 from CIP 45-943.0 Point Loma – Grit Processing Improvements, Fund 41508, Metro Sewer Utility Fund, for the purpose of executing this agreement, contingent upon the City Comptroller furnishing one or more certificates certifying that funds necessary for expenditure under established contract funding phases are, or will be, on deposit with the City Treasurer, in the following manner:
 - a) \$976,759 from Fiscal Year 2009 appropriations, contingent on City Council approval of funds for this purpose in the Fiscal Year 2009 CIP Budget, and;

3. Authorizing FY 2009, Phase III of \$1,276,759 with Lee & Ro Consulting Engineers, Inc. for the Grit Processing Improvements Project.

000160

EQUAL OPPORTUNITY CONTRACTING:

Funding Agency: City of San Diego
Goals: 15% Voluntary (MBE/WBE/DBE/DVBE/OBE)
Sub consultant Participation: \$112,500 Certified Firms (11.52%)
\$ 50,000 Other Firms (5.12%)
Other: Workforce Report Submitted- Equal Opportunity Plan required. Staff will monitor plan and adherence To Nondiscrimination Ordinance.

FISCAL CONSIDERATIONS:

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The total cost for professional engineering services with Lee & Ro Consulting Engineers, Inc. of \$3,911,121 may be reimbursed approximately 80% by current or future debt financing. This agreement is scheduled to be phase funded thru FY2009. No future funding is anticipated for this agreement.

PREVIOUS COUNCIL AND COMMITTEE ACTIONS:

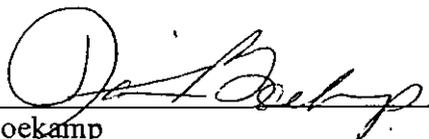
Council approved this project on December 5, 2000 (R-294342, \$2,134,362). On February 13, 2002 Council approved Amendment #1 (C-10619), December 9, 2002 Amendment #2 (R-297457, \$800,000), June 20, 2005 Amendment #3 (00-19391) and January 18, 2006 Amendment #4 (C-13612). The Committee on Natural Resources and Culture on June 25, 2008, consent motion by Councilmember Faulconer, second by Councilmember Peters. Vote to approve 4-0.

COMMUNITY PARTICIPATION AND PUBLIC OUTREACH EFFORTS:

N/A

KEY STAKEHOLDERS & PROJECTED IMPACTS (if applicable):

Upon approval of Amendment No. 5, Lee & Ro Consulting Engineers, Inc. will receive an additional \$976,759 towards their contract, bringing the total contract amount to \$3,911,121. Funds for the construction contract estimated to be greater than \$30,000,000 for this project will be requested later at the time of bidding.


Patti Boekamp
Director, Engineering & Capital Projects


David Jarrell
Deputy Chief of Public Works

000163

DETERMINATION FORM

CONFLICT OF INTEREST CODE:
DETERMINATION OF APPLICABILITY TO CONSULTANT

Name of Consultant & Company:

Lee & Ro Consulting Engineers Inc
1025 Barnes Canyon Rd. Suite A-201
San Diego, Ca. 92121

Consultant Duties:

H031198, Provide Engineering Design,
bid services and Construction
Administration services to the Point
Loma Grit Processing Improvements
Project through the completion of project
expected to run through 2013

Disclosure determination:

- Consultant will not be "making a government decision" or "serving in a staff capacity" as defined in Sections A and B attached. No disclosure required.
- Consultant will be "making a government decision" or "serving in a staff capacity" as defined in Sections A and B attached. Consultant is required to file a Statement of Economic Interests with the City Clerk of the City of San Diego in a timely manner as required by law.

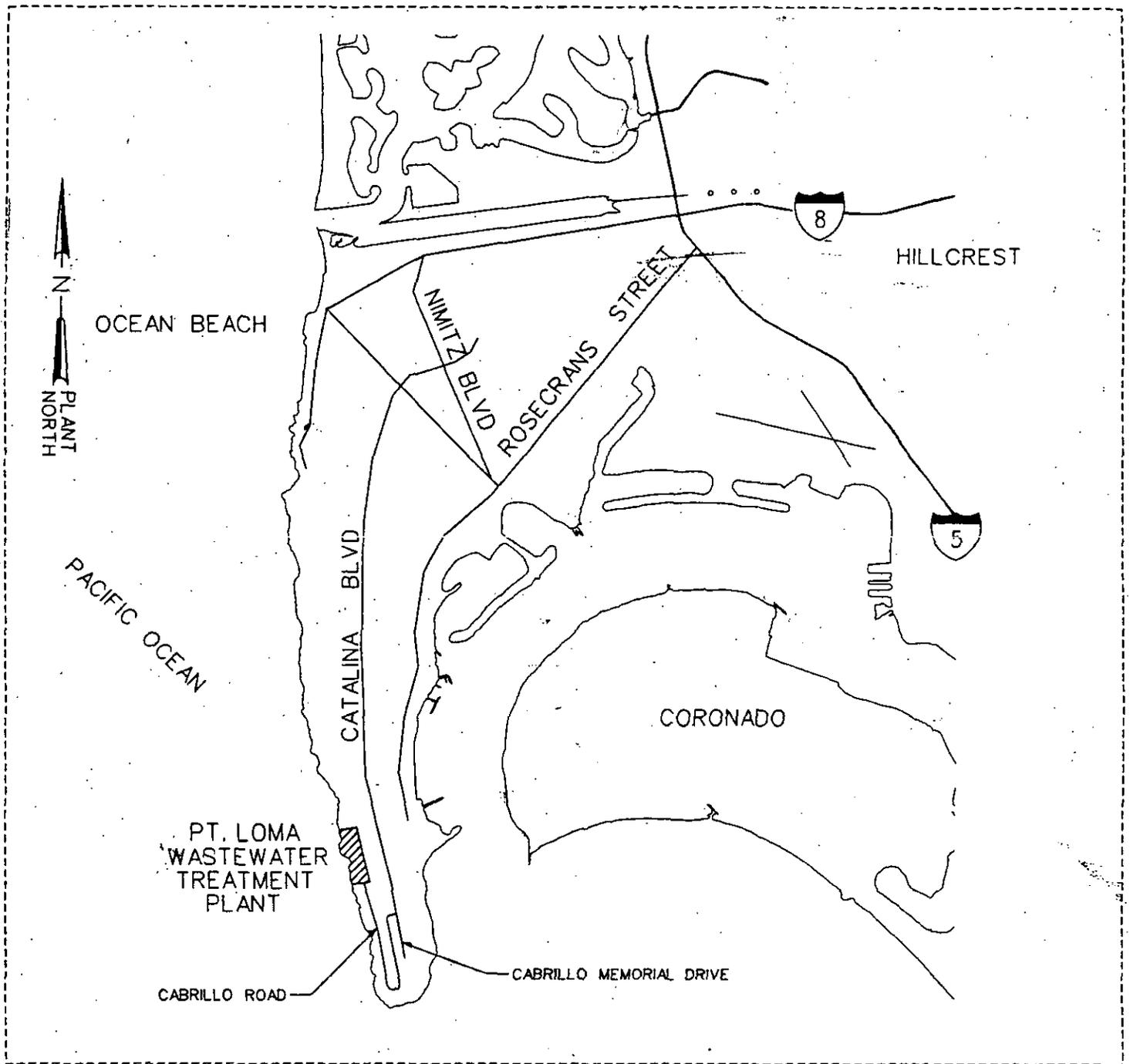
Disclosure required to the broadest level.

Disclosure required to a limited extent:

By: 
F. Stuart Seymour, P.E.

4-29-2008
Date

*Forward a copy of this form to the Consultant to notify them of the determination.
*Forward a copy of this form to the City Clerk's office to go on file for reporting purposes.



LOCATION MAP



000167

THE CITY OF SAN DIEGO

CONSULTANT AWARD TRACKING FORM

Consultant Award Tracking Form: The purpose of this form is to track the cumulative amount of money awarded to both architectural and engineering (A&E) firms and non-A&E firms; and to ensure that the cumulative amount of money awarded to consultant does not exceed \$250,000 in a fiscal year including this contract. If this cumulative award limit is exceeded, inclusive of this contract award, Council approval is required.

A copy of this form must be attached to Forms PA-700, PA-2159, CM-1544, 1472, DP's and PO's for processing. In addition to this, a copy is to be sent to the Consultant Services Coordinator.

THIS SECTION TO BE COMPLETED BY CITY STAFF

Date: 4-28-08 Department Name: ENGINEERING & CAPITAL PROJECTS
City Project Manager: STUART SEYMOUR Phone: 619 533-4627
Name of Firm: LEE & RO CONSULTING ENGINEERS INC
Project Name: GRIT PROCESSING IMPROVEMENTS Contract Amount: 3,911,121

Appropriate approval authority:

- Department Approval: See Section 5 of A.R. 25.60, and Section 5.2 of AR 25.70 for non-A&E firms
City Manager: See Section 6 of AR 25.60 and Section 6 of AR 25.70 for non-A&E firms
City Council: See Section 7 of AR 25.60

THIS SECTION TO BE COMPLETED AND REVIEWED BY CONSULTANT (Prior to the interview process)

The City reserves the right to disqualify any Consultant from the interview process if this tracking form is not completely and accurately executed prior to the consultant's contract award.

If it is determined subsequent to the contract award that this tracking form was not accurately executed, the underlying contract will be illegal and deemed void pursuant to Municipal Code Section 22.0226. In such an instance, the City shall not be responsible for any losses or damages which may result from the void contract and reserves the right in its sole discretion to award the contract to another Consultant.

Dollar Amount Awarded by the City of San Diego this fiscal year (July 1 through June 30)

Including this contract: \$ 976,759

I hereby certify that I am an authorized representative of:

LEE & RO, INC

(Name of Firm)

and that I have read and understand this form this 29 day of MAY, 2008

(Day)

(Month)

(Year)

By JOHN M. STEIN (Typed Name of Authorized Representative)

(Signature of Authorized Representative)

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ORDINANCE NUMBER O-_____ (NEW SERIES)

DATE OF FINAL PASSAGE _____

AN ORDINANCE AUTHORIZING THE MAYOR TO EXECUTE
A FIFTH AMENDMENT TO AN AGREEMENT WITH LEE &
RO CONSULTING ENGINEERS, INC. FOR THE GRIT
PROCESSING IMPROVEMENTS PROJECT

BE IT ORDAINED, by the Council of the City of San Diego, as follows:

1. That the Mayor or his designee is authorized to execute a Fifth Amendment to the Agreement with Lee & Ro Consulting Engineers, Inc. for Grit Processing Improvements Project [the Amendment] under the terms and conditions set forth in the Amendment on file in the office of the City Clerk as Document No. RR _____.

2. That an additional expenditure in an amount not to exceed \$1,276,759 from Fund 41508, CIP 45-943.0 Point Loma – Grit Processing Improvements, Metro Sewer Fund is authorized to provide funds for Phase III to the Agreement with Lee & Ro Consulting Engineers, as amended.

3. That the City Comptroller is authorized, upon advice from the administering department, to transfer excess budgeted funds, if any, to the appropriate reserves.

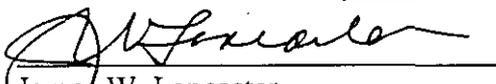
4. That this activity is covered under E.I.R. Addendum No. 42.0358 (Grit Processing Facilities Improvements). This activity is adequately addressed in the environmental document and there is no change in circumstance, additional information, or project changes to warrant additional environmental review. Because the prior environmental document adequately covered this activity as part of the previously approved project, the activity is not a separate project for purposes of CEQA review pursuant to CEQA Guidelines Section 15060(c)(3).

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5. That a full reading of this ordinance is dispensed with prior to its final passage, a written or printed copy having been available to the City Council and the public a day prior to its final passage.

6. That this ordinance shall take effect and be in force on the thirtieth day from and after its final passage.

APPROVED: MICHAEL J. AGUIRRE, City Attorney

By 
James W. Lancaster
Deputy City Attorney

JWL:ca
7/09/08
Aud. Cert: AC 2900026
Or.Dept: E&C
O-2009-6

I hereby certify that the foregoing Ordinance was passed by the Council of the City of San Diego, at this meeting of _____.

ELIZABETH S. MALAND
City Clerk

By _____
Deputy City Clerk

Approved: _____
(date)

JERRY SANDERS, Mayor

Vetoed: _____
(date)

JERRY SANDERS, Mayor

**CITY OF SAN DIEGO
METROPOLITAN WASTEWATER DEPARTMENT**

AGREEMENT

FOR

PROFESSIONAL ENGINEERING SERVICES

BETWEEN

CITY OF SAN DIEGO

AND

LEE & RO, INC.

FOR

**POINT LOMA WASTEWATER TREATMENT PLANT
GRIT IMPROVEMENT PROJECT**

AMENDMENT NO. 5

WHEREAS, on December 5, 2000, the CITY entered into an AGREEMENT with the CONSULTANT for Professional Engineering Services including design and bidding services during construction, testing and start-up for Grit Improvements at the Point Loma Wastewater Treatment Plant, the original of which is on file in the Office of the City Clerk as Document No. RR-294342; and

WHEREAS, the parties subsequently amended the AGREEMENT as follows: Amendment No. 1 filed on February 13, 2002 as Document No. C-10619; Amendment No 2 filed on December 9, 2002 as Document No. RR-297457; Amendment No. 3 filed on June 20, 2005 as document No. 00-19391; and Amendment No. 4 filed on January 18, 2006 as document No. C-13612:

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WHEREAS, the CITY and the CONSULTANT mutually desire to further amend the AGREEMENT, as amended, to reschedule the beginning of Funding Phase 3 from FY07 to FY09; extend the AGREEMENT to October 31, 2012; increase the AGREEMENT amount by \$976,759 from \$2,934,362 to \$3,911,121; and to incorporate revisions/updates to the Scope of Work, and Compensation and Fee Schedule.

NOW THEREFORE, the CITY and the CONSULTANT agree to amend the AGREEMENT, as amended, as follows:

1. SECTION 4 - COMPENSATION AND PAYMENTS

FROM: 4.1 Compensation

4.1.2 The work to be performed under this AGREEMENT shall be performed during the 3 separate and specific phases identified in the Funding Schedule below.

<u>FUNDING SCHEDULE</u>		
<u>Funding Phases</u>	<u>Dates</u>	<u>Not to Exceed Amount</u>
1	From date of execution of Contract thru date of Completion of Contract	\$1,025,120
2	July 1, 2005 thru Completion of Contract	\$1,609,242
3	July 1, 2006 thru Completion of Contract	\$300,000

TO:

4.1.2 The Work to be performed under this AGREEMENT shall be performed during the three (3) separate and specific phases identified in the funding schedule below:

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<u>Funding Phases</u>	<u>Dates</u>	<u>Not to Exceed Amount</u>
1	From date of execution of Contract thru date of Completion of contract	\$1,025,120
2	July 1, 2005 thru Completion of contract	\$1,609,242
3	August 1, 2008 thru Completion of contract	\$1,276,759
TOTAL		\$3, 911,121

2. This AMENDMENT NO. 5 incorporates the following exhibits attached herein:

2.1 Attachment A: EXHIBIT A-5, revised/updated SCOPE OF WORK

2.2 Attachment B: EXHIBIT B-5, revised/updated SCHEDULE OF DELIVERABLES

2.3 Attachment C: EXHIBIT C-5, revised/updated COMPENSATION AND FEE

SCHEDULE

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This AMENDMENT NO. 5 to the AGREEMENT, and AMENDMENTS No. 1, No. 2, No. 3, and No. 4 thereto, shall affect only the page(s) and paragraph(s) and/or terms and conditions referred to herein. All other elements of the AGREEMENT shall remain in full force and effect.

IN WITNESS WHEREOF, this Agreement is executed by the City of San Diego, acting by and through its Mayor, pursuant to City Council Ordinance _____, authorizing such execution, and by the Construction Management Professional.

LEE & RO, INC.

THE CITY OF SAN DIEGO
A Municipal Corporation

BY: *M. Steve Ro*
Name: *M. Steve Ro*
Title: *President*

By: _____
Mayor or Designee

Date: *06/25/08*

Date: _____

I HEREBY APPROVE the form and legality of the foregoing AMENDMENT this _____ day of _____, 20__.

MICHAEL AGUIRRE, City Attorney

By _____
Deputy City Attorney



EXHIBIT A-5

SCOPE OF WORK

GRIT PROCESSING IMPROVEMENTS PROJECT
at the

POINT LOMA WASTEWATER TREATMENT PLANT

AMENDMENT No. 5

PHASE A - DESIGN

GENERAL

The Pt Loma WTP Grit Processing Improvements Project (Proposed GIP) is defined as one CITY project. The scope consists of the CONSULTANT's engineering services for facility design, and during the bidding, construction and start up phases of the project.

The proposed GIP site is located at the Pt Loma Wastewater Treatment Plant (Pt. Loma WTP) and is shown on Attachment A (site plan). The following scope of work defines the CONSULTANT's scope of work for detailed design.

The CITY prepared the Project Definition Report dated September 1, 1999, for the GIP. The Project Definition Report includes the definition and scope of the GIP. The purpose of the Project Definition Report was to resolve those issues which most significantly impact the overall project definition, cost and implementation, and to provide the basis to scope detailed design services.

The Project Definition Report resolved specific major and/or site-specific issues and set criteria for system interface requirements, site development and layout, architectural definition, process selection and sizing. This document, along with the City of San Diego, CWP Program Guidelines and Standards (most current revision) define the scope of work for detailed design activities.

This design amendment will be pick up the original design at the sixty (60%) percent level and carry it through to completion. It will revise the existing design to include the latest updates and revisions in the building codes and requirements. It will also reflect the latest construction upgrades and improvements at the Pt Loma WTP

PROJECT DESIGN SUMMARY

The project improvements to be accomplished in this project and the related projects to be coordinated with can be summarized as including, but not limited to, the following:

00 Headworks

Summary of Project Improvements:

The improvements for this area can be summarized as follows:
Raise the flume gates for the central and south grit tanks.

Expansion and modification of the ferric chloride feed systems. The existing ferric chloride feed systems will be expanded as required to feed ferric chloride to the flumes for south grit tanks S1 and S2.

Summary of Coordination with Other Projects:

The coordination to be accomplished with other project design work is as follows:

Presently no other projects are taking place in the area of GIP. However this is an operating treatment plant and projects may take place. The CONSULTANT shall investigate the existing plant changes since the original design to confirm field changes and upgrades since the original design.

Grit Removal Facilities

Summary of Project Improvements:

The improvements for this area can be summarized as follows:

The south aerated grit removal tanks will be almost completely demolished (as shown in PDR) then rebuilt

Modification of the influent channels to both south grit tanks and construction of a new effluent channel for south grit tank S2 (west tank)

Provide new equipment for collecting grit from the tanks including new grit pumps, grit slurry and agitation air piping for the new south grit tanks, and provision of a duplex sump pumps installation in the new south grit pumps gallery

A new below grade grit pumps gallery to be coordinated with the existing gallery.

The new below grade grit pumps gallery will include connection of flushing water and purge water piping from the plant industrial water system (W2). New piping also will include scour air piping connected to the actuator air system (AA)

A new grit processing equipment building will be constructed to serve all of the grit tanks. It will contain new grit processing equipment for separating, classifying and dewatering grit, and drive-through load-out grit storage hoppers.

Grit discharged into the grit storage hoppers will be generated from both aerated grit removal tanks and the optional digesters/ influent tunnel cleaning station.

Provision of a Teacups™/ Snail™ grit processing unit under Project H-3R will provide an opportunity to evaluate this equipment for a period of time prior to finalizing the GIP

design documents. If the unit performs as claimed, this type of equipment will be specified in GIP, including relocation of the unit installed under Project H-3R.

Relocation of the two Teacups™ and Snail™ and grit storage hopper (if practical) provided under Project H-3R. (Note: A bypass plan for grit removal during this construction work shall be prepared under this contract by the CONSULTANT).

Connection of the new south grit pumps gallery to the existing north and central grit pumps gallery and to the main sludge pumps gallery

Re-routing the north and central grit pumps discharge piping via the existing and new galleries to the new grit processing equipment building.

Construction of a redundant grit slurry discharge manifold from each central grit removal tank to the new grit channel.

The 60-foot long level portion of each influent channel shall be provided with agitation air (ALP) at the floor level to prevent significant grit deposition.

New 316 stainless steel (or other approved materials) access hatch in the top of the existing south grit tanks effluent channel

Recommended modifications for the north grit tanks for GIP include re-routing the grit slurry discharge piping from the isolation valves downstream of the eight flow meters to the new grit processing equipment building, via the existing and new below grade grit pumps galleries.

Recommended modifications for the central grit tanks for GIP include provision for a redundant grit slurry discharge manifold from each central grit tank to the new grit processing equipment, and re-routing the grit slurry discharge piping from the isolation valves downstream of the six flow meters to the new grit processing equipment building, via the existing and new below grade grit pumps galleries.

Summary of Coordination with Other Projects:

Refer to above

The CITY and CONSULTANT recognize that the Project Definition Report incorporates decisions by the CITY for the purpose of establishing project definition; however, it does not necessarily represent the level of project engineering required for facilities refinement, optimization, and quality control which must occur during the final design effort to produce a quality construction level document.

The CONSULTANT is responsible to exercise the appropriate level of engineering to advance the project definition described in the aforementioned documents to a complete and properly coordinated construction level document. Therefore, the CONSULTANT will perform the engineering tasks necessary to refine and optimize the project definition through further development of the predesign, alternative evaluations, efficient layout and utilization of equipment and materials, attention to operational health and safety, and quality assurance and

quality control (QA/QC). Therefore, the CONSULTANT shall take full responsibility for the final design of all tasks authorized by the CITY.

The design proposal is based on the preliminary schedule of deliverables included in Exhibit B

TASK 1 - CITY MANAGEMENT SUPPORT

Provide management and technical support to the CITY in the execution of the Proposed GIP Design. Provide continuous presence in San Diego by technical design management personnel during the design process. Attend meetings as requested by the CITY and coordinate the preparation of supporting materials as required. Coordination meetings, and deliverables are identified in the subsequent subtasks and elsewhere throughout this Scope of Work.

1.1 PROGRESS MEETINGS AND REPORT

Prepare the meeting agenda and attend 6 monthly project status report meetings with the CITY personnel in Metropolitan Wastewater Department (MWWD) offices. Prepare and submit five (5) days in advance of the meeting, Technical Memorandum on key issues (and monthly status report) to be addressed at the meetings. Provide technical representation at the meeting to respond to CITY questions on the key issues. Provide meeting minutes to the CITY within 5 working days of the meeting. All meetings must be attended by the CONSULTANT's Project Manager or Project Officer and appropriate technical representatives to address technical issues raised during the meeting.

Meeting topics will include:

- Review previous meeting minutes
- Progress
 - Budget
 - Schedule and cost monitoring
- Deliverable status
 - Submitted deliverables
 - Scheduled deliverables
- Project issues and recommended resolutions
- Deviation request status
- Coordination with other related Projects

The meetings should include discussion of deliverables that may be delayed and corrective actions to meet schedules. This should consider required coordination with other projects in order to avoid delays. Each meeting will be limited to four hours in length exclusive of meeting preparation and follow-up minute preparation effort.

DELIVERABLES (1 copy each):

Meeting agenda.

Meeting minutes.

Monthly progress reports which includes:

- a) Written narrative report on the status of work along with listings of those tasks to commence, be completed, or in need of acceleration.
- b) Project schedule update with percent complete values provided by task and subtasks with those tasks and subtasks behind schedule highlighted.
- c) Permitting updates.
- d) Coordination with other projects.
- e) Technical Memoranda.
- f) Updated project expenditure curve.
- g) Updated earned value curve.
- h) Current deviation report.
- i) Cost management report defining the current construction cost estimate for the project based on approved deviations.
- j) Project issues report with a schedule for resolution of outstanding issues.
- k) MBE/WBE participation reports.

A copy of each Deliverable to be provided to the CITY OF SAN DIEGO Document Control section, which shall assign a document control number, and distribute.

1.2 SCHEDULE/ENGINEERING AND COST MONITORING

Prepare and maintain a project specific schedule as a tool in managing and monitoring project progress. The schedule shall include project tasks, task interrelationships, milestones, and intermediate and final project deliverables in accordance with Chapter 3, Volume I of the Guidelines. The CONSULTANT shall coordinate the development of the schedule with the CITY to have the schedule be agreeable to the CITY OF SAN DIEGO. The schedule shall incorporate the work breakdown structure format being used by the CITY OF SAN DIEGO.

Prepare a monthly document status report that will list all deliverables and define current progress and scheduled completion dates. The report will itemize information at the task level within each project phase, and be provided as an appendix to the monthly progress report.

Within 30 days from issuance of Notice to Proceed (NTP) to the CONSULTANT, the CONSULTANT will prepare and submit a cost loaded schedule. This cost loaded schedule will clearly identify costs and percentage complete for each task for intermediate and final deliverables and associated milestones.

DELIVERABLES (1 copy):

Schedule with cost loading.

1.3 RECORDS MANAGEMENT

The CONSULTANT shall establish a Document Control System that is compatible with the MWWDC Records Management Document Control System as outlined in Volume X of the CWP Guidelines.

1.4 COORDINATION WITH OTHER CITY PROJECTS

This project is an integral part of a large wastewater treatment system and will require coordination and design interface with other MWWD projects. This subtask is based on coordination with other projects identified in the Project Definition Report and other planning documents, and summarized above in the General Design section.

The CONSULTANT shall coordinate flow rates, pressure, material, and data requirements with consultants of related projects. The CONSULTANT and CITY will define and agree to locations and methods to connect to each adjoining project. Drawings will be provided by the CONSULTANT to the Consultants of the connecting projects to identify horizontal, vertical, and alignment conditions associated with each point of contact interface. Responsibilities for final connection will be established based on the last contractor scheduled to perform construction work at the point of connection. Drawings of associated connecting projects shall be provided by the city to the CONSULTANT at the earliest possible time to avoid project delays.

The CONSULTANT shall provide appropriate information regarding Proposed GIP facilities design criteria to the Designer of the other referenced projects in order to facilitate design of the facilities. Additionally, it is anticipated that the CONSULTANT shall be required to provide information to, and coordinate with the other referenced projects for the following issues:

- 1) Architectural and Structural issues
- 2) Electrical Power Distribution issues
- 3) Distributed Control System Coordination, phone, and plant security issues including control interfaces.
- 4) Plant process design and adjustments
- 5) Construction Staging and Contractor's limits.

It is anticipated that the CONSULTANT shall be required to coordinate the impacts of the Proposed GIP on the existing facilities at the Pt. Loma WTP. This Scope of Work does not include modification to existing Pt. Loma WTP to adapt to the design of the Proposed GIP. It is assumed that the CITY shall furnish drawings, associated computer files, and drawings for use as guidance material by the CONSULTANT during Proposed GIP design.

This task includes necessary meetings, field trips, minor engineering revisions, and all other activities which are required to provide a full coordination effort to make the facility operational and functional. The Consultant's level of effort for coordination with the other project consultants shall include up to ten (10) meetings, 4 hours each meeting and attended by 2 persons.

1.5 KICK-OFF MEETING

The CITY shall conduct a one-day meeting and the CONSULTANT shall commit the following personnel to attend:

- 1) An Officer of the CONSULTANT's firm
- 2) The Project Manager of the CONSULTANT's firm
- 3) The major task leaders
- 4) A representative from each Major Subconsultant

TASK 2 - PROJECT DESIGN TEAM MANAGEMENT

2.1 MONTHLY PROJECT STATUS REPORTS

Preparation of 6 monthly status reports will include the following:

Narrative report on the status of each task to commence, be completed, or be in need of acceleration.

Project schedule updates with percent complete values provided by task and sub-tasks with those tasks and sub-tasks behind schedule highlighted. Project issues report with a schedule for resolution of outstanding issues.

Updated schedule.

DELIVERABLES (5 copies each):

Monthly project status reports.

2.2 QUARTERLY CONTRACT ACTIVITY REPORTS

Prepare quarterly Contract Activity Reports as defined in Volume 1, Chapter 2 of the Guidelines.

DELIVERABLES (2 copies each):

TASK 3 - NOT IN CONTRACT (Unchanged)

TASK 4 - NOT IN CONTRACT (Unchanged)

TASK 5 - INVESTIGATIONS (Unchanged)

TASK 6 - DESIGN DEVELOPMENT (Unchanged)

TASK 7 - FINAL DESIGN

The CONSULTANT shall prepare documents for the following improvements:

- Initial Proposed GIP site preparation including site power.
- All Proposed GIP Civil site improvements
- All Proposed GIP Mechanical/Process/HVAC improvements.
- Instrumentation and Control/DCS System Package including Proposed GIP Surveillance Systems and the Proposed GIP Communication Systems. (See Paragraph 6.3.4 for additional information on this package).

Final design drawings shall be submitted to the CITY in Intergraph format in accordance with CADD guidelines. The CITY will provide the CONSULTANT with CWP standard drawings and details in Intergraph format.

Data base information shall include instrument equipment and piping information necessary for design and preparation of technical specifications. The databases shall be formatted for the future addition by others of construction-and maintenance-related information. Wiring and raceway schedules shall be provided in the design for assistance in contractor bidding. Process equipment and instrument lists shall be developed from the interactive databases.

The CONSULTANT shall incorporate design features to mitigate excessive noise from process equipment to meet applicable OSHA and other regulatory requirements and mitigate ambient noise levels.

The CONSULTANT shall retain the services of a fiber reinforced plastic (FRP) speciality firm to perform a complete and detailed design of all FRP elements. The services shall include the preparation of construction drawings of the FRP vessels, ducting as required. Fabrication specifications detailing FRP materials, laminate sequences and thicknesses, performance of piping stress analysis, installation guidelines and all other services necessary to render the FRP design complete and biddable shall be prepared.

Copies of intermediate design products shall be submitted to the CITY as described under DELIVERABLES, in this Task. All specifications shall also be provided in Microsoft Word format (latest version) in accordance with the CWP Program Guidelines. The CITY will provide the CONSULTANT with all of the CWP master construction specifications in this latest version format. The CONSULTANT shall address all CITY comments prior to the final submittal, and provide a written response to each comment. The following applies to this Final Design Phase:

- Task 6 scope descriptions will apply as appropriate.

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- For design team members using Autocad, one typical drawing per discipline and all appropriate reference files shall be translated into Intergraph and submitted in electronic media at each submittal. For those using Intergraph all drawings will be submitted in electronic media. At final design all drawings will be submitted in Intergraph electronic media per the guidelines.
- CONSULTANT shall provide Divisions 2 through 16 of the Specification in accordance with the Clean Water Program Guidelines for Design Consultants. MWW shall provide Division 0 and 1 of the Specifications, and CONSULTANT shall review.

7.1 (Unchanged)

7.2 NINETY PERCENT LEVEL OF FINAL DESIGN

Perform the design to advance the 60 percent submittal to 90 percent level. CONSULTANT shall incorporate agreed upon CITY comments from the 60 percent submittal.

The CONSULTANT shall identify and develop the following:

- Engineering ranges and set points (analog signals)
- Open and close state description (discrete signals)
- Alarm priorities
- Fail safe alarm
- Restarting and sequencing equipment after a power outage

The 90 percent level of final design is a complete set of construction drawings and specifications prepared by the CONSULTANT that only requires CITY review to become final design documents.

DELIVERABLES:

90 percent drawings for each construction package.

90 percent specifications, Division 2 through 16, specific for each construction package.

The 90 percent design deliverable shall be submitted as ten (10) hard copies (drawings will be 11" x 17"), and ten (10) full size drawing sets and twenty (20) specifications. Electronic media shall be in accordance with the CADD Guidelines in Appendix A2 of the CWP Program Guidelines.

7.3 ONE HUNDRED PERCENT DESIGN SUBMITTAL

Perform design to advance the 90 percent submittal to final level completion by incorporating agreed upon CITY review comments on the 90 percent submittal.

DELIVERABLES:

Provide 100 percent drawings.
Provide 100 percent specifications, Division 2 through 16.

The 100 percent design deliverable shall be submitted as twenty (20) hard copies (drawing size will be 11" x 17") and ten (10) full size hard copies (drawings size will be 24" x 36") and thirty (30) specifications. Electronic media shall be in accordance with the CADD Guidelines in Appendix A2 of the CWP Program Guidelines.

7.4 FINAL DESIGN SUBMITTAL

The CONSULTANT shall incorporate agreed upon CITY review and plan check comments on the 100 percent design submittal into a final design submittal. Response to Requests for Information from CITY of San Diego Development Services Department, Plan Check Section, including meetings, telephone and written communication, are included in this task. Final CITY review and plan check comments will be provided in this phase. Final design services shall include preparation of originals of final construction drawings and specifications.

DELIVERABLES:

Three ½-size sets of plans.
Three sets of specifications.
Final design drawings.
Final Specification, Division 2 through 16 specific.

The final design deliverables of plans shall be submitted as one set of reproducible mylars and also on electronic media in accordance with the CADD Guidelines in Appendix A2 of the CWP Program Guidelines.

Specifications shall be provided on Microsoft Word files with one full size "camera ready" copy delivered. Database shall be provided as one hard copy and also on electronic media.

7.5 I & C PROVIDER

The CONSULTANT shall prepare prequalification documents for the selection of the I & C Subcontractor. The CONSULTANT shall evaluate the prequalification documents submitted by the potential providers and make recommendation to the CITY of those prequalified.

DELIVERABLES:

Draft Prequalification documents
Final Prequalification documents

TASK 8 - (Unchanged)

TASK 9 - DESIGN REVIEWS AND APPROVALS

9.1 DESIGN COMPUTATION REVIEW AND COORDINATION CHECKING

Compile final project calculations and computations into a design notebook. All calculations shall be stamped and signed by the appropriate, responsible, licensed engineer. Calculation sheets shall indicate person responsible for the independent calculation/plan check. Only computations relating to final designed facilities are to be included in the design notebook.

The CONSULTANT shall prepare and submit a QA/QC Project Plan.

Perform QA/QC checking on design drawings, prior to submittal to the CITY, to verify drafting accuracy. The final design drawings shall be signed by both the design engineer and the engineer who performed the QA/QC checking.

Perform coordination checks to verify consistency between disciplines and facilities.

The CONSULTANT shall prepare and submit QA/QC Implementation Supplements as described in Chapter 12, Volume 1 of the CWP Guidelines.

DELIVERABLES:

QA/QC Program Plan.
 Preliminary design calculation at 100% and Final design phase.
 Final Design Notebooks to CITY (2 copy).
 QA/QC Implementation Supplements at the 90, 100 percent design submittals.

9.2 CITY REVIEW

Design products of the 90 and 100 percent levels of design shall be submitted to the CITY for review. The CITY will collect review comments, will resolve conflicts, and will provide one hard copy and one electronic copy of all review comments within 30 calendar days of receipt of CONSULTANT submittal, excluding VE comments. CITY review comments will be summarized in standard text with a space provided for CONSULTANT responses regarding action taken on the review comment. Corrections noted shall be made by the CONSULTANT at no additional cost to the CITY. CONSULTANT and CITY will resolve review comments and the CONSULTANT shall incorporate accepted review comments.

Participate with CITY in conducting operation and maintenance and bid ability and constructability reviews of intermediate design products at the 90 and 100 percent design completion stages. CONSULTANT shall incorporate accepted review comments, at no additional cost to the CITY. A comment resolution meeting shall be held one week after City comments have been received by the CONSULTANT. The CONSULTANT shall prepare documentation showing the resolution of all CITY review comments on the comment review form by changing the "Consultant Response" column heading to "Resolution" and noting agreed upon resolution in different text style or font.

DELIVERABLES:

Comment review form with responses Memoranda responding to CITY review comments following the 90 and 100 percent complete submittal reviews.

Attend four review meetings, one day in length each and attended by no more than two (2) staff members.

TASK 10 - VALUE ENGINEERING (Unchanged)

TASK 11 - CONSTRUCTION COST ESTIMATES

CONSULTANT shall prepare cost estimates in accordance with Chapter 4, Volume I, of the CWP Guidelines. In developing these cost estimates. Data for the various work categories and disciplines will be prepared in Microsoft Excel spreadsheet format or G2. For submission to CITY, this data will be converted into a format that provides direct file interchange with the most current version of G2 Estimator which is utilized by CITY OF SAN DIEGO.

11.1 PREPARE 10 PERCENT CONSTRUCTION COST ESTIMATE (Unchanged)

11.2 PREPARE 30 PERCENT CONSTRUCTION COST ESTIMATE (Unchanged)

11.3 PREPARE 60 PERCENT CONSTRUCTION COST ESTIMATE (Unchanged)

11.4 PREPARE 90 PERCENT CONSTRUCTION COST ESTIMATE

The CONSULTANT shall develop quantity surveys and prepare construction cost estimate based on current ENR.

The level of accuracy of the construction cost estimate at this level of project definition will be Class A as a definitive estimate as established by AACE. The cost estimate will be presented in the format described by the cost estimating guidelines. A narrative, describing the basis for the cost estimate, including a description of the Work Breakdown Structure, will be included. Written quotes for major cost items will be part of the narrative.

Meet with the CITY to review the construction cost estimate and resolve major differences in the two estimates.

DELIVERABLES (10 copies):

Opinion of cost (excluding operation and maintenance) of the construction package and possible equipment procurement packages.

Consultant responses to City review comments on previous cost estimate submittal.

11.5 FINAL PRE-BID CONSTRUCTION COST ESTIMATE

Update the 90% estimate which will be compared and coordinated with the construction manager's estimate to incorporate any project revisions since the preparation of the 90% estimate. No new quantity surveys or repricing of unit quantities will be performed in the update of the 90% estimate. The definition and qualifications of the 90% estimate also apply to this estimate. Use current ENR (CCI LA) cost index.

DELIVERABLES (10 copies):

Final prebid cost estimate for the construction of plant facilities, excluding operational and maintenance costs.

Consultant responses to City review comments on previous cost estimate submittal.

TASK 12 - CONSTRUCTABILITY/MAINTAINABILITY REVIEW SUPPORT

The CONSULTANT shall furnish support to a CITY-furnished constructability/maintainability review team at the 90 percent and 100 percent design completion. The constructability/maintainability reviews will focus on the following:

- Selection of materials
- Completeness of the design
- Ease of construction
- Ability to construct within cost and schedule constraints
- Equipment accessibility
- Equipment isolation
- Maintainability
- Ancillary facility impacts on other processes (i.e. seal water system, bulk chemicals, etc)

Incorporate results of the constructability review into the design.

DELIVERABLES (1 copy):

Comment review form responding to CITY review comments

TASK 13 - PERMITTING

Subject to the permits listed herein and specified clarifications, the CONSULTANT shall prepare all the necessary regulatory agency permit applications, plans, reports and notifications in support of the design, construction and operation of the proposed project in accordance with the Clean Water Program Guidelines for Design Consultant, Volume I, Chapter 10, and the Standard Specifications for Public Works Construction.

13.1 PERMIT WORK PLAN AND SCHEDULE

The CONSULTANT shall identify all the regulatory approvals by preparing a detailed work plan and a permit work schedule. The work plan and schedule will be submitted for approval by the CITY with 60 days of NTP. The CITY anticipates that the agencies listed below have permitting or approval authority. The CONSULTANT is responsible for identifying any additional responsible agencies with permitting or approval authority.

FEDERAL

- U.S. Army Corps of Engineers
- U.S. Fish and Wildlife Service
- U.S. Environmental Protection Agency
- U.S. Coast Guard
- National Marine Fisheries Service

STATE

- State Office of Historic Preservation
- State Water Resources Control Board
- Regional Water Quality Control Board
- California Department of Health Services (DHS)
- California Department of Industrial Relations Division Occupational Health and Safety (CAL-OSHA)
- California Coastal Commission

LOCAL

- San Diego Air Pollution Control District
- City of San Diego Planning and Development Review Department
- City of San Diego Fire Department
- County of San Diego Department of Health Services

DELIVERABLES:

- Permit Work Plan and Schedule (5 copies).

13.2 PERMIT APPLICATIONS AND TECHNICAL DOCUMENTS

As specified above, prepare permit applications, as deemed complete by the regulatory agency, and identified in the CONSULTANT'S permit work plan. Prepare all necessary information required by the regulatory agencies to complete the applications. The CITY will pay for all applicable construction and permitting fees.

For the San Diego Air Pollution Control District, the scope includes preparation of permit applications and Technical Reports/Study for the "Authority to Construct", "Start up authorization" and "Permit to Operate".

For the City of San Diego Planning and Development Review Department, the scope includes the preparation of all necessary drawings, calculations, forms and corrections necessary to complete both the plan check and permit issuance process.

DELIVERABLES:

- Permit applications (8 copies).
- Engineering and technical reports (8 copies).
- Mitigation, Monitoring or, Work Progression Plans (8 copies each).

13.3 COORDINATION AND AGENCY INTERACTION

The CONSULTANT shall participate with the CITY, as the lead agency, in interactions with various regulatory agencies and departments as identified in the CONSULTANT'S work plan by providing the necessary technical support and information to conduct discussions or meetings with the regulatory agency. A total of three (3) meetings are anticipated with each of the following agencies: Air Pollution Control District, Coastal Commission, and Regional Water Quality Control Board.

DELIVERABLES:

- Meeting Agenda (4 copies).
- Meeting Minutes (4 copies).
- Engineering or Technical Support Information (4 copies).

TASK 14 - OPERATIONS AND MAINTENANCE MANUAL

CONSULTANT shall prepare an Operations and Maintenance Manual in accordance with Chapter 18, Volume II, of CWP Guidelines.

14.1 PRELIMINARY DRAFT OPERATIONS MANUAL, VOLUME I AND II OF THE O&M MANUAL

The following service shall be provided by the CONSULTANT.

- Prepare an outline for the complete Operations Manual.
- Prepare and submit a preliminary draft Operations Manual before 90 percent design completion. Preliminary figures and tables will also be included in this draft.

DELIVERABLES (5 copies):

Outline for the Operations Manual.

Preliminary draft Operations Manual.

**14.2 REVISED DRAFT OPERATIONS MANUAL, VOLUME I AND II
OF THE O&M MANUAL**

The CONSULTANT shall submit revised draft outlines and sections of the Operations Manual prepared in Task 14.1 with accepted CITY review comments incorporated when the design is 100 percent complete.

DELIVERABLES (5 copies):

Revised outline for Operations and Maintenance Manual.

Revised draft Operations Manual.

**14.3 MAINTENANCE MANUAL SPECIFICATION, VOLUME III OF THE
O&M MANUAL**

The CONSULTANT shall provide the CITY with a list of maintenance equipment and tools from which the CITY can identify equipment needs. Include in construction specifications descriptions of maintenance information and equipment to be furnished by the CONTRACTOR. Follow instructions contained in Chapter 18 of the CWP Guidelines.

DELIVERABLES:

Equipment and tools list (5 copies).

Construction specification for maintenance information submittals (1 copy).

END OF PHASE A

PHASE B - BIDDING**GENERAL**

Provide management and technical support to the CITY during the bidding phase of the construction packages based on the Project schedule. The Scope of Work described hereinafter shall apply to one bid cycle for each of the five (5) Proposed GIP construction packages and procurement packages. Attend meetings and coordinate the preparation of materials and attendance by other CONSULTANT team members. Coordination responsibilities shall consist of, but not be limited to:

Attendance at one prebid meeting and site visit.

Support and assistance during advertisement period in responding to bidder questions (issue addenda in a timely manner during the bid period).

Revise construction documents to incorporate all addenda issued during the bidding period and issue "As Bid" documents.

TASK 1 - ADVERTISING SUPPORT

The CONSULTANT shall provide technical input only for preparation of the Notice Inviting Bids, Instructions to Bidders, Bid Forms, Agreement, and Supplementary General Conditions.

TASK 2 - SUBMITTAL LIST

The CONSULTANT shall prepare a list of all submittals required by the Contract Documents. Provide this list to the CITY Project Manager and the Engineering & Capital Projects Field Division Construction Manager prior to the preconstruction conference.

DELIVERABLES:

Submittal List (5 copies)

TASK 3 - RESPOND TO TECHNICAL INQUIRIES/CLARIFICATIONS

The CONSULTANT shall review and respond to project inquires from the CITY during this phase. Response shall be within 48 hours of the CITY's inquiry or as agreed.

Questions and responses shall be routed through the Purchasing and Contracting Department. No oral answers to plan holders will be allowed. Refer any questions directly from plan holders to Purchasing and Contracting Department.

DELIVERABLES:

Written responses to the CITY for all inquiries of substance (5 copies).

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TASK 4 - PRE-BID CONFERENCE AND SITE TOUR

The CONSULTANT shall attend the pre-bid conference and site tour and provide technical input to the Engineering & Capital Projects Field Division Construction Manager in answering any questions (one meeting, one person, two hours). Minutes will be provided by the CITY.

TASK 5 - PREPARE TECHNICAL ADDENDA

At the direction of the CITY the CONSULTANT shall prepare addenda necessary for bidding within 48 hours from time of the CITY's direction, unless it is agreed between the CITY and the CONSULTANT that additional time is needed. Prepare draft addenda documents and provide review copies to the CITY. Incorporate CITY review comments and finalize the addenda. Submit reproducible copies of the final addenda to the CITY for reproduction and distribution. Electronic files of addenda will accompany final addenda submittal.

The CONSULTANT shall be responsible for drawing preparation throughout the BID PHASE.

DELIVERABLES:

Draft addenda (1 copy)

Final addenda (1 copy, and electronic file)

TASK 6 - INCORPORATE ADDENDA INTO THE BID DOCUMENTS

Within 4 weeks of the bid opening, incorporate the addenda in the plans and specifications with appropriate revision. These revisions and the unaffected original bid documents will become the "As Bid" documents. This will include updating the electronic databases. The CONSULTANT is to comply with the CITY's standard for revisions, symbols and notes.

All contract drawings shall be submitted as one hard copy, and also on electronic media in accordance with the CADD Guidelines in Appendix A2 of the CWP Guidelines.

Final contract technical specification shall be provided on Microsoft Word files with one full-size "camera ready" copy delivered.

Final database shall be provided as one hard copy and also on electronic media.

The CONSULTANT is responsible for drawing control throughout this phase of the contract.

DELIVERABLES:

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All contract drawings shall be submitted as one signed and sealed full-size "camera ready" mylar or vellum copy, and also on electronic media in accordance with the CADD Guidelines in Appendix A2 of the Guidelines. No 11"x17" copies or originals are required.

Final contract technical specifications shall be provided on Microsoft Word files with one hard "camera ready" copy delivered.

TASK 7 - EVALUATION OF BIDS

The CONSULTANT shall assist the Project Manager and the Engineering & Capital Projects Field Division Construction Manager as needed in bid evaluation. Assistance may include analysis of the bids received for conformance with the Contract Documents in terms of proposed equipment, materials, and suppliers.

END OF PHASE B

PHASE C - CONSTRUCTION SUPPORT**GENERAL**

Provide technical support to the CITY during the construction phase of the Proposed GIP. The Scope of Work described herein shall apply to each of the Proposed GIP construction packages. Attend meetings as requested by the City, as described in the foregoing, and coordinate attendance by other team members as required.

Coordination responsibilities shall consist of:

- Requests for clarifications and deviations
- Submittal and shop drawings
- Clarifications for change orders
- Record documents
- Project meetings
- Site visits
- Substantial completion certification
- Preparation of operation and maintenance manuals
- As built drawings
- Substitution requests
- Start-up assistance

TASK 1 - CITY MANAGEMENT SUPPORT**1.1 INTERFACE WITH OTHER AGENCIES**

The CONSULTANT will meet with regulatory agencies, utility companies and other CITY departments to complete design services during the construction and start-up phases. The CITY shall be informed and invited to participate with agency contacts where important project issues may be discussed. Meeting minutes will be provided to the CITY within five (5) days of meetings. The CONSULTANT will incorporate CITY approved regulatory inputs into the construction documents. Maximum of six meetings.

DELIVERABLES:

- Advance meeting notices (1 copy).
- Meeting minutes (1 copy).

1.2 COORDINATION WITH OTHER PROJECTS

The CONSULTANT will maintain coordination with consultants of other projects that will connect to the Proposed GIP.

TASK 2 - ATTEND CONSTRUCTION MEETINGS

2.1 PRECONSTRUCTION CONFERENCE

Provide attendance of appropriate design team members to participate in the preconstruction conference. One preconstruction conference per construction package.

2.2 PROJECT CONSTRUCTION MEETINGS

The CONSULTANT shall attend construction progress meetings, as requested by the City. A maximum of two meetings, two (2) hours each, excluding travel, per month is anticipated, (.30 meetings maximum).

DELIVERABLES:

Memoranda addressing items which are the designer's responsibility (1 copy).

2.3 PARTNERING MEETINGS

The CONSULTANT shall attend one (1) all day partnering meeting with appropriate team members.

TASK 3 - SUBMITTAL REVIEW/INSPECTION

3.1 SUBMITTAL REVIEW

Receive and log each submittal from the CITY. Review all submittal including I & C Provider submittals against the requirements of the contract documents and the design application. Make a determination if the equipment and/or materials as defined by the submittal is equal to or better than required in the contract documents. Review the submittal for conformance with design intent, materials application, design configuration, and overall compatibility with the facilities intended use. The CONSULTANT will report Bi-weekly on the status of each submittal.

The CONSULTANT shall provide a response to the CITY with notes on each page of the submittal being returned to summarize the review. Identify the status of the submittal with respect to the need for resubmittal.

The CONSULTANT will review the submittal and return it to the CITY within 14 calendar days from the day when it is received by the CONSULTANT. The CONSULTANT will receive ten copies of each submittal; six marked-up copies will be returned to the CITY. The CONSULTANT will indicate on the submittal, approved, reject/resubmit or approved as noted. CONSULTANT will review an average of one initial submittal and one resubmittal as part of the base scope of work. The CONSULTANT shall be responsible for review of all resubmittals.

Before receipt of submittals by the CONSULTANT, it is anticipated that submittals will be reviewed for completeness and general conformance by the designated Construction Manager.

Requests, including "or equal" submissions, will be reviewed and evaluated by the CONSULTANT. Substitution requests that depart from the basic design concepts will be evaluated on the basis of a scope change.

DELIVERABLES:

Six (6) copies of reviewed submittal.

3.2 FRP INSPECTION

Provide inspection services for shop fabrication and field installations.

3.3 WITNESS EQUIPMENT TEST

As required by the design and contract documents, visit the site of the manufacture and witness major equipment manufacturing and equipment tests; and submit a written report regarding the observations and/or readings made during the tests. At the request of the CITY, the CONSULTANT will review test results witnessed by others and submit written comments.

CONSULTANT will witness up to four (4) tests of 2 day duration each, including travel. Travel and accommodation costs outside San Diego County shall be charged by the CONSULTANT, and the rates shall not exceed the EPA Government Rate.

DELIVERABLES:

Memoranda covering all witness test observations and/or comments on test results (5 copies).

3.4 FUNCTIONAL ACCEPTANCE TEST

As required by the design and contract documents, the CONSULTANT will assist the CITY and/or its Construction Manager to review and make recommendations to contractor prepared test procedures and witness contractor performance tests of all equipment and associated instrumentation and control functional test. Define deficiencies in equipment design, construction and software configuration and submit to the CITY for resolution of problems to the extent practicable. The CONSULTANT (one person additional to field staff) shall participate in a total of ten (10) functional tests of up to 2 days duration each. Costs for observing retesting are not included.

DELIVERABLES:

Functional acceptance test procedures (1 copy).
Functional acceptance test results (1 copy).

TASK 4 - RESPOND TO TECHNICAL REQUESTS FOR INFORMATION/CLARIFICATIONS

4.1 REQUESTS FOR INFORMATION/CLARIFICATIONS

The CONSULTANT shall receive and log each written request from the CITY. Review the requests and the appropriate sections of the technical documents.

Prepare (within 5 working days) written responses to the CITY for all inquires unless agreed otherwise by the CITY and CONSULTANT.

DELIVERABLES:

Written responses to inquires (1 copy).

4.2 SUBSTITUTION REQUESTS

The CONSULTANT shall receive and log each written request from the CITY. Review the requests and the appropriate sections of the technical documents.

Prepare (within 5 working days) written responses to the CITY for all Substitution Requests unless agreed otherwise by the CITY and CONSULTANT.

DELIVERABLES:

Written responses to Substitution Requests (1 copy).

4.3 DEFICIENCIES

Assist the Engineering and Capital Projects Departments' Field Engineering Division Construction Manager in resolving design and construction deficiencies. Submit proposals to the Field Engineering Division Construction Manager to correct design deficiencies. Review Contractor proposals to construction deficiencies and respond to the Field Engineering Division Construction Manager as to the suitability of the proposed correction.

TASK 5 - CONTRACT CHANGE ORDER PREPARATION ASSISTANCE

5.1 REVIEW DRAFT CONTRACT CHANGE ORDERS PREPARED BY OTHERS

The CONSULTANT shall review and log each draft change order by the Contractor received from the CITY and review the submitted material against the requirements of the contract

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documents and the design application. Make a determination if the draft change order is technically adequate or required.

Provide a response to the CITY with the results of the evaluation. If the draft change order is deficient, identify this deficiency in the response.

DELIVERABLES:

Written review comments regarding each draft change order within 5 working days of receipt (1 copy) unless otherwise agreed.

5.2 ASSIST IN THE PREPARATION OF CHANGE ORDERS

As requested by the CITY perform design investigations, evaluate options, prepare drawings and specifications, and other appropriate documents, assist in contract negotiations in support of preparation of final contract change orders. Submit draft documents to the CITY and attend meetings to review the draft materials. Incorporate review comments and finalize the technical design drawings and specifications. Submit final documents to the CITY.

DELIVERABLES:

Draft documents for review within five (5) working days (1 copy) unless otherwise agreed.

Final documents with review comments incorporated within four (4) calendar days (1 copy).

TASK 6 - PREPARE RECORD DRAWINGS

6.1 DESIGN DRAWINGS

The CONSULTANT shall update the original Contract Documents based on information received from the CONTRACTOR through the Construction Manager. Furnish the CITY one reproducible set of Record Drawings and in electronic media in MicroStation format in accordance with Appendix A2 of the Guidelines.

The CONSULTANT may add a note to the Record Drawings clarifying that the CONSULTANT cannot certify that the Work was constructed in strict conformance with the drawings and specifications and that the redlines provided to the CONSULTANT accurately reflect changes made in the field. This is because the CONSULTANT is not responsible for the day-to-day inspection of the work in progress. The wording of the note will be as used on the original PLSPS Record Drawings.

DELIVERABLES:

Reproducible Record Drawings

Electronic media in accordance with the CADD Guidelines, Appendix A2 of the Guidelines.

6.2 LOOP DRAWINGS

The CONTRACTOR shall develop draft loop drawings to be reviewed for approval by the CONSULTANT and City staff. The COMNET Consultant shall convert the draft loop drawing into the standardized format and produce final loop drawings.

DELIVERABLES:

One full size paper copy of draft loop drawing
Draft loop drawings in MicroStation CADD electronic media

TASK 7 - PREPARE OPERATIONS AND MAINTENANCE MANUALS

Review operation and maintenance manual (Volume III of the O & M Manual) submittals collected by the CITY from the contractor. Provide the CITY with comments concerning the submittal completeness and correctness. Review a resubmittal, if required, and provide the CITY with comments.

The CONSULTANT shall assemble the available CITY-accepted submittals and prepare draft operation and maintenance manual in accordance with Chapter 18, Volume II of the CWP Guidelines. Submit draft manual to the CITY for comments. Incorporate final review comments and submit a final operation and maintenance manual.

DELIVERABLES:

Submit draft operation and maintenance manual ten (10) months prior to start up (5 copies), contingent on receiving material from Contractor per required schedule.

Submit the final O & M Manual (Volume I, II, and III) upon 90 percent construction completion of the facility for which it was written contingent upon receipt of vendor info from the contractor (10 copies and electronic file).

TASK 8 - DESIGN CONSULTANT CONSTRUCTION SERVICE STAFFING

8.1 INSPECTION SERVICES (N.I.C)

8.2 PERIODIC INSPECTIONS

The CONSULTANT shall conduct 18 three hour (excluding travel and memorandum) inspections to determine if the Works are being constructed in accordance with the design, or to evaluate special field problems. Findings shall be documented in a memorandum on each periodic inspection.

TASK 9 - PREPARE START-UP PLAN

The CONSULTANT shall prepare the process start-up plan for the facility to be reviewed by the Construction Manager. Provide revised start up plan to the Construction Manager based on initial review.

**TASK 10 - COMNET SUBMITTAL REVIEW
AND OPERATIONAL READINESS TESTING (ORT)**

The designer shall review the provider's submittals per performance with the design. The designer shall also attend ORT classes as necessary to ensure the functionality of the hardware, the control strategy and IO assignment. The level of effort of this task shall not exceed 200 hours.

END OF PHASE C

PHASE D - START UP

GENERAL

The following tasks shall be performed in accordance with Volume II, Chapter 22 of the Metropolitan Wastewater Department and CWP Guidelines. It is anticipated that a 45-days start-up and test period will be required upon completion of the Project, and after installation check-out and start-up is completed by the Contractor. It should be noted that all time requirements mentioned throughout this phase should be broken down into man hours and the usage of these hours may or may not be consecutive.

TASK 1 - TESTS

The CONSULTANT shall perform the following activities.

Attend Contractor/Manufacturer equipment and systems tests during the start-up phase. Provide one (1) startup engineer to assist with the start-up of each of the processes and provide an I & C engineer to assist and coordinate the DCS integration. The startup engineer shall develop, in conjunction with the CITY operating staff, monitoring procedures, forms and data recording requirements. The I & C engineer shall provide assistance to operating staff and guidance regarding each system's operation. Assist the Construction Manager in resolving any technical problems associated with equipment and systems testing. The level of effort for this activity is estimated to require 25 work days.

TASK 2 - WARRANTY

The CONSULTANT shall assist the MWWD Construction Manager with resolving any warranty problems. The assistance shall include services such as inspection, reporting observed discrepancies under guarantees called for in the contract for the Project, and providing recommendation for resolution of defects to be corrected by the Contractor under the warranty. These services shall be provided for the 12-month correction period after the project's substantial completion date. The level of effort for this activity is estimated to require 40 man hours over the 12-month period. Provide input to the MWWD Construction Manager to resolve technical questions on warranty-related issues.

TASK 3 - ASSISTANCE

3.1 ON CALL ASSISTANCE

The CONSULTANT shall provide as needed startup assistance not to exceed 5 person-days to aid the City in debugging, testing and wringing out the systems before equipment is brought online.

3.2 SEVEN-DAY PERFORMANCE TEST

The CONSULTANT shall assist, advise, witness and support the Construction Manager during 7-day performance testing of the Works. The anticipated level of effort is 56 labor hours. The work does not include standard Functional Testing. Therefore, the seven-day performance test will include some of the testing normally performed under Functional Testing.

3.3 COMMISSIONING

The CONSULTANT shall conduct a final inspection of the Project and report findings to the Construction Manager. The CONSULTANT shall conduct a final review of the CONSULTANT'S records and report any deficiencies to the Construction Manager. The CONSULTANT shall write a final memorandum stating his opinion as to the status and certifiability of the completed Project.

TASK 4 - PROJECT PERFORMANCE SERVICES

During the first year of operations the CONSULTANT shall provide observation, troubleshooting, and advice to the Construction Manager and the CITY related to the Project. It is anticipated that these services would not exceed 10 person-days.

TASK 5 - TRAINING

The CONSULTANT shall assist the Contractor/Manufacturer in training CITY Operations and Maintenance staff by coordinating vendor training sessions as provided by the Contractor, and providing experienced personnel to present theoretical aspects of the processes and unique design features. The CONSULTANT shall review CONTRACTOR's training plan and instruction materials for compliance with contract documents. The CONTRACTOR or Manufacturer training presentations shall be scheduled and coordinated with CITY personnel and facility operation. The CONSULTANT shall provide instruction to CITY personnel regarding project objectives, design intent, and system operational procedures.

Training services shall be provided on the operation and maintenance of the following equipment and facilities:

- - Headworks equipment including the following: slide gates, traveling screens, flumes, ferric chloride feed
- Odor Control Equipment including the following: ORS No. 1, wet scrubber, foul air ducting, and final activated charcoal polishing process.
- Grit Removal Facilities including the following: grit tanks, flumes, effluent weirs, grit collection equipment including grit pumps., grit slurry and agitation air

system, duplex sump pumps, flushing water and purge water system, Teacups/Snail grit processing equipment, load out grit hoppers

The CONSULTANT's specific tasks include these described below:

5.1 SYSTEMS TRAINING

The CONSULTANT shall conduct systems training which will provide an Operational Preventive Maintenance overview of each system. The CONSULTANT shall utilize the O & M Manuals as the basis and extent of the training. The system training shall be scheduled prior to the CONTRACTOR's and Manufacturer's equipment training and shall be coordinated with the CITY's staff. The schedule shall be approved by the CITY. System training shall be developed and conducted for the CITY's plant supervisory staff.

Seven (7) Systems Training courses shall be conducted. Each course shall contain its component of the DCS system. The systems courses are planned for eight hours training session per course. The level of effort is estimated to required 36 man hours/courses plus two each eight (8) hour sessions.

5.2 CONTRACTOR'S AND MANUFACTURER'S EQUIPMENT TRAINING

The CONSULTANT shall coordinate and proctor the CONTRACTOR's Manufacturer's training of the CITY's personnel. Specific item include:

- Discuss the preliminary course and lesson plan development with the Construction Manager, CONTRACTOR, and Manufacturer. One meeting shall be held with the Construction Manager, and CITY's Operational Staff, and the CONTRACTOR for this discussion.
- Review the approve lesson plan and course material.
- Act as liaison between Construction Manager, CITY and CONTRACTOR.
- Proctor training sessions, including monitor attendance, evaluate course, and assist classroom discussion.
- Report the CITY on each training class conducted.

It is anticipated that the fifteen (15) individual equipment training courses will require coordination and proctoring. The level of effort required for each course is 20 man hours including preparation and proctoring.

END OF PHASE D

Schedule of Deliverables

Grit Processing Improvement Project at the
Point Loma Wastewater Treatment Plant

Amendment No. 5

Phase A – Design

Task	Deliverables	Schedule
1.1	Meetings Agendas Meeting Minutes Progress Report	As required 5 days prior to meeting As required within 5 working days Monthly by 7 th day of month
1.2	Final Cost Loaded Schedule	45 calendar days after NTP
1.3	No deliverables	
1.4	No deliverables	
1.5	No deliverables	
2.1	Monthly Project Status	Monthly per Task 1.1
2.2	Quarterly Contract Activity Reports	Quarterly
3.0	(N.I.C.)	
4.0	(N.I.C.)	
5.0	(N.I.C.)	
6.0	(N.I.C.)	
7.2	Provide 90% drawings and specs	150 calendar days after NTP
7.3	100% drawings & specs	180 calendar days after NTP
7.4	Final drawings and specs Provide final design drawings and specifications	210 calendar days after NTP
7.5	Draft Pre-qualification documents Final Pre-qualification documents	150 calendar days after NTP 180 calendar days after NTP
8.0	No Deliverables (N.I.C)	

Task	Deliverables	Schedule
9.1	QA/QC Program Plan Final Design Calculations and Notebooks Design Reviews and Coordination Checking	120 calendar days after NTP 220 calendar days after NTP Corresponding submittal
9.2	Memoranda responding to City review comments of 90% and 100%	14 calendar days after receipt of City review comments on the 90% and 100%
10.0	(N.I.C.)	14 calendar days after receipt of VE recommendations
11.1	(N.I.C.)	
11.4	90% Const. cost Est. 90% cost estimates for each const. package and equipment procurement package including narrative	150 calendar days after NTP
11.5	Final Const. cost estimate	210 calendar days after NTP
12.0	Constructability Review Forms responding to City review comments	14 calendar days after receipt of City review comments
13.1	Permit Work Plan and Schedule	120 calendar days after NTP
13.2	Permit Applications, Engineering and Technical Reports, Storm water Pollution Prevention Plan Mitigation, Monitoring or, Work Progression Plans	As required
13.3	Coordination and Agency Interaction	As required
14.1	Outline for the Operation Manual Preliminary draft Operations Manual	150 calendar days after NTP 450 calendar days after NTP
14.2	Revised outline for Operations and Maintenance Manual Revised draft Operations Manual	60 calendar days after NTP 220 calendar days after NTP
14.3	Equipment List – Construction specifications for maintenance information submittals Maintenance Manual Specification	150 calendar days after NTP

Phase B – Bid

Task	Deliverables	Schedule
1.0	No deliverables	
2.0	Submittal List	20 calendar days after Task 7-4
3.0	Written responses to the City for all inquiries of substance	Within 48 hours
4.0	No deliverables	
5.0	Draft and Final Addenda	As required
6.0	As bid documents	30 calendar days after bid opening
7.0	Evaluation of bids	Within 14 calendar days of receipt of bids

Phase C – Construction

Task	Deliverables	Schedule
1.1	Advance meeting notices Meeting minutes	7 calendar days before meeting Within 7 calendar days of meeting
1.2	No deliverables	
2.1	No deliverables	
2.2	Memoranda addressing items which are the designer's responsibility	As required
2.3	No deliverables	
3.1	Reviewed submittal	Within 14 calendar days
3.2	FRP inspection reports	Within 14 calendar days from inspection dates
3.3	Memoranda covering all witness test observation	Within 14 calendar days from witness dates
3.4	Comments on test procedures and field observation memoranda, if any	14 calendar days from the date of receipt and 7 calendar days from tests
4.1	Written responses to inquiries	Within 5 working days
4.2	Written responses to Substitution Requests	Within 5 working days

Task	Deliverables	Schedule
4.3	No deliverables	
5.1	Written review comments regarding each draft change order	As required
5.2	Draft change order document for review Final change order documents with review comments	Within 5 working days Within 4 calendar days
6.1	Records Drawings	60 calendar days after receiving information from the Contractor
6.2	Review comments on Draft Loop Drawings	30 calendar days after receiving information from the Contractor
7.0	Draft operation and Maintenance Manual Final operation and Maintenance Manual	10 months prior to start-up 90% construction completion
8.0	No deliverables	
8.1	Inspection reports (Optional Service)	As required
8.2	Inspection memoranda	Within 5 working days from the date of inspection
9.0	Start-up plan	6 months prior to start-up
10.0	Review comments on COMNET submittals	30 calendar days from the date of receipt

Phase D – Start Up

Task	Deliverables	Schedule
1.1	No deliverables	
2.0	No deliverables	
3.1	No deliverables	
3.2	No deliverables	
3.3	No deliverables	
4.0	No deliverables	
5.0	No deliverables	
5.1	No deliverables	

EXHIBIT C-5

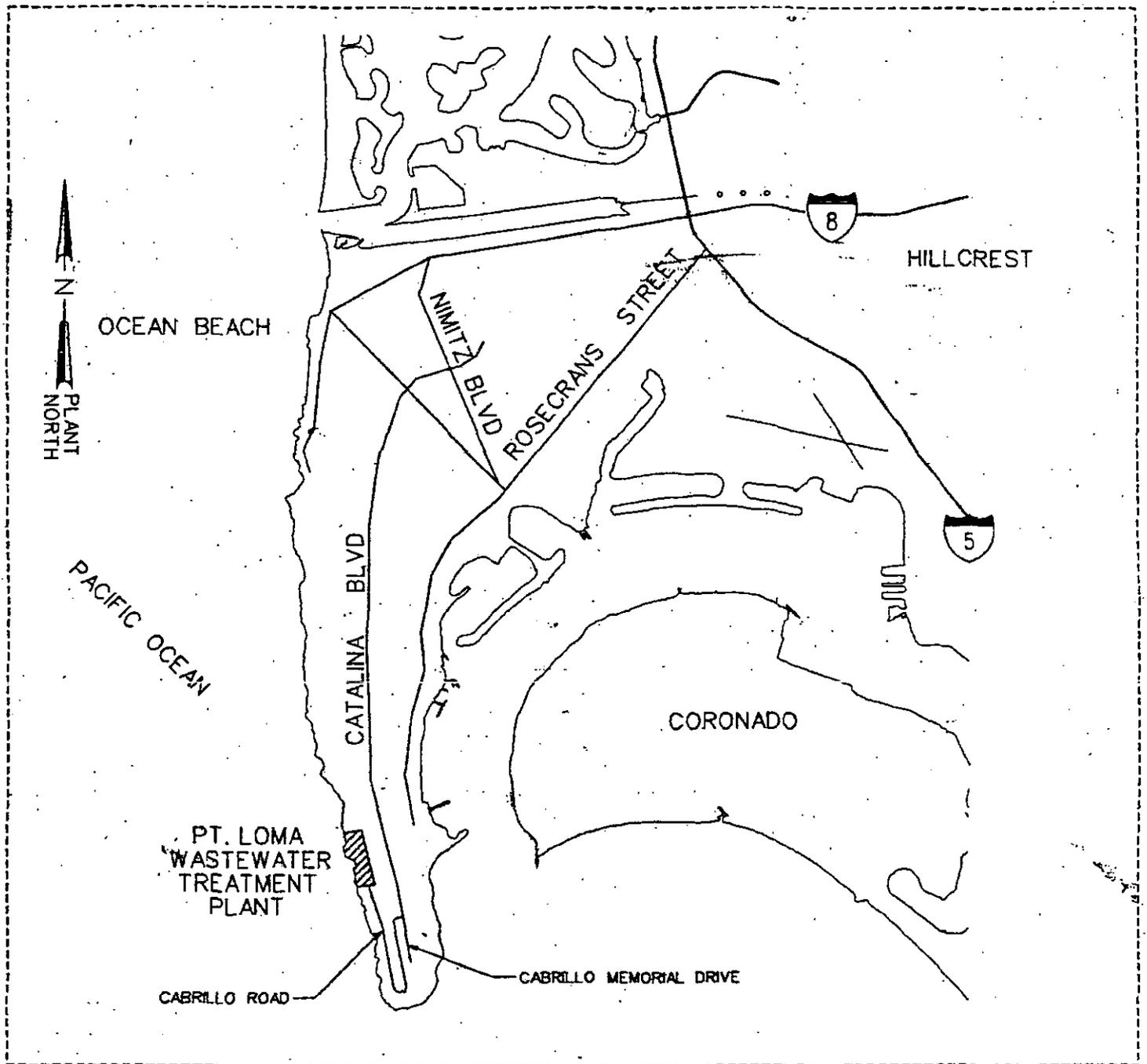
Grit Processing Improvement Project at the
Point Loma Wastewater Treatment Plant

Amendment No. 5

Compensation & Fee Schedule

Invoicing procedures for this lump sum contract will be as mutually agreed and follow these general guidelines.

1. CONSULTANT will submit work progress on a monthly basis as a percentage of completion of the entire scope of work authorized for accomplishment by the CITY.
2. The scope of work shall be presented on the attached form, PROGRESS PAYMENT TASK SCHEDULE, Table C-1.
3. This form identifies the effort with an associated COST by CONSULTANT and SUBCONSULTANTS and/or SUBCONTRACTORS assigned to perform work under this agreement and the percentage of completion of each task.
4. A second form, Table C-2, includes work performed by MBE/WBE/DBE/DVBE & OBE SUBCONTRACTORS to permit continued monitoring of the CONSULTANT'S performance under the City's Equal Opportunity Program for Subcontracting Participation Level (SPL).
5. The percentage of completion will be determined in accordance with Table C-3.
6. The CONSULTANT shall also submit a monthly report that discusses:
 - Protect Management Summary
 - Major Activities Accomplished During the Billing Period
 - Major Activities Planned for Next Month
 - Problem Areas, if any



LOCATION MAP

TASK NO.	TASK DESCRIPTION	LEE & RO LABOR COST (\$)	SUB-CONSULTANTS COST (\$)	OTHER DIRECT COSTS (ODCs) (\$)	TOTAL FEE (\$)
PHASE A DESIGN					
1	CITY MANAGEMENT SUPPORT	\$ 20,901	\$ -	\$ 360	\$ 21,261
2	DESIGN TEAM MANAGEMENT	\$ 7,065	\$ -	\$ 176	\$ 7,241
3	NOT IN CONTRACT				\$ -
4	NOT IN CONTRACT				\$ -
5	INVESTIGATIONS	\$ -	\$ -	\$ -	\$ -
6	DESIGN DEVELOPMENT	\$ -	\$ -	\$ -	\$ -
7	FINAL DESIGN	\$ 284,314	\$ 124,180	\$ 26,777	\$ 435,272
8	SUPPLEMENTAL DESIGN				\$ -
9	DESIGN REVIEWS AND APPROVALS	\$ 24,141	\$ 4,500	\$ 1,733	\$ 30,374
10	VALUE ENGINEERING	\$ -	\$ -	\$ -	\$ -
11	CONSTRUCTION COST ESTIMATES	\$ 11,279	\$ -	\$ 36	\$ 11,315
12	CONSTRUCTABILITY REVIEW SUPPORT	\$ 8,742	\$ -	\$ -	\$ 8,742
13	PERMITTING	\$ 11,840	\$ 2,000	\$ 225	\$ 14,065
14	O & M MANUAL	\$ 12,403	\$ -	\$ 674	\$ 13,077
TOTAL PHASE A DESIGN		\$ 380,685	\$ 130,680	\$ 29,981	\$ 541,346
PHASE B BIDDING		\$ 63,556	\$ 7,250	\$ 2,635	\$ 73,441
PHASE C CONSTRUCTION					
1	CITY MANAGEMENT SUPPORT	\$ 13,042	\$ 2,760	\$ 9	\$ 15,811
2	CONSTRUCTION MEETINGS	\$ 44,167	\$ 10,850	\$ 1,061	\$ 56,078
3	SUBMITTAL REVIEW/INSPECTION	\$ 207,005	\$ 32,500	\$ 7,686	\$ 247,191
4	RFI'S/CLARIFICATION	\$ 127,015	\$ 13,750	\$ -	\$ 140,765
5	CHANGE ORDER ASSISTANCE	\$ 45,153	\$ 5,200	\$ 501	\$ 50,854
6	PREPARE RECORD DRAWINGS (Including Loop Drawings)	\$ 232,781	\$ 14,500	\$ 3,526	\$ 250,807
7	PREPARE O&M MANUALS	\$ 92,429	\$ -	\$ 1,940	\$ 94,369
8	CONSTRUCTION STAFFING (LESS TASK 8.1 OPTIONAL INSPECTION)	\$ 11,683	\$ 8,700	\$ 313	\$ 20,697
9	PREPARE START-UP PLAN	\$ 48,679	\$ 2,500	\$ 213	\$ 51,392
10	COMNET SUBMITTAL REVIEW/ORT	\$ 8,089	\$ 12,000	\$ 18	\$ 20,107
SUBTOTAL PHASE C - CONSTRUCTION		\$ 830,043	\$ 102,760	\$ 15,267	\$ 948,070
CURRENT CONTRACT AMOUNT		\$ (554,145)	\$ (59,589)	\$ (11,652)	\$ (625,386)
ADDITIONAL FEE TOTAL PHASE C - CONSTRUCTION		\$ 275,898	\$ 43,171	\$ 3,615	\$ 322,684
PHASE D START-UP					
1	TESTS	\$ 43,597	\$ 15,000	\$ 45	\$ 58,642
2	WARRANTY	\$ 7,840	\$ -	\$ 320	\$ 8,160
3	ASSISTANCE	\$ 20,172	\$ 19,500	\$ 318	\$ 39,990
4	PROJECT PERFORMANCE SERVICES	\$ 13,623	\$ 1,450	\$ -	\$ 15,073
5	TRAINING	\$ 43,388	\$ 12,000	\$ 1,070	\$ 56,458
SUBTOTAL PHASE D - CONSTRUCTION		\$ 128,620	\$ 47,950	\$ 1,753	\$ 178,323
CURRENT CONTRACT AMOUNT		\$ (94,686)	\$ (43,120)	\$ (1,227)	\$ (139,033)
ADDITIONAL FEE TOTAL PHASE D - START-UP		\$ 33,934	\$ 4,830	\$ 526	\$ 39,290
TOTAL ADDITIONAL FEE REQUESTED EXCLUDING OPTIONAL INSPECTION		\$ 754,072	\$ 185,931	\$ 36,756	\$ 976,759

REVISED TOTAL CONTRACT AMOUNT WITHOUT OPTIONAL INSPECTION		\$ 1,402,903	\$ 288,640	\$ 49,635	\$ 1,741,178
8.1	OPTIONAL INSPECTION SERVICE	\$ 683,362	\$ -	\$ -	\$ 683,362
REVISED TOTAL CONTRACT AMOUNT INCLUDING OPTIONAL INSPECTION		\$ 2,086,265	\$ 288,640	\$ 49,635	\$ 2,424,540

Repackage Point Loma WTP Grit Improvements Project (GIP) Amendment 5 SUMMARY

May 13, 2008

000213

TASK INFORMATION		Hours per Labor Category						Total Hours	Labor Cost	Subcontractants	Other Direct Costs (ODCs)	Total Fee
		E9	E7	E5	E3	CADD	Adm.					
Task	Description	Direct Labor Rates						Multiplier	Costs			
		\$76.25	\$60.00	\$47.25	\$38.00	\$34.00	\$25.75		2.9748			
PHASE A - DESIGN												
1	CITY MANAGEMENT SUPPORT											
1.1	Progress Meetings and Reports	4	16	16			16	52	\$ 7,238	\$ -	\$ 207	\$ 7,445
1.2	Schedule and Cost Monitoring		4	12				16	\$ 2,401	\$ -	\$ 35	\$ 2,436
1.3	Record Management		4	20			12	40	\$ 7,803	\$ -	\$ 96	\$ 7,899
1.4	Coordination with Other City Projects							0	\$ -	\$ -	\$ -	\$ -
1.5	Kick-Off Meeting	4	8	8				20	\$ 3,460	\$ -	\$ 22	\$ 3,482
	Subtotal, Task 1	8	32	56	0	12	56	164	\$ 20,901	\$ -	\$ 360	\$ 21,261
2	DESIGN TEAM MANAGEMENT											
2.1	Monthly Status Reports, 6 Each	12		12			12	36	\$ 5,328	\$ -	\$ 162	\$ 5,490
2.2	Quarterly Contract Activity Reports			8			8	16	\$ 1,737	\$ -	\$ 14	\$ 1,751
	Subtotal, Task 2	12	0	20	0	0	20	52	\$ 7,065	\$ -	\$ 176	\$ 7,241
3	NOT IN CONTRACT											
4	NOT IN CONTRACT											
5	INVESTIGATIONS											
5.1	General Requirements											
5.2	Surveying and Mapping (As-Built Search/Field Verify)											
5.3	Geotechnical Investigations											
5.4	Ten Percent Technical Memoranda											
5.4.A	TM on Optional Sixth Screening Channel											
5.4.B	TM on Digester/Inf. Tunnel Cleaning Facility											
5.4.C	TM on Project H-3R Integration/Improvements											
5.4.D	TM on Blower Building											
5.4.E	TM on Plant Grit Removal Recommendation (and Physical Model Study & Demonstration)											
5.4.F	TM on Grit Classifying System											
5.4.G	Project Report TM											
5.4.H	TM on Need for 3rd Scrubber											
5.4.I	TM on Electrical Power Analysis (20MCC)											
	Subtotal, Task 5	0	0	0	0	0	0	0	\$0	\$0	\$0	\$ -
6	DESIGN DEVELOPMENT											
6.1	Ten Percent Design Concept Report (Deleted)											
6.2	Review Bid Document Preparation (for Prepurchase)											
6.3	30 Percent Design Development											
	Design Development Report											
	30 Percent Drawings											
	Review Develop Hydraulic Profile											
6.3.1	Authorization for Final Design											
6.4	30 Percent Technical Memoranda											
6.4.A	TM on Plantwide Facilities Definition											
6.4.B	TM on Civil Design Development											
6.4.C	TM on Mech./Process/HVAC/Odor Control											
6.4.D	TM on Instrumentation & Control Design											
6.4.E	TM on Electrical System Design											
6.4.F	TM on Structural Development											
6.4.G	TM on Arch. Design, Landscaping & Arts											

Repackage Point Loma WTP Grit Improvements Project (GIP) Amendment 5 SUMMARY

May 13, 2008

TASK INFORMATION		Hours per Labor Category					Total Hours	Labor Cost	Subcon-sultants Costs	Other Direct Costs (ODCs)	Total Fee
		E9	E7	E5	E3	CADD					
Task	Description	Direct Labor Rates					Multiplier				
		\$76.25	\$60.00	\$47.25	\$38.00	\$34.00	\$25.75	2.9748			
6.4.H	TM on Architectural Images										
6.4.I	TM on Traffic/Transportation (Deleted)										
6.4.J	TM on Construction Sequencing and Interim Facilities										
	Subtotal Task 6	0	0	0	0	0	0	\$0	\$0	\$0	
7	FINAL DESIGN										
7.1	60 Percent Level Final Design										
	60 Percent Drawings										
	Draft Specifications (Division 2 -Division 16)										
	Database on Informix or Paradox										
7.2	90 Percent Level Final Design										
	90 Percent Drawings	33	178	391	61	502	1165	\$ 151,864	\$ 90,180	\$ 7,269	
	90 Percent Specifications	8	24	40			48	\$ 15,398	\$ -	\$ 3,280	
	Database on Informix or Paradox						0	\$ -	\$ -	\$ -	
7.3	100 Percent Design Submittal										
	100 Percent Drawings	17	92	202	32	260	603	\$ 78,585	\$ 23,500	\$ 5,850	
	100 Percent Specifications (Div. 2 thru 16)	4	8	16			30	\$ 6,882	\$ -	\$ 2,880	
	Database on Informix or Paradox						0	\$ -	\$ -	\$ -	
7.4	Final Design Drawing Submittal	7	37	81	13	104	242	\$ 31,566	\$ 10,500	\$ 7,499	
7.5	I&C Provider						0	\$ -	\$ -	\$ -	
	Subtotal, Task 7	69	339	730	106	866	78	\$ 284,314	\$ 124,180	\$ 26,777	
8	SUPPLEMENTAL DESIGN										
9	DESIGN REVIEWS AND APPROVALS										
9.1	Design Reviews and Coordination Checking	16	40	40			24	\$ 18,230	\$ -	\$ 1,627	
9.2	City Review	4	12	16			8	\$ 5,911	\$ 4,500	\$ 106	
	Subtotal, Task 9	20	52	56	0	0	32	\$ 24,141	\$ 4,500	\$ 1,733	
10	VALUE ENGINEERING										
11	CONSTRUCTION COST ESTIMATES										
11.1	10 Percent Estimate										
11.2	30 Percent Estimate										
11.3	60 Percent Estimate										
11.4	90 Percent Estimate	4	16	16	20		56	\$ 8,273	\$ -	\$ 18	
11.5	Final Pre-bid Estimate	2	8	8			18	\$ 3,006	\$ -	\$ 18	
	Subtotal, Task 11	6	24	24	20	0	74	\$ 11,279	\$ -	\$ 36	
12	CONSTRUCTABILITY REVIEW SUPPORT	8	16	24			48	\$ 8,742	\$ -	\$ -	
13	PERMITTING										
13.1	Permit Work Plan and Schedule						0	\$ -	\$ -	\$ -	
13.2	Permit Applications and Technical Documents		4	8			4	\$ 2,145	\$ -	\$ -	
13.3	Coordination and Agency Interaction		40	16			4	\$ 9,695	\$ 2,000	\$ 225	
	Subtotal, Task 13	0	44	24	0	0	8	\$ 11,840	\$ 2,000	\$ 225	
14	O & M MANUAL										
14.1	Preliminary Draft Operations Manual, Vol. I&II						0	\$ -	\$ -	\$ 297	
14.2	Revised Draft Operations Manual, Vol. I & II		8	20	24	8	12	\$ 8,680	\$ -	\$ 368	
14.3	Maintenance Manual Specifications, Vol. III		6	6	16		28	\$ 3,723	\$ -	\$ 9	
	Subtotal, Task 14	0	14	26	40	8	12	\$ 12,403	\$ -	\$ 674	
	TOTAL PHASE A	123	521	960	166	886	206	\$ 380,685	\$ 130,680	\$ 29,981	

000214

Repackage Point Loma WTP Grit Improvements Project (GIP) Amendment 5 SUMMARY

May 13, 2008

000215

TASK INFORMATION		Hours per Labor Category					Total Hours	Labor Cost	Subcontractants Costs	Other Direct Costs (ODCs)	Total Fee	
		E9	E7	E5	E3	CADD						Adm.
Task	Description	\$76.25/hr	\$60.00/hr	\$47.25/hr	\$38.00/hr	\$34.00/hr	\$25.75/hr	Multiplier				
PHASE B - BIDDING												
1	Advertising Support	2	4	4				10	\$ 1,730	\$ -	\$ -	\$ 1,730
2	Submittal List		6	12	12		4	34	\$ 4,421	\$ 1,000	\$ 3	\$ 5,423
3	Response to Inquiries/Clarifications	6	28	46	29		12	121	\$ 17,022	\$ 2,050	\$ 9	\$ 19,081
4	Pre-Bid Conference and Site Tour		4					4	\$ 714	\$ -	\$ 17	\$ 730
5	Prepare Technical Addenda	10	31	53	38	35	29	196	\$ 25,308	\$ 1,950	\$ 343	\$ 27,601
6	Incorporate Addenda into Bid Documents	4	8	24	24	34	14	108	\$ 12,933	\$ 2,250	\$ 2,264	\$ 17,447
7	Evaluation of Bids		8					8	\$ 1,428	\$ -	\$ -	\$ 1,428
TOTAL PHASE B		22	89	139	103	69	59	481	\$ 63,555	\$ 7,250	\$ 2,635	\$ 73,440
PHASE C - CONSTRUCTION												
1	CITY MANAGEMENT SUPPORT											
1.1	Interface With Other Agencies		18	36			8	62	\$ 9,657	\$ -	\$ 9	\$ 9,666
1.2	Coordination with Other Projects		8	12				20	\$ 3,385	\$ 2,760	\$ -	\$ 6,145
Subtotal, Task 1		0	26	48	0	0	8	82	\$ 13,042	\$ 2,760	\$ 9	\$ 15,811
2	CONSTRUCTION MEETINGS											
2.1	Preconstruction Conference	4	12					16	\$ 3,179	\$ 1,000	\$ 22	\$ 4,201
2.2	Project Construction Meetings (Up to 30 meetings, average 1.5 persons attending, 4 hour duration)	20	100	80			20	220	\$ 38,214	\$ 9,850	\$ 1,017	\$ 49,081
2.3	Partnering Meetings		8	8				16	\$ 2,774	\$ -	\$ 22	\$ 2,796
Subtotal, Task 2		24	120	88	0	0	20	252	\$ 44,167	\$ 10,850	\$ 1,061	\$ 56,078
3	SUBMITTAL REVIEW/INSPECTION											
3.1	Submittal Review (173 submittals @5.2 hrs/submittal)	35	346	346	115		58	900	\$ 141,542	\$ 20,500	\$ 1,500	\$ 163,542
3.2	FRP Inspection			4				4	\$ 611	\$ 9,000	\$ 559	\$ 10,170
3.3	Witness Equipment Test		24	30				54	\$ 9,238	\$ -	\$ 4,518	\$ 13,756
3.4	Functional Acceptance Test	4	96	80			10	190	\$ 34,050	\$ 3,000	\$ 1,109	\$ 38,159
<i>Additional submittals (27 submittals @5.2 hours/submittal)</i>			40	92			8	140	\$ 21,563	\$ -	\$ -	\$ 21,563
Subtotal, Task 3		39	506	552	115	0	76	1288	\$ 207,005	\$ 32,500	\$ 7,686	\$ 247,191
4	RFI'S/CLARIFICATION											
4.1	Requests for Information/Clarification (133 RFIs @3.5 hours/RFI)	28	122	223	93			466	\$ 76,059	\$ 13,000	\$ -	\$ 89,059
4.2	Substitution Requests	8	8	16	8			40	\$ 6,951	\$ 750	\$ -	\$ 7,701
4.3	Deficiencies Resolution	4	8	20	8			40	\$ 6,576	\$ -	\$ -	\$ 6,576
<i>Additional RFIs (67 @3.5 hours /RFI)</i>			80	100	54			234	\$ 37,429	\$ -	\$ -	\$ 37,429
Subtotal, Task 4		40	218	359	163	0	0	780	\$ 127,015	\$ 13,750	\$ -	\$ 140,765
5	CHANGE ORDER ASSISTANCE											
5.1	Review Draft Change Orders By Others	11	23	33	13			80	\$ 13,812	\$ 1,000	\$ -	\$ 14,812
5.2	Assist in Preparation of Change Orders	12	23	53	68	46	29	231	\$ 31,341	\$ 4,200	\$ 501	\$ 36,042
Subtotal, Task 5		23	46	86	81	46	29	311	\$ 45,153	\$ 5,200	\$ 501	\$ 50,854
6	PREPARE RECORD DRAWINGS											
6.1	Design Drawings	2	25	35	58	216		336	\$ 43,324	\$ 9,500	\$ 2,106	\$ 54,930
6.2	Loop Drawings (Review)	4	20					24	\$ 5,073	\$ 5,000	\$ -	\$ 10,073
6.2.a	Prepare Loop Diagrams		112	297		1067		1476	\$ 184,384	\$ -	\$ 1,420	\$ 185,804
Subtotal, Task 6		6	157	332	58	1283	0	1836	\$ 232,781	\$ 14,500	\$ 3,526	\$ 250,807

Repackage Point Loma WTP Grit Improvements Project (GIP) Amendment 5 SUMMARY

May 13, 2008

000216

TASK INFORMATION		Hours per Labor Category						Total Hours	Labor Cost	Subcontractants Costs	Other Direct Costs (ODCs)	Total Fee
		E9	E7	E5	E3	CADD	Adm					
Task	Description	Direct Labor Rates						Multiplier				
		\$76.25	\$60.00	\$47.25	\$38.00	\$34.00	\$25.75		2.9748			
7	PREPARE O&M MANUALS	9	74	110	243	170	81	687	\$ 92,429	\$ -	\$ 1,940	\$ 94,369
	Subtotal, Task 7	9	74	110	243	170	81	687	\$ 92,429	0	1940	\$ 94,369
8	CONSTRUCTION SERVICE STAFFING											
8.1	OPTIONAL Inspection Service (SEE BELOW)							0	\$ -	\$ -	\$ -	\$ -
8.2	Periodic Inspections		20	35	20			75	\$ 11,683	\$ 8,700	\$ 313	\$ 20,697
	Subtotal, Task 8	0	20	35	20	0	0	75	\$ 11,683	\$ 8,700	\$ 313	\$ 20,697
9	PREPARE START-UP PLAN	18	88	132		26	26	290	\$ 48,679	\$ 2,500	\$ 213	\$ 51,392
	Subtotal, Task 9	18	88	132	0	26	26	290	\$ 48,679	2500	\$ 213	\$ 51,392
10	COMNET SUBMITTAL REVIEW/ORT		40					40	\$ 8,089	\$ 12,000	\$ 18	\$ 20,107
	SUBTOTAL PHASE C	159	1295	1742	680	1525	240	5641	\$ 830,043	\$ 102,760	\$ 15,267	\$ 948,070
	CURRENT CONTRACT AMOUNT PHASE C								\$ (554,145)	\$ (59,589)	\$ (11,652)	\$ (625,386)
	Additional Fee Requested TOTAL PHASE C	229	1371	1772	732	1525	290	4646	\$ 275,898	\$ 43,171	\$ 3,615	\$ 322,684
	PHASE D - START-UP											
1	TESTS	4	116	120				240	\$ 43,597	\$ 15,000	\$ 45	\$ 58,642
2	WARRANTY	8	16	16				40	\$ 7,840	\$ -	\$ 320	\$ 8,160
3	ASSISTANCE											
3.1	On Call Assistance		16	16				32	\$ 5,784	\$ 7,500	\$ 128	\$ 13,412
3.2	7-Day Performance Test		24	24				48	\$ 8,675	\$ 12,000	\$ 172	\$ 20,847
3.3	Commissioning	4	12	12			4	32	\$ 5,713	\$ -	\$ 18	\$ 5,731
	Subtotal, Task 3	4	52	52	0	0	4	112	\$ 20,172	\$ 19,500	\$ 318	\$ 39,990
4	PROJECT PERFORMANCE SERVICES	8	32	32				72	\$ 13,623	\$ 1,450	\$ -	\$ 15,073
5	TRAINING											
5.1	Systems Training	8	32	48			27	115	\$ 18,515	\$ -	\$ 478	\$ 18,992
5.2	Contractor/Manufr's Equipment Training		60	80				140	\$ 24,874	\$ 12,000	\$ 592	\$ 37,466
	Subtotal, Task 5	8	92	128	0	0	27	255	\$ 43,388	\$ 12,000	\$ 1,070	\$ 56,458
	TOTAL PHASE D	32	308	348	0	0	31	719	\$ 128,620	\$ 47,950	\$ 1,753	\$ 178,323
	CURRENT CONTRACT AMOUNT PHASE D								\$ (94,686)	\$ (43,120)	\$ (1,227)	\$ (139,033)
	Additional Fee Requested TOTAL PHASE D	32	308	348	0	0	31	719	\$ 33,934	\$ 4,830	\$ 526	\$ 39,290
	TOTAL ADDITIONAL FEE REQUESTED (EXCLUDING OPTIONAL INSPECTION)	406	2,289	3,219	1,001	2,480	586	8,708	\$ 754,072	\$ 185,931	\$ 36,756	\$ 976,759
8.1	OPTIONAL Inspection Service, 30 months at 2.563 Total Multiplier			5000				5000	\$ 683,362	\$ -	\$ -	\$ 683,362
	TOTAL ADDITIONAL FEE REQUESTED (INCLUDING OPTIONAL INSPECTION)	406	2,289	8,219	1,001	2,480	586	13,708	\$ 1,437,434	\$ 185,931	\$ 36,756	\$ 1,660,121

Repackage Point Loma WTP Grit Improvements Project (GIP) Amendment 5 SUMMARY

May 13, 2008

000217

TASK INFORMATION		Hours per Labor Category						Total Hours	Labor Cost	Subconsultants Costs	Other Direct Costs (ODCs)	Total Fee
		E9	E7	E5	E3	CADD	Adm.					
Task	Description	Direct Labor Rates						Multiplier				
		\$76.25	\$60.00	\$47.25	\$38.00	\$34.00	\$25.75	2.9748				

Project Periods	Labor Rate Escalation					
	E9	E7	E5	E3	CADD	Adm.
	Direct Labor Rates					
Period 1--Jan 2, 2008 to Oct. 31, 2008	\$76.25	\$60.00	\$47.25	\$38.00	\$34.00	\$25.75
Period 2--Nov. 1, 2008 to Oct. 31, 2009	\$79.49	\$62.55	\$49.26	\$39.62	\$35.45	\$26.84
Period 3--Nov. 1, 2009 to Oct. 31, 2010	\$82.87	\$65.21	\$51.35	\$41.30	\$36.95	\$27.99
Period 4--Nov. 1, 2010 to Oct. 31, 2011	\$86.39	\$67.98	\$53.53	\$43.05	\$38.52	\$29.17
Period 5--Nov.1, 2011 to Oct. 31, 2012	\$90.06	\$70.87	\$55.81	\$44.88	\$40.16	\$30.41

LEE & RO Labor Category Description
E9 Chief/Managing Engineer
E7 Supervising Engineer
E5 Senior Engineer
E3 Associate Engineer
CADD: CAD Designer
Supp: Word Processor/Clerical

Annual Escalation Factor 4.25%	1.0425
Inspection Labor Multiplier (130% OH & 11% P)	2.5530
Engineering Labor Multiplier(160% OH & 11% P)	2.9748

**ATTACHMENT 2: Repackage Point Loma Wastewater Treatment Plant Grit Improvements
SUBCONSULTANTS' AND OTHER DIRECT COSTS (ODCs)
Amendment 5**

May 13, 2008

000219

Task	Description	Deliverable	PHASE A - DESIGN										SUBCONSULTANTS' COSTS										TOTAL SUBS (ODCs)																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																
			NO	0-09	10-17	18-25	26-33	34-41	42-49	50-57	58-65	66-73	74-81	82-89	90-97	98-105	106-113	114-121	122-129	130-137	138-145	146-153		154-161	162-169	170-177	178-185	186-193	194-201	202-209	210-217	218-225	226-233	234-241	242-249	250-257	258-265	266-273	274-281	282-289	290-297	298-305	306-313	314-321	322-329	330-337	338-345	346-353	354-361	362-369	370-377	378-385	386-393	394-401	402-409	410-417	418-425	426-433	434-441	442-449	450-457	458-465	466-473	474-481	482-489	490-497	498-505	506-513	514-521	522-529	530-537	538-545	546-553	554-561	562-569	570-577	578-585	586-593	594-601	602-609	610-617	618-625	626-633	634-641	642-649	650-657	658-665	666-673	674-681	682-689	690-697	698-705	706-713	714-721	722-729	730-737	738-745	746-753	754-761	762-769	770-777	778-785	786-793	794-801	802-809	810-817	818-825	826-833	834-841	842-849	850-857	858-865	866-873	874-881	882-889	890-897	898-905	906-913	914-921	922-929	930-937	938-945	946-953	954-961	962-969	970-977	978-985	986-993	994-1001	1002-1009	1010-1017	1018-1025	1026-1033	1034-1041	1042-1049	1050-1057	1058-1065	1066-1073	1074-1081	1082-1089	1090-1097	1098-1105	1106-1113	1114-1121	1122-1129	1130-1137	1138-1145	1146-1153	1154-1161	1162-1169	1170-1177	1178-1185	1186-1193	1194-1201	1202-1209	1210-1217	1218-1225	1226-1233	1234-1241	1242-1249	1250-1257	1258-1265	1266-1273	1274-1281	1282-1289	1290-1297	1298-1305	1306-1313	1314-1321	1322-1329	1330-1337	1338-1345	1346-1353	1354-1361	1362-1369	1370-1377	1378-1385	1386-1393	1394-1401	1402-1409	1410-1417	1418-1425	1426-1433	1434-1441	1442-1449	1450-1457	1458-1465	1466-1473	1474-1481	1482-1489	1490-1497	1498-1505	1506-1513	1514-1521	1522-1529	1530-1537	1538-1545	1546-1553	1554-1561	1562-1569	1570-1577	1578-1585	1586-1593	1594-1601	1602-1609	1610-1617	1618-1625	1626-1633	1634-1641	1642-1649	1650-1657	1658-1665	1666-1673	1674-1681	1682-1689	1690-1697	1698-1705	1706-1713	1714-1721	1722-1729	1730-1737	1738-1745	1746-1753	1754-1761	1762-1769	1770-1777	1778-1785	1786-1793	1794-1801	1802-1809	1810-1817	1818-1825	1826-1833	1834-1841	1842-1849	1850-1857	1858-1865	1866-1873	1874-1881	1882-1889	1890-1897	1898-1905	1906-1913	1914-1921	1922-1929	1930-1937	1938-1945	1946-1953	1954-1961	1962-1969	1970-1977	1978-1985	1986-1993	1994-2001	2002-2009	2010-2017	2018-2025	2026-2033	2034-2041	2042-2049	2050-2057	2058-2065	2066-2073	2074-2081	2082-2089	2090-2097	2098-2105	2106-2113	2114-2121	2122-2129	2130-2137	2138-2145	2146-2153	2154-2161	2162-2169	2170-2177	2178-2185	2186-2193	2194-2201	2202-2209	2210-2217	2218-2225	2226-2233	2234-2241	2242-2249	2250-2257	2258-2265	2266-2273	2274-2281	2282-2289	2290-2297	2298-2305	2306-2313	2314-2321	2322-2329	2330-2337	2338-2345	2346-2353	2354-2361	2362-2369	2370-2377	2378-2385	2386-2393	2394-2401	2402-2409	2410-2417	2418-2425	2426-2433	2434-2441	2442-2449	2450-2457	2458-2465	2466-2473	2474-2481	2482-2489	2490-2497	2498-2505	2506-2513	2514-2521	2522-2529	2530-2537	2538-2545	2546-2553	2554-2561	2562-2569	2570-2577	2578-2585	2586-2593	2594-2601	2602-2609	2610-2617	2618-2625	2626-2633	2634-2641	2642-2649	2650-2657	2658-2665	2666-2673	2674-2681	2682-2689	2690-2697	2698-2705	2706-2713	2714-2721	2722-2729	2730-2737	2738-2745	2746-2753	2754-2761	2762-2769	2770-2777	2778-2785	2786-2793	2794-2801	2802-2809	2810-2817	2818-2825	2826-2833	2834-2841	2842-2849	2850-2857	2858-2865	2866-2873	2874-2881	2882-2889	2890-2897	2898-2905	2906-2913	2914-2921	2922-2929	2930-2937	2938-2945	2946-2953	2954-2961	2962-2969	2970-2977	2978-2985	2986-2993	2994-3001	3002-3009	3010-3017	3018-3025	3026-3033	3034-3041	3042-3049	3050-3057	3058-3065	3066-3073	3074-3081	3082-3089	3090-3097	3098-3105	3106-3113	3114-3121	3122-3129	3130-3137	3138-3145	3146-3153	3154-3161	3162-3169	3170-3177	3178-3185	3186-3193	3194-3201	3202-3209	3210-3217	3218-3225	3226-3233	3234-3241	3242-3249	3250-3257	3258-3265	3266-3273	3274-3281	3282-3289	3290-3297	3298-3305	3306-3313	3314-3321	3322-3329	3330-3337	3338-3345	3346-3353	3354-3361	3362-3369	3370-3377	3378-3385	3386-3393	3394-3401	3402-3409	3410-3417	3418-3425	3426-3433	3434-3441	3442-3449	3450-3457	3458-3465	3466-3473	3474-3481	3482-3489	3490-3497	3498-3505	3506-3513	3514-3521	3522-3529	3530-3537	3538-3545	3546-3553	3554-3561	3562-3569	3570-3577	3578-3585	3586-3593	3594-3601	3602-3609	3610-3617	3618-3625	3626-3633	3634-3641	3642-3649	3650-3657	3658-3665	3666-3673	3674-3681	3682-3689	3690-3697	3698-3705	3706-3713	3714-3721	3722-3729	3730-3737	3738-3745	3746-3753	3754-3761	3762-3769	3770-3777	3778-3785	3786-3793	3794-3801	3802-3809	3810-3817	3818-3825	3826-3833	3834-3841	3842-3849	3850-3857	3858-3865	3866-3873	3874-3881	3882-3889	3890-3897	3898-3905	3906-3913	3914-3921	3922-3929	3930-3937	3938-3945	3946-3953	3954-3961	3962-3969	3970-3977	3978-3985	3986-3993	3994-4001	4002-4009	4010-4017	4018-4025	4026-4033	4034-4041	4042-4049	4050-4057	4058-4065	4066-4073	4074-4081	4082-4089	4090-4097	4098-4105	4106-4113	4114-4121	4122-4129	4130-4137	4138-4145	4146-4153	4154-4161	4162-4169	4170-4177	4178-4185	4186-4193	4194-4201	4202-4209	4210-4217	4218-4225	4226-4233	4234-4241	4242-4249	4250-4257	4258-4265	4266-4273	4274-4281	4282-4289	4290-4297	4298-4305	4306-4313	4314-4321	4322-4329	4330-4337	4338-4345	4346-4353	4354-4361	4362-4369	4370-4377	4378-4385	4386-4393	4394-4401	4402-4409	4410-4417	4418-4425	4426-4433	4434-4441	4442-4449	4450-4457	4458-4465	4466-4473	4474-4481	4482-4489	4490-4497	4498-4505	4506-4513	4514-4521	4522-4529	4530-4537	4538-4545	4546-4553	4554-4561	4562-4569	4570-4577	4578-4585	4586-4593	4594-4601	4602-4609	4610-4617	4618-4625	4626-4633	4634-4641	4642-4649	4650-4657	4658-4665	4666-4673	4674-4681	4682-4689	4690-4697	4698-4705	4706-4713	4714-4721	4722-4729	4730-4737	4738-4745	4746-4753	4754-4761	4762-4769	4770-4777	4778-4785	4786-4793	4794-4801	4802-4809	4810-4817	4818-4825	4826-4833	4834-4841	4842-4849	4850-4857	4858-4865	4866-4873	4874-4881	4882-4889	4890-4897	4898-4905	4906-4913	4914-4921	4922-4929	4930-4937	4938-4945	4946-4953	4954-4961	4962-4969	4970-4977	4978-4985	4986-4993	4994-5001	5002-5009	5010-5017	5018-5025	5026-5033	5034-5041	5042-5049	5050-5057	5058-5065	5066-5073	5074-5081	5082-5089	5090-5097	5098-5105	5106-5113	5114-5121	5122-5129	5130-5137	5138-5145	5146-5153	5154-5161	5162-5169	5170-5177	5178-5185	5186-5193	5194-5201	5202-5209	5210-5217	5218-5225	5226-5233	5234-5241	5242-5249	5250-5257	5258-5265	5266-5273	5274-5281	5282-5289	5290-5297	5298-5305	5306-5313	5314-5321	5322-5329	5330-5337	5338-5345	5346-5353	5354-5361	5362-5369	5370-5377	5378-5385	5386-5393	5394-5401	5402-5409	5410-5417	5418-5425	5426-5433	5434-5441	5442-5449	5450-5457	5458-5465	5466-5473	5474-5481	5482-5489	5490-5497	5498-5505	5506-5513	5514-5521	5522-5529	5530-5537	5538-5545	5546-5553	5554-5561	5562-5569	5570-5577	5578-5585	5586-5593	5594-5601	5602-5609	5610-5617	5618-5625	5626-5633	5634-5641	5642-5649	5650-5657	5658-5665	5666-5673	5674-5681	5682-5689	5690-5697	5698-5705	5706-5713	5714-5721	5722-5729	5730-5737	5738-5745	5746-5753	5754-5761	5762-5769	5770-5777	5778-5785	5786-5793	5794-5801	5802-5809	5810-5817	5818-5825	5826-5833	5834-5841	5842-5849	5850-5857	5858-5865	5866-5873	5874-5881	5882-5889	5890-5897	5898-5905	5906-5913	5914-5921	5922-5929	5930-5937	5938-5945	5946-5953	5954-5961	5962-5969	5970-5977	5978-5985	5986-5993	5994-6001	6002-6009	6010-6017	6018-6025	6026-6033	6034-6041	6042-6049	6050-6057	6058-6065	6066-6073	6074-6081	6082-6089	6090-6097	6098-6105	6106-6113	6114-6121	6122-6129	6130-6137	6138-6145	6146-6153	6154-6161	6162-6169	6170-6177	6178-6185	6186-6193	6194-6201	6202-6209	6210-6217	6218-6225	6226-6233	6234-6241	6242-6249	6250-6257	6258-6265	6266-6273	6274-6281	6282-6289	6290-6297	6298-6305	6306-6313	6314-6321	6322-6329	6330-6337	6338-6345	6346-6353	6354-6361	6362-6369	6370-6377	6378-6385	6386-6393	6394-6401	6402-6409	6410-6417	6418-6425	6426-6433	6434-6441	6442-6449	6450-6457	6458-6465	6466-6473	6474-6481	6482-6489	6490-6497	6498-6505	6506-6513	6514-6521	6522-6529	6530-6537	6538-6545	6546-6553

**ATTACHMENT 2: Repackage Point Loma Wastewater Treatment Plant Grit Improvements
SUBCONSULTANTS' AND OTHER DIRECT COSTS (ODCs)
Amendment 5**

May 13, 2008

000221

Task	Task Description	Deliverable	CONTRACT		SUBCONSULTANTS		OTHER DIRECT COSTS		TOTAL		SUBCONSULTANTS' AND OTHER DIRECT COSTS (ODCs)												
			AMOUNT	UNITS	AMOUNT	UNITS	AMOUNT	UNITS	AMOUNT	UNITS	AMOUNT	UNITS	AMOUNT	UNITS	AMOUNT	UNITS	AMOUNT	UNITS					
PHASE A - DESIGN																							
1	CITY MANAGEMENT SUPPORT																						
1.1	Progress Meetings and Reports	16 Agenda/Minutes and Reports	100	\$ 0	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	360	\$ 188	\$ 207
1.2	Schedule and Cost Monitoring	Monthly Primavera Schedule Updates	200	\$ 16	100	\$ 17	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ 35
1.3	Record Management	None	0	\$ -	0	\$ -	0	\$ -	0	\$ -	12	\$ 96	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ 96
1.4	Coordination with Other City Projects	None	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
1.5	Kick-Off Meeting	None	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	40	\$ 22	\$ 22
	Subtotal, Task 1		300	\$ 27	100	\$ 17	0	\$ 0	0	\$ 0	12	\$ 96	0	\$ 0	400	\$ 220	\$ 380						
2	DESIGN TEAM MANAGEMENT																						
2.1	Monthly Status Reports	18 Monthly Status Reports, 5 Copies	1800	\$ 162	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ 162
2.2	Quarterly Contract Activity Reports	6 Quarterly Activity Reports, 2 Copies	150	\$ 14	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ 14
	Subtotal, Task 2		1850	\$ 176	0	\$ 0	0	\$ 0	0	\$ 0	0	\$ 0	0	\$ 0	0	\$ 0	0	\$ 0	0	\$ 0	0	\$ 0	\$ 176
3	NOT IN CONTRACT																						
4	NOT IN CONTRACT																						
5	INVESTIGATIONS																						
5.1	General Requirements		\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
5.2	Surveying and Mapping (As-Built/Field Investigate)		\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
5.3	Geotechnical Investigations	10 Copies Draft and 10 Copies Final	\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
5.4	Ten Percent Technical Memoranda		\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
5.4A	TM on Optional Sixth Screening Channel	10 Copies Draft and 10 Copies Final	\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
5.4B	TM on Digester/Int. Tunnel Cleaning Facility	10 Copies Draft and 10 Copies Final	\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
5.4C	TM on Project H-2R	10 Copies Draft and 10 Copies Final	\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
5.4D	TM on Blower Building & Noise Control	10 Copies Draft and 10 Copies Final	\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
5.4E	TM on Grit Removal Recommendation	10 Copies Draft and 10 Copies Final	\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
5.4F	TM on Grit Classifying System	10 Copies Draft and 10 Copies Final	\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
5.4G	Project Report TM	10 Copies Draft and 10 Copies Final	\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
5.4H	TM on Need for 3rd Scrubber	10 Copies Draft and 10 Copies Final	\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
5.4I	TM on Electrical Power Analysis (20MCC)	10 Copies Draft and 10 Copies Final	\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
	Subtotal, Task 5		0	\$ 0	0	\$ 0	0	\$ 0	0	\$ 0	0	\$ 0	0	\$ 0	0	\$ 0	0	\$ 0	0	\$ 0	0	\$ 0	\$ -
6	DESIGN DEVELOPMENT																						
6.1	Ten Percent Design Report (Deleted)		\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
6.2	Bid Document Preparation (for Prepurchase)	Assume 20 Copies	\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
6.3	30 Percent Design Development		\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
	Design Development Report	30 Copies, Three-Ring Bound	\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
	30% Drawings	20 sets of 1/2 size, 10 Full Size sets	\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
	Develop Hydraulic Profile		\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
6.3	Authorization for Final Design		\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
6.4	30 Percent Technical Memoranda		\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
6.4A	TM on Plantwide Facilities Definition	20 Copies Draft and 20 Copies Final	\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
6.4B	TM on Civil Design Development	20 Copies Draft and 20 Copies Final	\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
6.4C	TM on Mech./Process/HVAC/Odor Control	20 Copies Draft and 20 Copies Final	\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
6.4D	TM on Instrumentation & Control Design	20 Copies Draft and 20 Copies Final	\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
6.4E	TM on Electrical System Design	20 Copies Draft and 20 Copies Final	\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
6.4F	TM on Structural Development	20 Copies Draft and 20 Copies Final	\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
6.4G	TM on Arch. Design, Landscaping & Arts	20 Copies Draft and 20 Copies Final	\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
6.4H	TM on Architectural Images	20 Copies Draft and 20 Copies Final	\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
6.4I	TM on Traffic (Deleted)		\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
6.4J	TM on Const. Sequencing & Interim Facilities	20 Copies Draft and 20 Copies Final	\$ -	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	0	\$ -	\$ -
	Subtotal, Task 6		0	\$ 0	0	\$ 0	0	\$ 0	0	\$ 0	0	\$ 0	0	\$ 0	0	\$ 0	0	\$ 0	0	\$ 0	0	\$ 0	\$ -

**ATTACHMENT 2: Repackage Point Loma Wastewater Treatment Plant Grit Improvements
SUBCONSULTANTS' AND OTHER DIRECT COSTS (ODCs)
Amendment 5**

May 13, 2008

000222

TASK INFORMATION		SUBCONSULTANTS' COSTS																		LOCAL MATERIALS		TOTAL			
Task	Description	Deliverable	Copy	1/2 Size	1/4 Size	Full Size	Mylar	Binders	Paradox	Hours	Rate	Subcontractors	SWE	Chemical	Southland	Enbridge	Env. West	Other	Subtotal	Local	Material	Delivery	Subtotal	ODCs	
7	FINAL DESIGN																								
7.1	60 Percent Level Final Design																								
	60 Percent Drawings	20 Copies of 11x17 Drawings	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	Draft Specifications (Division 2 - Division 16)	20 Copies in Binders	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	Database on Informix or Paradox		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
7.2	90 Percent Level Final Design																								
	90 Percent Drawings	10 sets Half and 10 sets Full Size	0	3040	517	3040	2,736	0	502	4,016	20,000	167,680	0	2,500	0	0	0	0	0	0	0	0	0	97,449	
	90 Percent Specifications	20 sets in Binders	32000	2,880	0	0	0	20	400	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3,280	
	Database on Informix or Paradox		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
7.3	100 Percent Design Submittal																								
	100 Percent Drawings	20 sets of 1/2 size, 10 Full Size sets	0	6080	1,034	3040	2,736	0	260	2,080	11,500	12,000	0	0	0	0	0	0	0	0	0	0	0	29,350	
	100 Percent Specifications (Div 2 - thru 16)	30 Copies in Binders	32000	2,880	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2,880	
	Database on Informix or Paradox		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
7.4	Final Design Submittal	3 half size, 3 specs, Mylar, Data base	4800	432	912	155	0	304	8,080	104	832	4,500	8,000	0	0	0	0	0	0	0	0	0	0	17,999	
7.5	I&C Provider		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	Subtotal, Task 7		68,800	\$6,192	10,032	\$1,708	6,080	\$5,472	324	\$8,480	888	\$8,928	\$36,000	\$85,680	\$0	\$2,500	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$124,180	\$0
8	SUPPLEMENTAL DESIGN																								
9	DESIGN REVIEWS AND APPROVALS																								
9.1	Design Reviews and Coordination Checking	QA/QC Plan and Documentation	5000	450	100	17	1200	1,080	4	60	0	0	0	0	0	0	0	0	0	0	0	0	0	1,627	
9.2	City Review	Comments Review Documentation	200	18	0	0	0	0	0	0	0	2,000	2,500	0	0	0	0	0	0	0	0	0	0	4,606	
	Subtotal, Task 9		\$200	468	100	17	1000	1080	4	60	0	\$2,000	\$2,500	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$4,500	160
10	VALUE ENGINEERING																								
	VE Materials to Value Engineering Team and Memorandum, 10 Copies		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
11	CONSTRUCTION COST ESTIMATES																								
11.1	10 Percent Estimate	10 Copies	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
11.2	30 Percent Estimate	10 Copies	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
11.3	60 Percent Estimate	10 Copies	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
11.4	90 Percent Estimate	10 Copies	200	18	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	18	
11.5	Final Pre-bid Estimate	10 Copies	200	18	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	18	
	Subtotal, Task 11		400	\$36	0	\$0	0	\$0	0	\$0	0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	
12	CONSTRUCTABILITY REVIEW SUPPORT																								
	Constructability Review Forms		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
13	PERMITTING																								
13.1	Permit Work Plan and Schedule	Work Plan & Schedule, 5 Copies	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
13.2	Permit Applications and Technical Documents	Applications, Reports, etc., 8 copies	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
13.3	Coordination and Agency Interaction	Agenda, etc., 4 Copies	300	27	0	0	0	0	0	0	0	2,000	0	0	0	0	0	0	0	0	0	0	0	2,225	
	Subtotal, Task 13		300	\$27	0	\$0	0	\$0	0	\$0	0	\$2,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$2,000	
14	O & M Manual																								
14.1	Preliminary Draft Operations Manual, Vol. I & II	Draft Manual, 5 Copies, Binders	2000	180	100	17	0	5	100	0	0	0	0	0	0	0	0	0	0	0	0	0	0	297	
14.2	Revised Draft Operations Manual, Vol. I & II	Revised Draft, 5 Copies, Binders	2000	180	140	24	0	5	100	8	64	0	0	0	0	0	0	0	0	0	0	0	0	388	
14.3	Maintenance Manual Specifications, Vol. III	Equipment/Tool List, etc., 5 Copies	100	9	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	9	
	Subtotal, Task 14		4100	\$369	240	\$41	0	\$0	10	\$200	8	\$64	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$74	
	TOTAL PHASE A		81,050	\$7,295	10,472	\$1,780	7,080	\$6,552	338	\$8,780	888	\$7,088	\$40,000	\$85,180	\$0	\$2,500	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$130,880	920
	PHASE B - BIDDING																								
1	Advertising Support	None	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
2	Submittal List	5 Copies	30	3	0	0	0	0	0	0	0	500	500	0	0	0	0	0	0	0	0	0	0	1,003	
3	Response to Inquiries/Claifications	5 Copies	100	9	0	0	0	0	0	0	0	600	1,450	0	0	0	0	0	0	0	0	0	0	2,089	
4	Pre-Bid Conference and Site Tour	None	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
5	Prepare Technical Addenda	Draft 1 Copy and Final 1 Copy	100	9	50	9	50	45	0	35	280	500	1,450	0	0	0	0	0	0	0	0	0	0	2,293	
6	Incorporate Addenda into Bid Documents	Conformed Drawings & Specs	8000	720	1600	272	0	50	1,000	34	272	1750	1,500	0	0	0	0	0	0	0	0	0	0	4,514	
7	Evaluation of Bids	Letter of Recommendation	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
	TOTAL PHASE B		8230	\$741	1650	\$281	50	\$45	50	\$1,000	69	\$552	\$2,350	\$4,900	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$8,855	

