

Jeff Boss

Chief Operations Officer, West Valley Construction Company

Expertise

Water facility construction
Field operations
Estimating
Value-engineering
Design-build project
management

*Extensive field
operations
experience providing
concurrent
constructability input
to design-build
team*

Education

Chico State University, BA
Economics, Minor - Finance
1984

Professional History

West Valley Construction
1990-current in various
management positions

Affiliations

Design Build Institute of
America

American Water Works
Association;
Engineering and Utility
Contractors Association;
Gold Shovel Standard –
Excavation Metrics Committee

Jeff has been employed with WVC for more than 27 years and has held a number of management positions. His extensive pipeline, field engineering and value engineering experience have saved clients millions of dollars over his career.

Professional Experience Summary:

Chief Operations Officer (2015 – present)

Vice President Operations, West Valley Construction (2013 – 2015)

Vice President Northern Operations, Division Manager Redwood City/Northern Bay Area, Peninsula; District Manager Dry Utilities; Project Manager (1990 – 2013)

Provides executive oversight for all operations of WVC including Redwood City and the Northern Bay Area, Benicia, Campbell, Stockton, Chico, Livermore, Salinas, Bakersfield, Visalia and Fresno. These yards handle all types of underground construction including, potable water, telecommunications, gas, sewer and storm. Jeff oversees the annual general contract for California Water Service, San Jose Water Company, ATT, PG&E and various cities and special districts.

- Pacific Gas & Electric
- AT&T
- San Jose Water Company
- California Water Service
- East Bay MUD
- Sprint
- Verizon
- City of San Bruno
- Cuesta La Honda Guild
- City of Redwood City
- City of Daly City
- City of Los Altos
- City of Burlingame
- County of San Mateo
- Stanford University

He works side-by-side with WVC's engineering manager to provide immediate input during preliminary engineering to efficiently produce a true value engineered design.

Bill Kieren

Division Manager, West Valley Construction Company

Bill Kieren earned a Bachelor of Science degree in Construction Management from Chico State University in 2009. During his time at Chico State, he received the Chico State Advisory Boards "Outstanding Student Service Award" twice, in consecutive years.

Expertise

Project Management,
Estimating, Labor
Management, Water
Infrastructure,
Pump Stations

Since Bill began his career at West Valley Construction, he has focused his efforts to work primarily with San Jose Water Company. His experience ranges from capital improvement pipeline projects in addition to pump stations and special projects.

Professional Experience Summary:

West Valley Construction Company (2010 to present)

Division Manager, Campbell Division (March 1, 2018 to present)

Assistant Division Manager (March 2016 to March 1, 2018)

Responsible for the oversight and direction of the Campbell, Salinas and Livermore Districts including supervising the Sr. Project Manager, Operations Managers, Project Managers and Project Engineers. Daily responsibilities include estimating; monitoring budgets and contract progress; technical support; client relations; and ensuring achievement of safety and contract goals. Projects include installation of pipelines, booster stations and water tanks.

- *Key Projects*
 - *SJW Vista Del Mar/El Brande SCVWD Turnout*
 - *CWS Station LAS 6 Chloramination*
 - *SJW Cottage Grove Station – install new booster piping*

Project Manager, Campbell (March 2010 to March 2016):

Assist Division Manager in daily operations for Campbell and Livermore including: supervising other Project Managers, foreman and labor force; project estimating; project management and documentation; contracts and client management; project management with change order negotiations; scheduling; subcontractor management; safety management. Projects include installation of pipelines and booster stations and other infrastructure projects.

- *Key Projects –*
 - *Stanford Cubberly Boiler Site Utilities – 2014*
 - *Destruction of Well No. 19 – City of Santa Clara 2013*
 - *SJWC 3 Mile Well #9 - 2013*
 - *SJWC Buena Vista Station Well #13 – 2013*
 - *Allendale/Dagmar Regulator Stations - 2013*
 - *SJWC various pipeline projects – 2010 to Present*
 - *Cal Water St. 10 Chloramination Station 2013*
 - *Cal AM Meter Retrofit Program 2011*

Affiliations

Engineering and Utility
Contractors Association,
Peninsula Water Works
Association

James Gillette

Sr. Project Manager, West Valley Construction Company

James Gillette earned a Bachelor of Science degree in Construction Management from California Polytechnic State University, San Luis Obispo in March 2010.

Expertise

Project Management,
Estimating, Labor
Management, Submittals
Mechanical systems,
Pump stations

Professional Experience Summary:

West Valley Construction Company (December 2017 to present)

Project Manager, Campbell Division

Assist Division Manager in daily operations for Campbell and Livermore including: supervising foreman and labor force; project estimating; project management and documentation; contracts and client management; project management with change order negotiations; scheduling; subcontractor management; safety management. Projects include installation of pipelines and booster stations and other infrastructure projects.

Other Experience:

Project Manager and Quality Control Engineer (2016 – 2017)

James W. Fowler Co. – Box Canyon Hydroelectric Project Upstream Fish Passage

Worked in collaboration with the owner, operators, and designer during the value engineering review. Relocated main water supply to the forebay enabling elimination of large pumps producing significant savings. Duties included submittals, RFI's, Procurement, Layout, Surveying and Inspections.

Project Engineer & Superintendent (February 2016 – December 2016) Tutor Perini Corp. – CA High Speed Rail CP-1, Fresno-Madera – Excluded Utilities AT&T and PG&E

Prepared change order estimates to include utility relocations of AT&T and PG&E facilities. Duties included design submittals and approval, permits, managing subcontractors for facility installation; coordinate with facility owners, City of Fresno, County of Madera, subcontractors and the High Speed Rail Authority.

Assistant Superintendent/Project Engineer/ Project Manager (2009 – 2016) Nova Group, Inc. W912BV-15-C-001 DLA Fuel Distribution Facilities Tinker Air Force Base, Oklahoma City, OK

Fuel distribution upgrades at Tinker AFB. Demo pump house and installation of new fueling system and upgrades to existing bulk fuel storage.

Mechanical Superintendent/Mechanical Field Engineer N44255-11-C FY2010 MCON P-990 Explosives Handling Wharf #2 Naval Base Kitsap Bangor, Silverdale, WA

Construct new explosives handling wharf. Involved with complete mechanical system, shop drawings, BIM modeling, procurement, submittals, and installation.

John Garcia

Sr. Project Manager, West Valley Construction Company

John Garcia has learned the underground construction business through the trenches progressing through various supervisory and ownership roles in his more than 40 years' in the Industry.

Expertise

Water Infrastructure, Gas
Electric, Joint Trench,
Estimating, Labor
Management

Professional

More than 40 years'
experience in underground
construction joint trench,
water, communications,
sewer, gas

Professional Experience Summary:

West Valley Construction Company (April 2019 to present)

Sr. Project Manager, So. Bay Area/Campbell/No San Joaquin Valley Division

Responsibilities include managing the day-to-day construction activities including all labor, equipment and subcontractors; manage the superintendent team ensuring compliance with all safety requirements, Company policy and project requirements; determine construction methods, crew sizes and production requirements for each project.

Other Experience:

Northern Underground Construction, Owner/Manager from 2006 to 2019

Identified bid opportunities, met with owners, prepared estimates, executed contracts and managed all construction for water, sewer, storm, gas, communications, and electric work. Projects ranged in size from \$500 thousand to \$4 million. Examples of actual projects included a 6,000 foot, 12" water main for the City of Sunnyvale, and 3,000 feet of 6", 8" and 12" water mains for the City of Pleasanton. Other customers included San Jose Water, PG&E, and Summer Hill Homes.

Lewis and Tibbitts – President – 1980 – 2006

Began as a foreman and worked up to President. Responsible for all underground construction work including water, sewer, storm, gas, electric, and joint trench. In his more than 20 years, he became an expert in underground construction, wet and dry utilities.

Erik Long

Project Superintendent, West Valley Construction Company

Expertise

Water Infrastructure,
Pump Stations, Tanks and
Water Treatment Facilities
Construction

Affiliations

Engineering and Utility
Contractors Association

Professional History

With WVC for 17 years;
with other firms for 10 years

Mr. Long has extensive underground and mechanical construction experience and is well-known for his leadership, creativity and problem solving ability.

He is our lead on-site project manager/superintendent for approximately \$20M of water pipeline, pump station, water storage tanks and water treatment facilities annually in Northern California. He has constructed numerous pump stations, water storage facilities, water distribution pipelines, sewers, storm drains and water treatment facilities.

Recent sample projects are shown below (Partial List):

Project Manager/Superintendent:

- Saratoga Tanks/Pump Station, San Jose Water Company (10/2011-5/2013)

This was an extremely difficult multiphase project to remove two water storage tanks and construct two new 1.5 MG steel water storage tanks in an affluent neighborhood. Scope also included a new pump station, site appurtenances, earthworks, grading, drainage, piping, altitude valves/vault, electrical and final paving.

Contract Amount: \$6.5M

- Greenridge Terrace Station/Reservoir, San Jose Water Company (2008-2010)

Multiphase project to remove and construct two, 1.5 MG steel water storage tanks, appurtenances, earthworks, grading, drainage, piping, altitude valves/vault, electrical and final paving.

Contract Amount: \$3.6M

- Hill Lane Pump Station, San Jose Water Company (2007)

Installation of Booster Pumps, Suction & Discharge Pipe (8", 6", and 4" DICL Pipe), Pressure System, Fire Pump, Tank Retrofit, Site Improvements

Construction Cost: \$330,000

- Lexington Reservoir Pipeline Replacement, San Jose Water Company (2006)

8,000 lf of 39.4" HDPE by Float and Sink Method, 4180 lf of 36-inch, 50+ psi

Construction Cost: \$8M

Anthony Headley

Vice President of Safety, West Valley Construction Company

Expertise

Behavioral Based Safety
OSHA 10 and 30 training
Risk Assessment
Program Development

Education

UCSD Extension - Trainer for
CFR 1920 and 1926 OSHA
outreach programs;
Six Sigma Greenbelt;
CPR/FA instructor;
Certificate in Training and
Development UC Santa
Cruz;
Attended Stanislaus State,
Los Positos and
Evergreen/San Jose City
College

Affiliations

United Contractors'
Safety and Insurance
Committees; Board
Member USA North 811;
Member of Common
Ground Alliance;
Committee Member of
CA Regional Common
Ground Alliance

Professional History

With WV for more than 7
years; Tyco International for
5 years as an EHS Safety
Specialist; SimplexGrinnell
for 4 years as a Safety
Specialist; Novera Optics 1
year as Training Manager;
and Headway Technologies

Mr. Headley has more than 20 years of experience as a safety professional with more than 17 years in the construction industry. He joined WV as a Safety Manager and was promoted to Vice President-Safety in 2014.

Professional Experience Summary:

West Valley Construction Company (2010 to present)

- **VP of Safety (2014 – present)**

Contribute to a culture where safety comes first, and prevention is key. Ensure that the Company's safety program and efforts are effective in reducing exposure to accidents and injuries, reducing the experience mod to the lowest level possible and ensuring compliance with state and federal safety, health and environmental regulations. Responsibilities include managing the safety staff, ensuring facility and work site safety inspections are conducted regularly, providing ongoing safety training for all employees, conducting incident/accident investigations and ensuring corrective action, leading monthly all-hands safety meetings, participating in Executive Committee Safety Meetings and Incident Review Meetings.

- **Safety Manager – Northern Area (2010 - 2014)**

Ensure an effective safety program company-wide, and focus on site inspections, accident and incident investigations, safety training, and safety compliance in Northern region. Work with Safety Manager for the Southern Region regarding company-wide safety and consistency from site to site.

EHS Safety Specialist – Tyco International (2005 - 2010)

Responsibilities included development of Behavioral-Based safety programs at 19 company locations within the Western US. Member of the EHS Compliance Auditing Program, facilitated OSHA 10 and 30 training classes, facilitated risk assessment training for business units, managed claims within area for reduction of recordable injuries, and audited job sites routinely within area of responsibility.

Safety Specialist – Simplex Grinnell (Tyco Company) (2001 – 2005)

Responsibilities included day-to-day EHS initiatives for two large operations in California including developing employee ergonomic program, developing SOP's for safe work practices, facilitating EHS safety committees, and conducting safety inspections.

Maribel Garcia

Safety Manager, West Valley Construction Company

Ms. Garcia has more than five years' experience in safety management with West Valley. Prior to joining West Valley, Ms. Garcia was an Environmental Health and Safety Intern with Kaiser Permanente.

Expertise

Behavioral Based Safety;
Internal/External
Communications;
Safety Training;
Field Coaching;
Compliance

Education

California State University,
Sacramento - B.S. in Health
Science, concentration in
OHS, December 2013;
Deans Honor List: Fall
2013

Modesto Junior College -
Associates Degree in
Physical Education, May
2011

Affiliations

American Society of
Safety Engineers;
National Association of
Women in Construction
(NAWIC) – SF Chapter

Professional History

With West Valley
Construction Company for
more than 5 years.

Professional Experience Summary:

West Valley Construction Company (2014 to present)

- **Safety Manager (April 2016 – present)**

Responsible for the implementation and management of a comprehensive safety and health program for the Campbell/So Bay Area/Salinas and No San Joaquin Valley Division. This effort includes conducting on-site inspections for all job sites and identify any hazards and unsafe practices; taking corrective action; providing training and coaching; and ensuring that all effort is made to reduce the Company's experience mod and keep at the lowest level possible. Other specific duties include leading monthly All-Hands Safety Meetings, conducting safety training; participating in semi-annual Foremen's Safety Meetings; administering the Company's workers' compensation program including participating in and directing the investigation of all work-related accidents and participating in Incident Review Committee meetings; and counseling managers regarding safe practices, changes in regulations, and customer safety requirements.

- **Safety Coordinator (May 2014 – April 2016)**

Administered the Company's Substance Abuse Program, PHMSA and FMCSA Programs for drug/alcohol testing, and the CHP Pull Program. Investigated property and vehicle accidents, providing detailed reports of damage, cause and recommendations. Assisted in administering the Company's Injury Illness Prevention Program including providing employee safety training, conducting safety meetings, identifying hazards, and conducting facility inspections.

EHS Safety Intern – Kaiser Permanente, Sacramento (Sept 2013 – April 2014)

Duties included assisting with planning fire safety and evacuation training, conducting indoor air quality investigations to ensure particulate concentrations were acceptable for the work environment, and supporting the safety specialist in ergonomic evaluations and solutions.



DIVERSE BUSINESS ENTERPRISES REQUIREMENT STATEMENT

Owner utilizes the established guidelines from the California Public Utilities Commission (“CPUC”) to qualify diverse suppliers and requires certification as a Diverse Business Enterprise (“DBE”) by the Supplier Clearinghouse and/or the California Department of General Services. To be eligible for award of a contract from this solicitation, the bidder/proposer must execute and submit, as part of his or her bid/proposal, this statement. DBEs are divided into four classifications, as follows: Minority Business Enterprises (“MBE”), Women-Owned Business Enterprises (“WBE”), Disabled Veteran Business Enterprises (“DVBE”), and Lesbian, Gay, Bi-Sexual and Transgender Business Enterprises (“LGBTBE”). This statement shall be deemed a material factor in the Owner’s evaluation of the bid/proposal. Failure to complete and submit this statement, or the inclusion of a false statement, shall render the bid/proposal non-responsive.

The CPUC has set a goal for Owner to achieve at least 21.5% of total contract spend on DBEs, divided into the four classifications as follows: MBE – 15%, WBE – 5%, DVBE – 1.5%, and LGBTBE – goal to be established in 2020.

Owner has established certain minimum requirements, as set forth below, for the percentage of the total Contract Price that must be paid to DBEs (the “DBE Minimum”). The DBE Minimum for a contract will depend upon the total Contract Price for that contract, as set forth below. For example, for a contract with a Contract Price of \$1,200,000, the DBE Minimum is 25% and, therefore, at least \$300,000 must be paid to DBEs either as the primary contractor or as one or more subcontractors. Further, for a contract with a Contract Price of \$4,000,000, the DBE Minimum is 30% and, therefore, at least \$1,200,000 must be paid to DBEs either as the primary contractor or as one or more subcontractors.

<u>Total Contract Price</u>	<u>DBE Minimum</u>
\$100,000 - \$500,000	15%
\$500,001 - \$1,000,000	20%
\$1,000,001 - \$3,000,000	25%
\$3,000,001 and higher	30%

Notwithstanding the DBE Minimum set forth above, a bidder/proposer may propose, and is strongly encouraged to propose, a higher percentage of the Contract Price to be paid to DBEs. As part of its submission, the must respond to the questions below and identify the percentage of the Contract Price that will be paid to DBEs (such percentage must be NO LOWER THAN the DBE Minimum set forth above). The percentage of the Contract Price that will be paid to DBEs (to the bidder/proposer as primary contractor or to subcontractors), as indicated on this form, will be a contractual requirement (the “DBE Requirement”) that must be met by the bidder/proposer in performing the Contract Services. Failure to meet the DBE Requirement will be considered a breach of the contract and may result in termination of the contract by the Owner.



Complete the items below:

1. Is bidder/proposer certified as a Diverse Business Enterprise with the CPUC Supplier Clearinghouse and/or the California Department of General Services?

Respond YES or NO: No

If YES, provide a copy of your certification with your bid/proposal and identify which classification your firm is certified under (i.e., MBE, WBE, DVBE, or LGBTBE):

2. What is the DBE Requirement (the percentage of the Contract Price that will be paid to DBEs) that bidder/proposer will agree to in the contract for the Contract Services?

30 % of Contract Price (such percentage must be equal to or greater than the DBE Minimum as set forth above)

Bidder/Proposer Name: West Valley Construction Company, Inc.

Printed Name of Authorized Person: Patrick Miller

Signature of Authorized Person: *Patrick Miller*

Title of Authorized Person: Assistant Vice President



July 23, 2019

California American Water Company
511 Forest Lodge Rd., Suite 190
Pacific Grove, CA 93950
Attn: Lori Girard, Corporate Counsel

Subject: Monterey Peninsula Water Supply Project – Castroville Pipeline-Local Resource Utilization Plan

Dear Ms. Girard,
West Valley Construction Company, Inc. certifies that at least 50% of the construction work force for the subject contract will be residents of Monterey, San Benito or Santa Cruz counties. These will be qualified individuals of either West Valley Construction or its subcontractors/suppliers. Execution of the contract requirements will be accomplished by our construction yard located in Salinas CA.

All the best,
West Valley Construction Company, Inc.

A handwritten signature in blue ink, appearing to read 'Patrick Miller', is written over the typed name.

Patrick Miller
Assistant Vice President

**Monterey Peninsula Water Supply Project
Request for Proposals for the Construction of Castroville Pipeline**

PROPOSAL FORM 5

**PRELIMINARY PROJECT SCHEDULE, SCHEDULED CONSTRUCTION DATE AND
SCHEDULED ACCEPTANCE DATE**

The Proposer shall submit a preliminary Project schedule with the Proposal that includes important construction activities and milestones from issuance of the Notice to Proceed through final completion. This preliminary Project schedule shall be submitted in both written and electronic formats. The level of detail shall be in summary level for major procurement and construction activities. Major milestones throughout the construction period shall be included.

The preliminary Project schedule shall consist of, but not be limited to, the following:

- (i) Important procurement activities and milestones
- (ii) Important construction activities and milestones
- (iii) Important commissioning and testing milestones
- (iv) It shall indicate the sequence of Work and the time of starting and completing each part.

In addition, the Proposer shall summarize and provide a list of proposed major milestones and completion dates including, but not limited to:

- 5.2.3.2 Issuance of Notice to Proceed
- 5.2.3.3 Expected delivery of all materials and equipment
- 5.2.3.4 Date of construction commencement
- 5.2.3.5 Completion of major structures
- 5.2.3.6 Commissioning and functional testing commencement
- 5.2.3.7 Substantial Completion Date
- 5.2.3.8 Acceptance test
- 5.2.3.9 Date of acceptance
- 5.2.3.10 Date of Completion and readiness for final payment

The Proposer shall use the following format to provide this information:

TABLE 5-1 MAJOR ACTIVITIES AND MILESTONES ¹		
ACTIVITY NUMBER	ACTIVITY/MILESTONE	DATE ²
1	Preconstruction	4/13/20
8	Construction	10/16/20
14	Final Testing	10/20/20

West Valley Construction Company, Inc.

Name of Proposer

Patrick Miller

Name of Designated Signatory

Patrick Miller

Signature

Assistant Vice President

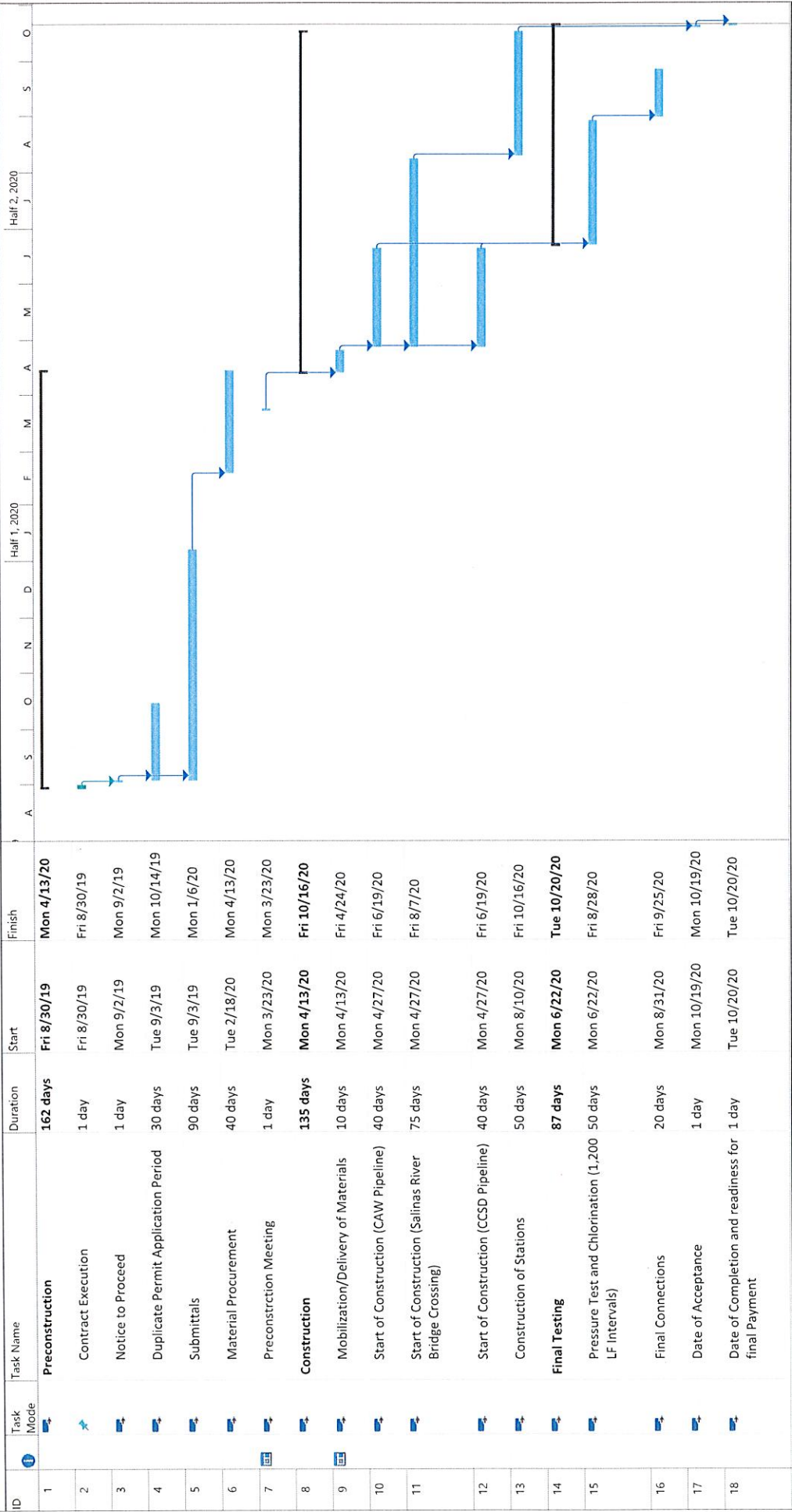
Title

Footnotes:

¹ List each major activity and milestone separately.

² Indicate the end of activity or date milestone achieved.

West Valley Construction



Project: Monterey Peninsula Water Supply Project
Date: Tue 7/23/19

Task Split Milestone Summary

Project Summary Inactive Task Inactive Milestone Inactive Summary

Manual Task Duration-only Manual Summary Rollup Manual Summary

Start-only Finish-only External Tasks External Milestone

Deadline Progress Manual Progress



July 23, 2019

PLAN FOR ACCEPTANCE TESTING
Cal Am Water-Castroville Pipeline Proposal

Overview

West Valley Construction proposes to Hydrostatic Pressure Test and Disinfect the new proposed pipeline at a maximum of 1,200 LF intervals. Hydrostatic Pressure Testing will be performed at 150 PSI for 4 hours and Disinfection will be performed per AWWA specifications. After pressure testing and disinfection is complete, final connections are to be made. All discharge water is planned to be de-chlorinated and re-used as construction water for dust control.

Flowmeter stations will have a start up and test day to verify performance. International Motor Controls LLC. will be onsite to perform Startup/Testing/ and Training.

Once the Pipeline and Flowmeter stations have been successfully tested, owner to accept the new facility and 1-year warranty period to begin.



July 23, 2019

TECHNICAL PROPOSAL
Cal Am Water-Castroville Pipeline Proposal

Overview

West Valley Construction (WVC) proposes to install the Zinc-coated DICL pipeline via open cut trench method. Any ground water will be pumped into settling tanks and re-used as dust control. Pipeline to be installed in 1,200 LF intervals to facilitate testing and disinfection procedures. Once testing and disinfection is complete, final connections using mechanical joints are to be made. Fittings are to be zinc coated.

The Salinas River Bridge portion will be installed from the bridge deck using truck mounted platforms. West Valley's crew will first clean the bridge deck of any debris. Then we will scan/core abutments, install all hardware, install suspended zinc DICL Pipe, install vaults and EBBA connections, and apply approved paint.

Jack and Bore will be performed by Pacific Boring. WVC will install shoring per OSHA standards and casing/carrier pipe to be installed per plans and specs.

Directional Boring to be performed by Precision Directional Drilling and Accu-Bore Directional. PVC Fusing to be performed Aegion/Underground Solutions per plans/specifications. All civil work, testing, and final connections to be performed by WVC. Alternate Bid Item B is proposed to be installed via directional bore method. There is a \$302,400.00 cost savings if alternate Bid Item B is selected in lieu of Bid Item 16.

Flow meter stations are to be constructed by WVC and International Motor Controls LLC. Once complete, WVC will facilitate a start-up/test/and training day with owner.

Prior Experience

In the last 2 years, West Valley Construction has performed over \$100M of pipeline work with San Jose Water Company and California Water Services Company. See attached. The experience of our crews will be translated into the efficient and effective installation of the Castroville pipeline.



West Valley Construction Co., Inc.
 580 E. McGlincy Lane, Campbell CA 95008-4907
 Phone (408) 371-5510 Fax (408) 371-3604

To:	California American Water	Contact:	
Address:	Pacific Grove, CA	Phone:	(831) 646-3287
		Fax:	
Project Name:	Construction Of Castroville Pipeline	Bid Number:	
Project Location:	Castroville, CA	Bid Date:	7/23/2019

West Valley Construction Co., Inc. is pleased to offer the following quotation for the above referenced project. Further clarification regarding supply and/or installation of Labor, equipment and materials is contained herein.

Item #	Item Description	Estimated Quantity	Unit	Unit Price	Total Price
1	Pre-Construction Activities, Community Outreach And Permits	1.00	LS	\$30,000.00	\$30,000.00
2	General Overhead, Bonding, And Insurances	1.00	LS	\$111,435.00	\$111,435.00
3	Mobilization/ Demobilization	1.00	LS	\$38,100.00	\$38,100.00
4	Environmental Requirements, Erosion Control And SWPPP	1.00	LS	\$49,500.00	\$49,500.00
5	Silt And Exclusion Fencing	4,350.00	LF	\$6.00	\$26,100.00
6	Health And Safety Compliance	1.00	LS	\$106,400.00	\$106,400.00
7	Utility Potholing	15.00	EACH	\$3,379.00	\$50,685.00
8	Staking/Surveying/As-Built Drawings	1.00	LS	\$449,500.00	\$449,500.00
9	Traffic Control	1.00	LS	\$180,525.00	\$180,525.00
10	Trench Shoring	1.00	LS	\$73,500.00	\$73,500.00
11	Trench Dewatering	1.00	LS	\$49,675.00	\$49,675.00
12	Jack And Bore Under RR At Dole Entry	1.00	LS	\$219,275.00	\$219,275.00
13	Install 8" Pipeline In Steel Casing (HWY 183)	160.00	LF	\$1,405.00	\$224,800.00
14	HDD 400' 8" Fused PVC Under Tembladero Slough	1.00	LS	\$180,165.00	\$180,165.00
15	Provide And Install 12" DI Pipe	9,138.00	LF	\$138.00	\$1,261,044.00
16	Provide And Install 8" DIP With NBR Gaskets For CCSD Portion	8,400.00	LF	\$270.00	\$2,268,000.00
17	Provide And Install 8" DI Pipe CAW With Gaskets For CAW Portion	180.00	LF	\$270.00	\$48,600.00
18	NBR Gaskets For About 5063 LF Of 12" DI Pipe (For 20' Sticks Of Pipe)	258.00	EACH	\$2.50	\$645.00
19	Chain Link Fencing, Concrete Pads And Grading @ 3 Meter Stations	1.00	LS	\$130,335.00	\$130,335.00
20	Cathodic Protection For CAW Portion - Zinc-Coated DIP.	1.00	LS	\$39,750.00	\$39,750.00
21	Cathodic Protection For CCSD Portion - Zinc-Coated DIP	1.00	LS	\$39,750.00	\$39,750.00
22	Restoration Of Pavement Markings	1.00	LS	\$13,375.00	\$13,375.00
23	AC Pavement	97.00	TON	\$1,245.00	\$120,765.00
24	Lead Testing And Abatement For Caltrans @ HWY 183	1.00	LS	\$40,150.00	\$40,150.00
25	Soil Disposal (NON Hazardous)	4,571.00	CY	\$27.00	\$123,417.00
26	Seeding (CA Native Mix)	48,400.00	SF	\$0.22	\$10,648.00
27	Electrical And Instrumental Testing And Startup	1.00	LS	\$36,252.00	\$36,252.00
28	Repair Of Irrigation Lines And Drain Tiles	1.00	LS	\$10,000.00	\$10,000.00
29	Install 12" Gate Isolation Valve	6.00	EACH	\$1,350.00	\$8,100.00
30	Install 8" Gate Isolation Valve	5.00	EACH	\$1,359.00	\$6,795.00
31	2" Combination ARV.	8.00	EACH	\$23,181.25	\$185,450.00
32	Pump Out Blow Off Assembly	9.00	EACH	\$13,650.00	\$122,850.00
33	Lapis Flow Meter In Vault	1.00	LS	\$37,600.00	\$37,600.00
34	Electrical And Instrumentation At Lapis FM (Solar)	1.00	LS	\$172,750.00	\$172,750.00
35	CSIP Tie-in (12" Tee And 12" GV And 12"x8" Reducer)	1.00	LS	\$12,600.00	\$12,600.00
36	8" RPP Backflow Prevention Device	1.00	LS	\$23,850.00	\$23,850.00

Item #	Item Description	Estimated Quantity	Unit	Unit Price	Total Price
37	8" Pressure Regulating Station In Vault	1.00	LS	\$98,175.00	\$98,175.00
38	8" Actuated Valve In Vault	1.00	LS	\$46,375.00	\$46,375.00
39	Electrical And Instrumentation At CAW Nashua Road Meter Station	1.00	LS	\$243,500.00	\$243,500.00
40	PG&E Service At CAW Nashua Road Meter Station	1.00	LS	\$50,000.00	\$50,000.00
41	SCADA/PLC Programming For CAW (LAPIS And Nashua)	1.00	LS	\$91,500.00	\$91,500.00
42	8" Flow Meter In Vault	1.00	LS	\$31,800.00	\$31,800.00
43	Electrical And Instrumentation At CCSD Nashua Road Meter Station (Solar)	1.00	LS	\$215,000.00	\$215,000.00
44	PLC/SCADA Programing For CCSD	1.00	LS	\$55,750.00	\$55,750.00
45	Provide And Install Welded Steel Pipe Casings In Bridge Abutments	2.00	EACH	\$40,000.00	\$80,000.00
46	Misc Metal (Bridge)	3,450.00	LB	\$26.00	\$89,700.00
47	12" Ductile Iron Pipe Between Seismic Joints, Epoxy Coated	830.00	LF	\$688.00	\$571,040.00
48	Erect Waterline Pipe Hanger System (Bridge)	1.00	LS	\$256,500.00	\$256,500.00
49	Provide PC Concrete Vault	1.00	LS	\$109,000.00	\$109,000.00
50	Provide And Install Seismic Joint In Vault	1.00	LS	\$61,675.00	\$61,675.00
51	Concrete Barrier 735 Railing Connection	1.00	LS	\$55,000.00	\$55,000.00

Total Base Bid Price: \$8,557,401.00

A					
A	Alternate ItemA- Provide Metals For Bridge In 316 Stainless Steel	3,450.00	LB	\$39.50	\$136,275.00

Total Price for above A Items: \$136,275.00

B					
B	Alternate ItemB Provide And Install Fusible PVC Pipe For CCSD Portion	8,400.00	LF	\$234.00	\$1,965,600.00

Total Price for above B Items: \$1,965,600.00

<p>ACCEPTED: The above prices, specifications and conditions are satisfactory and are hereby accepted.</p> <p>Buyer: _____</p> <p>Signature: _____</p> <p>Date of Acceptance: _____</p>	<p>CONFIRMED: West Valley Construction Company Inc.</p> <p>Authorized Signature: _____</p> <p>Estimator: Eric Gonzales 408-371-5510 EGonzales@wvcc.com</p>
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MPWSP Castroville Pipeline Castroville, CA



Sales Contact:

Jacob Ferreira

Phone Number: (925) 577-7566

Email: JFerreira@aegion.com

Proposal Created by: ML

Prepared for:

Bidding Contractors

Opportunity Number: AAJA-XSI5TI

Date Prepared: 7/3/2019

Bid Proposal **Proposal Number: P18-0494**

Bid Form

BID ITEM	APPROX. QTY.	UNIT	DESCRIPTION WITH UNIT PRICE (PRICE IS INCLUSIVE OF ALL APPLICABLE TAXES, PROFIT, INSURANCE, BONDS AND OTHER OVERHEAD)	UNIT PRICE	TOTAL ITEM PRICE
12	1	LS	Jack and Bore under RR at Dole Entry		
13	160	LF	Install 8" Pipeline in Steel Casing (Hwy 183)		
14	1	LS	HDD 400 LF 8" Fused PVC under Tembladero Slough		
15	9138	LF	Provide and Install 12" DI Pipe		
16	8400	LF	Provide and Install 8" DI Pipe with NBR Gaskets for CCSD Portion		
17	180	LF	Provide and Install 8" DI Pipe with NBR Gaskets for CAW Portion		
18	258	EA	NBR Gaskets for about 5083 LF of 12" DI Pipe (for 20 ft sticks of pipe)		
19	1	LS	Chain Link Fencing, Concrete Pads and Grading at 3 Meter Stations		
20	1	LS	Cathodic Protection for CAW Portion Metallic Pipelines and Appurtenances Cathodic Protection System or Zinc-Coated DIP. Circle One		
21	1	LS	Cathodic Protection for CCSD Portion Metallic Pipelines and Appurtenances Cathodic Protection System or Zinc-Coated DIP. Circle One		
Monte Road Bridge Crossing					
45	2	EA	Provide and Install Welded Steel Pipe Casings in Bridge Abutments		
47	830	LF	12" Ductile Iron Pipe between Seismic Joints, Epoxy coated		
48	1	LS	Erect waterline pipe hanger system (bridge)		
Alternate Bid Items					
A	3450	LB	Provide All Misc. Metals for Bridge in 316 Stainless Steel		
B	8400	LF	Provide and Install 8" Fusible PVC Pipe for CCSD Portion		

Product Specification

Section 02600 – Fusible PVC Pressure Pipe PART 2 – PRODUCTS

2.1 FUSIBLE POLYVINYLCHLORIDE PRESSURE PIPE FOR POTABLE WATER

- A. Fusible polyvinylchloride pipe shall conform to AWWA C900, AWWA C905, ASTM D2241 or ASTM D1785 for standard dimensions, as applicable. Testing shall be in accordance with the referenced AWWA standards for all pipe types.
- B. Fusible polyvinylchloride pipe shall be extruded with plain ends. The ends shall be square to the pipe and free of any bevel or chamfer. There shall be no bell or gasket of any kind incorporated into the pipe.
- C. Fusible polyvinylchloride pipe shall be manufactured in a standard 40' nominal length, or custom lengths as specified.
- D. Fusible polyvinylchloride pipe shall be blue in color for potable water use.

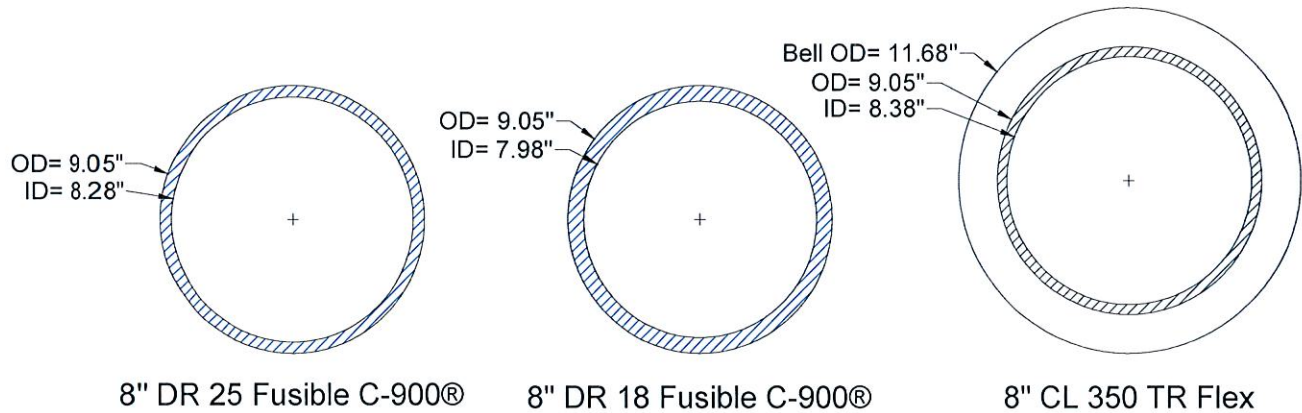
Plans

TABLE 1. PIPING SCHEDULE

Pipe Name	Approx. Sta Start	Approx. Sta End	Approx. Length (ft)	Diameter (in)	Pipe Type	Min. Pressure Rating (psi)	Standard Dimension Ratio, PVC
12-in Pipeline (Start to S. end Monte Rd. Bridge)	10+15	50+50	4,035	12	DI	250	-
Jack and Bore at RR/Dole Entry							
Carrier Pipe	26+30	29+00	270	12	DI	250	-
Casing Pipe	26+40	28+80	240	24	Steel		-
Pipe Under Monte Rd Bridge	50+60	58+90	830	12	DI Epoxy Coated	250	-
12-in Pipeline (N. end Monte Rd. Bridge to Reducer)	59+00	109+63	5063	12	DI w/ NBR Gaskets	250	-
8-in Pipeline (Reducer to CAW/CCSD line)	109+63	111+50	180	8	DI w/ NBR Gaskets	250	
8-in Pipeline (CAW/CCSD line to End, less HDD)	111+50	199+65	8,400	8	DI w/ NBR Gaskets or Fused PVC	150	25
Pipe HDD Under Tembladero Slough	185+70	189+70	400	8	Fused PVC	235	18
Caltrans Hwy 183 Crossing							
Carrier Pipe	197+20	199+00	180	8	DI w/ NBR Gaskets or Fused PVC	150	25
Casing Pipe	197+30	198+90	160	20	Steel		-

Pipe Technical Data Sheet

	8" DR 25 Fusible C-900®	8" DR 18 Fusible C-900®	8" CL 350 TR Flex®
Pipe Material	Fusible C-900®	Fusible C-900®	TR Flex®
Nominal Diameter (in)	8	8	8
Dimension Ratio	DR 25	DR 18	CL 350
Series	DIPS	DIPS	DIPS
Pressure Rating (PSIG)	165	235	350
Safety Factor	2.0	2.0	2.0
Bell/Coupling OD (in)	N/A	N/A	11.68
Outside Diameter (in)	9.05	9.05	9.05
Inside Diameter (in)	8.28	7.98	8.38
Cross Sectional Flow Area (in ²)	53.9	50.1	55.1
Bend Radius (LF)	189	189	412
Tensile Strength (PSIG)	7,000	7,000	60,000
Safe Pulling Force (lbs)	27,600	37,800	30,000
Safe Pulling Stress (PSIG)	2,800	2,800	N/A
Relaxation Period (hrs)	0	0	0
Hydrostatic Design Basis (PSIG)	4,000	4,000	-
Critical Buckling Pressure (PSIG)	68	191	-
Connection to Host Pipe	Standard Mechanical Joint	Standard Mechanical Joint	Standard Mechanical Joint
Material Weight (lbs/ft)	6.4	8.7	23.1
Water Disinfectant Induced Oxidation	High Resistance	High Resistance	-
Hydrocarbon Permeation	High Resistance	High Resistance	-

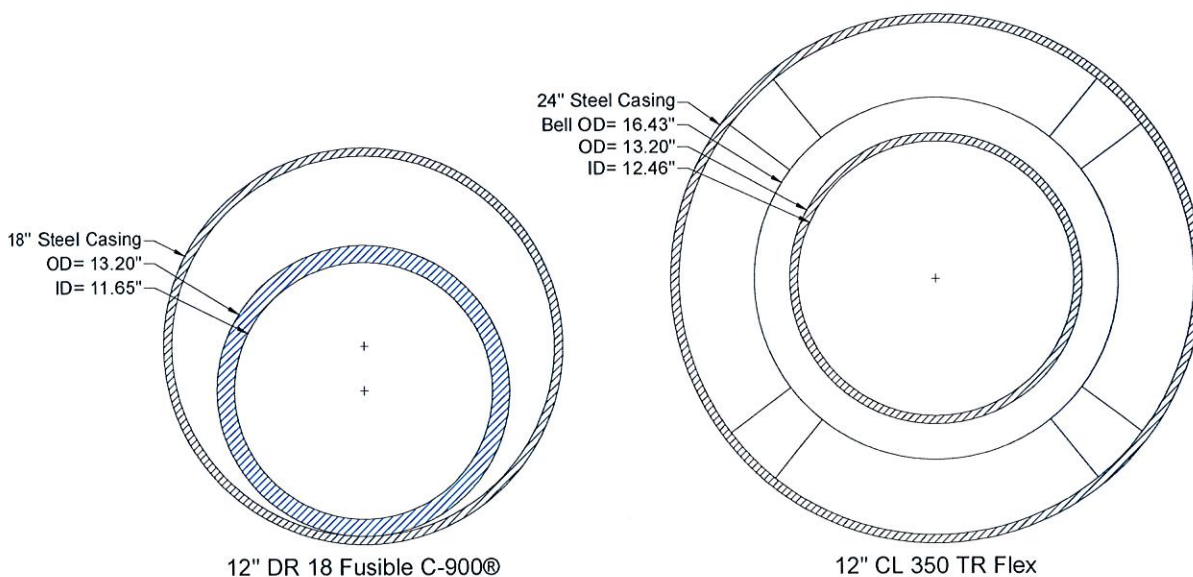


Supporting references for the above data can be found at:

<http://www.aegion.com/about/our-brands/underground-solutions/pipe-technical-data-reference>

Pipe Technical Data Sheet

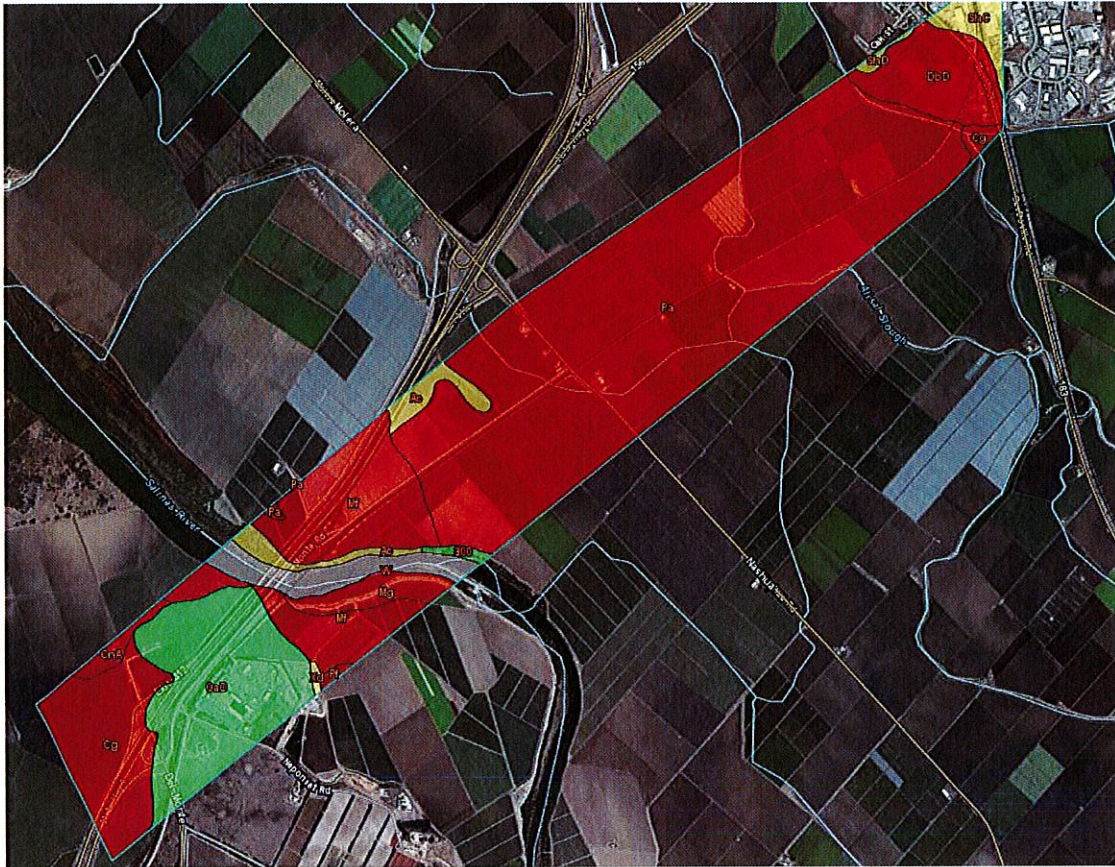
	12" DR 18 Fusible C-900®	12" CL 350 TR Flex®
Pipe Material	Fusible C-900®	TR Flex®
Nominal Diameter (in)	12	12
Dimension Ratio	DR 18	CL 350
Series	DIPS	DIPS
Pressure Rating (PSIG)	235	350
Safety Factor	2.0	2.0
Bell/Coupling OD (in)	N/A	16.43
Outside Diameter (in)	13.20	13.20
Inside Diameter (in)	11.65	12.46
Cross Sectional Flow Area (in ²)	106.5	121.8
Bend Radius (LF)	275	412
Tensile Strength (PSIG)	7,000	60,000
Safe Pulling Force (lbs)	80,300	65,000
Safe Pulling Stress (PSIG)	2,800	N/A
Relaxation Period (hrs)	0	0
Hydrostatic Design Basis (PSIG)	4,000	-
Critical Buckling Pressure (PSIG)	190	-
Connection to Host Pipe	Standard Mechanical Joint	Standard Mechanical Joint
Material Weight (lbs/ft)	18.6	38.6
Water Disinfectant Induced Oxidation	High Resistance	-
Hydrocarbon Permeation	High Resistance	-



Supporting references for the above data can be found at:

<http://www.aegion.com/about/our-brands/underground-solutions/pipe-technical-data-reference>

Soil Corrosion Data



Summary by Map Unit – Monterey County, California (CA053)				
Map unit symbol	Map unit name	Rating	Acres in AOI	Percent of AOI
300	Corducci-Typic Xerofluvents, 0 to 5 percent slopes, occasionally flooded, MLRA 14	Low	3.8	0.3%
Ac	Alviso silty clay loam	Moderate	26.2	2.2%
Cg	Clear Lake clay, sandy substratum, drained, 0 to 1 percent slopes, MLRA 14	High	99.2	8.2%
CnA	Cropley silty clay, 0 to 2 percent slopes	High	9.3	0.8%
DbD	Diablo clay, 5 to 25 percent slopes, MLRA 15	High	61.8	5.1%
Mf	Metz fine sandy loam	High	140.7	11.6%
Mg	Metz complex	High	24.0	2.0%
OaD	Oceano loamy sand, 2 to 15 percent slopes	Low	151.2	12.5%
Pa	Pacheco clay loam, MLRA 14	High	630.6	52.0%
Pf	Pico fine sandy loam	High	2.1	0.2%
ShC	Santa Ynez fine sandy loam, 2 to 9 percent slopes	Moderate	22.6	1.9%
ShD	Santa Ynez fine sandy loam, 9 to 15 percent slopes	Moderate	2.8	0.2%
W	Water		37.2	3.1%
Xd	Xerorthents, dissected	Moderate	1.5	0.1%
Totals for Area of Interest			1,213.2	100.00%

Soil Properties and Qualities

Part 618, Subpart B – Exhibits

618.80 Guides for Estimating Risk of Corrosion Potential for Uncoated Steel

http://www.soils.usda.gov/wps/portal/nrcs/detail/soils/ref/?cid=nrcs142p2_054224#80

Property	Limits		
	Low	Moderate	High
Resistivity at saturation (ohm-cm)	≥ 5,000	2,000 - 5,000	< 2,000

Ductile Iron Pipe & Fittings Coatings



2009 study on the Bureau of Reclamation’s corrosion protection standards for Ductile Iron pipe found that Ductile Iron with polyethylene encasement “is not likely to provide a reliable 50 year service life in highly corrosive soils (<2,000 ohm-cm)” and recommended a dielectric coating with cathodic protection.

Soil Resistivity	Soil Corrosivity	BOR Standard
≥ 3,000 ohm-cm	Least Corrosive	PE Encasement
2,000 – 3,000 ohm-cm	Moderately Corrosive	PE Encasement and CP
≤ 2,000 ohm-cm	Highly Corrosive	Bonded Dielectric Coating and Cathodic Protection



Laguna Beach, CA Installs FPVC® Pipe for Force Main Project in Median of Pacific Coast Highway

In September 2007, Underground Solutions, Inc. (UGSI) contracted with Bubalo Construction to provide UGSI's FPVC® pipe and fusion services for the Nyes Place North Coast Interceptor Rehabilitation Project. The Interceptor is located in the median of the Pacific Coast Highway (Route 1) in a high traffic area. This portion of the project required sliplining a section of existing fiberglass pipeline, replacing a section of steel pipeline, and moving the pipeline from under the Nyes Place bridge to an alignment over the bridge. The bypassing and line work was performed during winter months to minimize traffic impact. The new line was placed back in service in March 2008.

Pipeline Details and Project Summary

Project:	Nyes Place North Coast Interceptor Rehabilitation Project
Location:	Laguna Beach, CA
Length and Pipe:	480 LF of 10" DR 14 FPVC® 800 LF of 20" DR 18 FPVC®
Installation:	Slipline & Open Cut

Dudek Associates selected FPVC® pipe over HDPE in order to maximize flow area due to the limited space available for crossing the bridge and sliplining the existing pipeline. Harry Riebe of Dudek commented: "Fusible PVC® pipe is the perfect product to maximize flow capacities using an existing pipe as a carrier pipe. In addition, the use of UGSI's innovative Fusible Sweeps™ provided us with the flexibility to cross over Caltrans' bridge with minimum clearances".

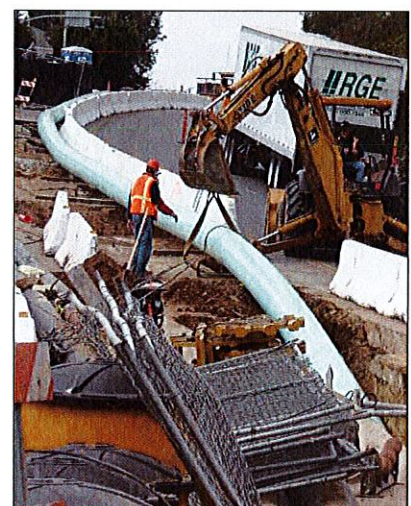
David Shissler of Laguna Beach indicated: "The straight wall profile (no bells) of Fusible PVC® pipe provides unique advantages over existing pipe materials for this and other applications, which will allow us to provide pipeline rehabilitation and replacement at reduced overall costs compared to previous options."



Fusing Fusible Sweeps™



Fusible Sweeps™ over Bridge



Sliplining 20" FPVC® Pipe

Underground Solutions (UGSI) provides infrastructure technologies for water/wastewater applications. UGSI's Fusible PVC® products, including Fusible C-900®, Fusible C-905® and FPVC®, contain a patented PVC formulation that, when combined with UGSI's patented fusion process, results in a monolithic, fully-restrained, gasket-free, leak-free piping system. UGSI's Duraliner™ is a patented, close-fit pipeline renewal system creating a stand-alone structural liner.



Fusible PVC® Pipe Installed in Caltrans Right-of-Way for Cambria County Services District Bridge Replacement Project

In August 2008, Underground Solutions, Inc. (UGSI) contracted with Souza Construction of Farmersville, CA to provide UGSI's Fusible PVC® pipe and fusion services for the Moonstone Beach Drive Bridge Replacement project in the County of San Luis Obispo, CA. As part of the bridge replacement project, three existing pipelines were removed from service and replaced with new pipelines enclosed inside separate casings that were integral to the newly constructed bridge. The three pipelines included a 14" potable water line, a 12" reclaim line, and an 8" gravity sewer line. The project required the approval of the California Department of Transportation (Caltrans) to use Fusible PVC® pipe in the Caltrans right-of-way.

Fusible PVC® pipe was selected based on the following criteria: 1) the main potable water pipeline had working pressures above 125 psi; 2) corrosion resistance; 3) ability to be pulled into the casings from either end; and 4) limited OD clearances due to the enhanced architectural and structural features of the replacement bridge. Fusible PVC® pipe, with its fully-restrained joint, facilitated installation of temporary bypass lines as well as permanent positioning within the new replacement bridge.



Pipeline Details and Project Summary

Project:	Moonstone Beach Drive Bridge Replacement
Location:	San Luis Obispo County, CA
Owner:	Cambria Community Services District
Contractor:	Souza Construction Inc.
Pipe Length:	2,400 LF
Pipe Size(s):	14" DR18 Fusible C-905®, 12" DR18 FPVC®, 8" DR25 FPVC®
Installation:	Direct Bury (temporary bypass), Slipline in casing (permanent)
UGSI Contact:	Rob Crow – (925) 577-7566 rcraw@undergroundsolutions.com

The owner of the pipelines, Cambria Community Services District (CCSD), contacted UGSI after discussing the benefits of Fusible PVC® pipe for the application with the County's design team and other UGSI customers in California. The key feature of Fusible PVC® pipe versus the original design pipe material was its ability to downsize each of the casings while maintaining ID and flow at the required pressure class. The decrease in steel casing sizes saved money while allowing the District to utilize PVC pipe.



This was a critical project for CCSD because the potable water service line is the community's primary potable transmission main from CCSD's wellfield. Similarly, the reclaim line is the primary treated wastewater effluent line for the community, located between its wastewater treatment plant and the remotely located effluent disposal percolation ponds. Robert Gresens, District Engineer, commented: "We are all breathing a sigh of relief that this project went as smoothly as it did. The contractor, design team, and County staff should all be commended. The Fusible PVC® pipeline application certainly worked out well."

Underground Solutions (UGSI) provides infrastructure technologies for water/wastewater applications. UGSI's Fusible PVC® products, including Fusible C-900®, Fusible C-905® and FPVC®, contain a patented PVC formulation that, when combined with UGSI's patented fusion process, results in a monolithic, fully-restrained, gasket-free, leak-free piping system. UGSI's Duraliner™ is a patented, close-fit pipeline renewal system creating a stand-alone structural liner.

Product and Installation Guide for Fusible PVC[®] Pipe

Recommended handling and installation practices for Fusible PVC[®] pipe are straightforward and well within current construction practice in terms of required equipment, appurtenances, procedures, and labor skillset. For operators and installers accustomed to working with PVC pipe, Fusible PVC[®] pipe will only require adjustment to the longer lengths of pipe (including both delivered and assembled pipe) and the proper way to handle and install the product. For operators and installers accustomed to working with high density polyethylene (HDPE) pipe, Fusible PVC[®] pipe is joined in a similar method, however, the requirements for handling, installing, and connecting the pipe will be different.

UGS has developed a Product and Installation Guide, which covers the following topics:

- Shipping and Receiving
- Thermal Butt Fusion
- Fusible PVC[®] Pipe Connections
- Testing and Disinfection
- Tapping Fusible PVC[®] Pipe
- Pulling Parameters
- Cutting Fusible PVC[®] Pipe
- Horizontal Directional Drilling
- Sliplining
- Pipe Bursting
- Direct Bury
- Special Considerations

Proper handling and installation of Fusible PVC[®] pipe in accordance with the Product and Installation Guide will preserve your warranty protection.

UGSI will provide a copy of the Product and Installation Guide upon the acceptance of your order in accordance with the terms of the Proposal. In the meantime, contact your UGSI representative if you have any questions or concerns regarding the proper handling and use of Fusible PVC[®] pipe products.

**Monterey Peninsula Water Supply Project
Request for Proposals for the Construction of Castroville Pipeline**

PROPOSAL FORM 6

ACCEPTANCE OF THE CONTRACT

Proposer agrees to all of the provisions of the draft Contract except as expressly provided in the track changes or redline version of the draft Contract that is attached to this Proposal Form.

West Valley Construction Company, Inc.

Name of Proposer

Patrick Miller

Name of Designated Signatory



Signature

Assistant Vice President

Title