

**PLANS AND SPECIFICATIONS
FOR
TOWN PROJECT #13-31
Almond Grove Street Reconstruction
Phase II**

**Bid Opening
Wednesday, March 22, 2017**

Approved by Town Council for the Town of Los Gatos

Recommended by:



Lisa Petersen, P.E.
Town Engineer

Approved by:



Matt Morley
Director of Parks and Public Works

Date: 2/28/2017

TABLE OF CONTENTS

SECTION	TITLE	PAGE
---------	-------	------

Part I – Bid and Award

<u>Notice to Contractors</u>	I-1
<u>Bid Documents</u>	
Bid Form	I-5
A. Schedule of Quantities.....	I-6A
B. Bid Form	I-7
C. Reservation.....	I-7
D. Subcontractors	I-7
E. Notice	I-7
F. Disclosure.....	I-7
G. Words and Phrases	I-7
H. Certification.....	I-7
I. Licensing.....	I-7
List of Subcontractors	I-11
Bidder’s Bond.....	I-13
Construction Agreement.....	I-15
Contractors Bond for Labor and Material	I-25
Contractors Bond for Faithful Performance	I-29

Part II – Standard Specifications

Section 1	DEFINITIONS AND TERMS.....	II-1
1-1.01	Definitions	II-1
1-1.02	Specifications.....	II-2
1-1.03	General.....	II-2
1-1.04	Statement of Work	II-2
1-1.05	Drawings.....	II-3
1-1.06	Business License.....	II-3
1-1.07	Minority and Women Business Enterprises.....	II-3
1-1.08	Proof of Competency of Bidder.....	II-3
1-1.09	Special Notice	II-3
Section 2	PROPOSAL REQUIREMENTS AND CONDITIONS	II-4
2-1.01	Examination of Plans, Specifications and Site Work	II-4
2-1.02	Contents of Bid	II-4
2-1.03	Withdrawal of Bid	II-4
2-1.03.A	Withdrawal of Bids After Opening.....	II-4
2-1.03.B	Bidders Interested in More than One Bid	II-4
2-1.04	Submission of Bids; Agreement to Assign	II-5
2-1.05	List of Subcontractors.....	II-5
2-1.06	Insurance.....	II-5
2-1.07	Bidder’s Bond.....	II-5
2-1.08	Guarantee of Materials and Equipment	II-5
Section 3	AWARD AND EXECUTION OF CONTRACT	II-7
3-1.01	Award or Rejection of Bids	II-7
3-1.02	Rejection of Proposals	II-7

SECTION	TITLE	PAGE
3-1.03	Substitution of Subcontractors.....	II-7
3-1.04	Performance Bond and Labor and Materials Bond.....	II-8
3-1.05	Execution of Agreement	II-8
3-1.06	Notification by Contractor	II-8
Section 4	SCOPE OF WORK.....	II-10
4-1.01	Location of Work.....	II-10
4-1.02	Changes to the Work.....	II-10
4-1.03	Notification of Change in Condition.....	II-10
Section 5	CONTROL OF WORK	II-12
5-1.01	Control of Work.....	II-12
5-1.02	Interpretation of Drawings and Documents Prior to Bidding	II-12
Section 6	CONTROL OF MATERIALS.....	II-13
6-1.01	Control of Materials	II-13
Section 7	LEGAL RELATIONS AND RESPONSIBILITY	II-14
7-1.01	Wages	II-14
7-1.02	Additional Sureties	II-14
7-1.03	Legal Relations and Responsibility	II-14
7-1.04	Employment of Apprentices	II-15
7-1.05	Storm Water Pollution Prevention	II-16
7-1.06	Public Works Contracts; Assignment to Awarding Body	II-16
7-1.07	Unfair Business Practice Claims.....	II-16
7-1.08	Traffic Control Plan and Devices	II-17
7-1.09	Insurance.....	II-17
7-1.10	Contract Documents on Site	II-19
7-1.11	Coordination of Work with Other Contracts	II-19
7-1.12	Equal Employment Opportunity Policy	II-19
7-1.12.A	Equal Employment Opportunity Officer	II-19
7-1.12.B	Dissemination of Policy	II-20
7-1.12.C	Recruitment.....	II-20
7-1.12.D	Personnel Actions	II-20
7-1.12.E	Training and Promotion	II-21
7-1.12.F	Unions.....	II-21
7-1.12.G	Subcontracting	II-21
7-1.12.H	Debarred Contractors and Subcontractors	II-22
7-1.12.I	Notices and Posters.....	II-22
7-1.12.J	Fair Employment Practices Statement	II-22
7-1.12.K	Records	II-22
7-1.12.L	Reports	II-23
7-1.12.M	Breach of Equal Employment Conditions	II-23
7-1.12.N	Disqualification from Future Contracts	II-24
7-1.12.O	Other Remedies.....	II-24
7-1.13	Equipment and Material Replacement.....	II-24
7-1.14	Public Safety Notice - Noise.....	II-24
Section 8	PROSECUTION AND PROGRESS	II-26
8-1.01	Progress Schedule	II-26
8-1.02	Start of Work and Time of Completion	II-26
8-1.03	Liquidated Damages	II-26
8-1.04	Adjustment and Preservation of Utilities.....	II-27
8-1.05	Working Hours	II-27
8-1.06	Supervision	II-27

SECTION	TITLE	PAGE
8-1.07	Pre-Construction Conference.....	II-27
Section 9	MEASUREMENT AND PAYMENT	II-29
9-1.01	Measurement and Payment.....	II-29

Part III – Special Provisions

Section 1	SPECIFICATIONS AND PLANS	III-1
	Special Provisions Section 1 – Section 9.....	III-1
Section 2	PROPOSAL REQUIREMENTS AND CONDITIONS	III-1
	Proposal Guaranty.....	III-1
	Pre-Bid Site Inspection	III-1
Section 3	AWARD AND EXECUTION OF CONTRACT	III-1
	Determination of Low Bid	III-1
	Pre-Construction Conference.....	III-2
Section 4	BEGINNING OF WORK, TIME OF COMPLETION, AND LIQUIDATED DAMAGES.....	III-2
	General.....	III-2
	Time of Completion.....	III-2
	Liquidated Damages	III-3
Section 5	GENERAL REQUIREMENTS	III-3
	Licenses	III-3
	Worker’s Compensation	III-3
	Insurance Requirements.....	III-3
	Public Safety	III-4
	Labor Nondiscrimination.....	III-4
	Prevailing Wage.....	III-7
	Payroll Records.....	III-7
Section 6	CONTROL OF WORK	III-7
	Record Drawings	III-7
	Materials Testing	III-8
Section 7	CLAIMS	III-8
	General.....	III-8
Section 8	MATERIALS.....	III-10
	Town Furnished Materials.....	III-10
	Submittals	III-10
	Materials Submittal List.....	III-11
Section 9	DESCRIPTION OF WORK	III-15
	Description of Work	III-15
	Locations of Work	III-15

Part IV – Technical Specifications

Section 10-1	GENERAL CONSTRUCTION REQUIREMENTS	IV-1
	Order of Work/Project Phasing.....	IV-1
	Cooperation.....	IV-2
	Progress Schedule	IV-2
	Record Drawings	IV-3
	General Measurement and Payment Requirements	IV-4
	Hours of Work	IV-4
	24-Hour Contact Number/Supervision	IV-4

SECTION	TITLE	PAGE
	Advance Public Notification and Outreach	IV-4
	Line and Grade.....	IV-6
	Meetings.....	IV-6
	Waste Haulers and Recycling Operations.....	IV-6
	Project Appearance and Street Sweeping	IV-6
	Right-of-Way	IV-7
	Tree Trimming.....	IV-7
	Landscaping Obstruction	IV-7
	Staging/Disposal Areas.....	IV-7
	Dust Control.....	IV-8
	Water for Construction	IV-8
	Sanitation	IV-8
	Electric Blowers.....	IV-8
	Protect Existing Facilities to Remain.....	IV-8
	Location of Existing Facilities	IV-9
	Video Survey	IV-10
	Measurement and Payment.....	IV-10
Section 10-2	MOBILIZATION	IV-10
	General.....	IV-10
	Measurement and Payment.....	IV-10
Section 10-3	CLEARING, GRUBBING AND ENVIRONMENTAL PROTECTION	IV-11
	General.....	IV-11
	Environmental Protection-Storm Water Pollution Control.....	IV-11
	Measurement and Payment	IV-12
Section 10-4	TRAFFIC CONTROL REQUIREMENTS	IV-13
	General.....	IV-13
	Traffic Control/Management Plan	IV-14
	No Parking Signs	IV-14
	Detours, Temporary Striping, and Barriers.....	IV-14
	Additional Construction Area Signs and Controls.....	IV-14
	Maintenance of Pedestrian Access and Circulation.....	IV-15
	Allowable Road Closures	IV-16
	Lane Closures	IV-16
	Traffic Control System for Lane Closure	IV-17
	Temporary Pavement Delineation	IV-17
	Property Access Requirements	IV-18
	Driveway Closures.....	IV-18
	Measurement and Payment.....	IV-19
Section 10-5	CONSTRUCTION STAKING AND LAYOUT	IV-19
	General.....	IV-19
	Measurement and Payment.....	IV-20
Section 10-6	TREE REMOVAL.....	IV-20
	General.....	IV-20
	Measurement and Payment.....	IV-20
Section 10-7	ROOT PRUNING.....	IV-20
	General.....	IV-20
	Measurement and Payment.....	IV-21
Section 10-8	HARDSCAPE REMOVAL	IV-21
	General.....	IV-21
	Measurement and Payment.....	IV-22

SECTION	TITLE	PAGE
Section 10-9	PAVEMENT, SIDEWALK, RAMPS, DRIVEWAY APPROACH, AND CURB AND GUTTER DEMOLITION	IV-22
	General.....	IV-22
	Measurement and Payment	IV-23
Section 10-10	EARTHWORK.....	IV-23
	General.....	IV-23
	Measurement and Payment	IV-25
Section 10-11	AGGREGATE BASE COURSE	IV-25
	General.....	IV-25
	Measurement and Payment	IV-26
Section 10-12	PORTLAND CEMENT CONCRETE PAVEMENT	IV-26
	General.....	IV-26
	A. Summary	IV-26
	B. Definitions	IV-26
	C. Submittals	IV-26
	D. Quality Control and Assurance	IV-28
	Materials	IV-35
	A. General	IV-35
	B. Concrete.....	IV-35
	C. Reinforcement, Bars, and Baskets	IV-36
	D. Joint Filler.....	IV-36
	E. Curing Compound.....	IV-37
	Construction.....	IV-37
	A. General	IV-37
	B. Water Supply	IV-37
	C. Joints.....	IV-37
	D. Bar Reinforcement.....	IV-38
	E. Diamond Dowel Placement	IV-38
	F. Smooth Dowel Bar Placement	IV-38
	G. Placing Concrete.....	IV-38
	H. Edge Treatment	IV-41
	I. Finishing	IV-41
	J. Curing	IV-42
	K. Protecting Concrete Pavement	IV-43
	L. Early Use of Concrete Pavement	IV-43
	M. Drilling Cores	IV-43
	N. Pavement Repair and Replacement	IV-43
	Measurement and Payment	IV-44
Section 10-13	ASPHALT TRANSITIONS AND DRIVEWAY/WALKWAY CONFORMS	IV-45
	General.....	IV-45
	Measurement and Payment	IV-46
Section 10-14	CURB AND GUTTER	IV-46
	General.....	IV-46
	Measurement and Payment	IV-47
Section 10-15	SIDEWALK.....	IV-47
	General.....	IV-47
	Measurement and Payment	IV-48
Section 10-16	CURB RAMPS	IV-48
	General.....	IV-48
	Detectable Warning Surface	IV-49

SECTION	TITLE	PAGE
	Measurement and Payment	IV-50
Section 10-17	DRIVEWAYS	IV-50
	General.....	IV-50
	Measurement and Payment	IV-51
Section 10-18	TREE PLANTING	IV-51
	General.....	IV-51
	Measurement and Payment	IV-53
Section 10-19	MONUMENTS.....	IV-53
	General.....	IV-53
	Measurement and Payment	IV-53
Section 10-20	ADJUST FACILITIES TO GRADE	IV-53
	General.....	IV-53
	Measurement and Payment	IV-54
Section 10-21	INSTALL COBBLE MEDIAN	IV-55
	General.....	IV-55
	Measurement and Payment	IV-55
Section 10-22	DRAINAGE STRUCTURES	IV-55
	General.....	IV-55
	Measurement and Payment	IV-56
Section 10-23	TRAFFIC STRIPES, PAVEMENT MARKINGS, AND MARKERS.....	IV-56
	General.....	IV-56
	Thermoplastic Traffic Stripe and Pavement Marking.....	IV-57
	Striping Removal	IV-57
	Curb Painting	IV-58
	Raised Pavement Markers.....	IV-58
	Measurement and Payment	IV-58
Section 10-24	SIGNAGE.....	IV-59
	General.....	IV-59
	Measurement and Payment	IV-59
Section 10-25	INSTALL SPEED HUMP	IV-59
	General.....	IV-59
	Measurement and Payment	IV-59
Section 10-26	ADDITIVE ALTERNATE WORK.....	IV-60
	General.....	IV-60
	Measurement and Payment	IV-60

Appendices

Appendix A	Standard Plans-Traffic	App.-1
Appendix B	Caltrans Working Day Calendars	App.-17
Appendix C	Blueprint for a Clean Bay	App.-21
Appendix D	Town of Los Gatos Storm Water Pollution Control Ordinance.....	App.-33

NOTICE TO CONTRACTORS

NOTICE TO CONTRACTORS

Sealed proposals will be received at the office of the Town Clerk of the Town of Los Gatos, 110 E. Main Street, Los Gatos, CA 95030, until

10:00 AM

WEDNESDAY

MARCH 22, 2017

for the following project:

Project #13-31 Almond Grove Street Reconstruction Phase II

at which time they will be publicly opened and read aloud. Sealed proposals must be clearly marked on the outside with the Project name or number, date, and time of bid.

This following information is presented to indicate the size of the project and no warrant is made or intended as to final quantities:

The project includes Portland cement concrete (PCC) and asphalt concrete (AC) pavement demolition, demolition of PCC curb and gutter, sidewalk, and driveways, subgrade preparation and grading, construction of PCC curb and gutter, sidewalk and driveways, PCC pavement, ADA curb ramps, adjusting utility covers and boxes, tree removal, landscaping, tree planting, storm drain improvements (curb inlets, storm drain piping, and manhole), striping and signage, traffic control and environmental protection on Almond Avenue, Bayview Avenue, Bean Avenue, Glen Ridge Avenue, Massol Avenue, Nicholson Avenue, Tait Avenue, and Wilder Avenue in the Almond Grove District in the Town of Los Gatos.

All contractors and subcontractors who bid or work on public works project must register and pay an annual fee to Department of Industrial Relations (DIR). Effective March 1, 2015, no contractor or subcontractor may be listed on a bid proposal unless registered with DIR. Effective April 1, 2015, no contractor or subcontractor may work on a public works project unless registered by DIR.

All contractors and subcontractors must furnish electronic certified payroll records directly to the Labor Commissioner (aka Division of Labor Standards Enforcement). For additional information, visit the DIR website at: <http://www.dir.ca.gov/Public-Works/PublicWorks.html>.

Each bid must be accompanied by a cashier's check, certified check, or Bidder's Bond executed by a corporate surety authorized to engage in such business in the State of California, payable to the Town of Los Gatos, in an amount not less than ten percent (10%) of the amount of the Base Bid. The successful bidder will be required to furnish a Performance Bond in an amount equal to one-hundred percent (100%) of the contract price, and a Labor and Material Bond in an amount equal to one-hundred percent (100%) of the contract price. Said bonds shall also be executed by a corporate surety authorized to engage in such business in the State of California and be made payable to the Town of Los Gatos. Original Bidder's Bond with surety seal must accompany the bid.

If the successful bidder fails, neglects, or refuses for TEN (10) calendar days after the award of the contract to enter into the contract to perform the work, the cashier's check, certified check, or Bidder's Bond accompanying the bid and the amount therein named, shall be declared forfeited to the Town and shall be collected by it and paid into its general fund. No bidder may withdraw his/her bid for a period of SIXTY (60) calendar days after the date set for the opening thereof, and the same shall be subject to acceptance by the Town during this period.

The Town reserves the right to reject any or all bids, waive any irregularities in any bids and its determination as to which bid is the lowest responsible bid and is for the best interest of the Town shall be final. The Town shall have SIXTY (60) calendar days from and after the opening of the bids within which to make its determination.

The Contractor receiving the award of the contract shall begin work within FIFTEEN (15) calendar days after receipt of the Notice to Proceed or the first day of construction, whichever is earlier, and shall diligently prosecute the same to completion within the time restrictions as listed in the technical specifications and all work shall be completed by the time allotted in the technical specifications.

The Contractor shall diligently prosecute the work to completion within the number of days and times listed below:

- May 1, 2017 to October 1, 2017 (total of 107 working days)
- May 1, 2018 to October 1, 2018 (total of 107 working days)
- May 1, 2019 to October 1, 2019 (total of 107 working days)

During each time period the contractor must complete two (2) to three (3) streets per year, in place and complete. The Contractor may be allowed to start earlier in 2018 and 2019, weather permitting, and as agreed upon by the Town. The number of working days will remain the same.

Working days will be counted upon the Contractor's receipt of the Notice to Proceed, as noted above. In the event that completion of the construction by the Contractor is delayed beyond the working days prescribed above for each individual time period, the Contractor shall pay the Town **Three Thousand Five Hundred Dollars (\$3,500.00)** per day in liquidated damages for each and every calendar day until completion of the construction for the year.

At the time the Contractor's bid proposal is submitted, the Contractor shall possess a valid Class A California General Contractor's License. The Contractor shall also possess a valid Town of Los Gatos Business License at the time the contract is awarded. The Contractor shall perform, with the Contractor's own forces, the contract work amounting to not less than 50 percent of the original total contract price.

The Town of Los Gatos hereby notifies all bidders that it will affirmatively insure that the contract entered into pursuant to this advertisement will be awarded to the lowest responsible bidder without discrimination on the grounds of race, color, national origin, sex, religion, age or disability. **The Contractor or subcontractor shall not discriminate on the basis of race, color, national origin, or sex in the performance of this contract. The contractor shall carry out applicable requirements of 49 CFR, Part 26 in the award and administration of DOT-assisted contracts. Failure by the Contractor to carry out these requirements is a material breach of this contract, which may result in the termination of this contract, or such other remedy as recipient deems appropriate.**

Prevailing Rate of Wages: In accordance with the provisions of the California Labor Code, the Town Council hereby determines that the general prevailing per diem rate of wages in the Town of Los Gatos, for laborers and for each craft or type of worker and mechanic employed in the execution of the contract, is the Union Wage Scale established for Santa Clara County, which wage scale as of the execution date of the contract is incorporated herein as if fully set forth. Overtime shall be not less than one and one-half (1-1/2) times the established rates. Sundays and holidays shall be not less than two (2) times the established rates. In payment of labor, the Contractor shall comply with the provisions of Labor Code Sections 1770 to 1781 inclusive (Article 2, Chapter 1, Part 7, Division 2), and any acts amendatory thereto.

the form and manner and subject to the conditions provided in Article 8, (commencing with Section 10263), Chapter 1, Part 2, Division 2 of the Public Contract Code of the State of California.

Plans and Specifications may be viewed at no cost or purchased for a non-refundable fee of eighty-seven dollars (\$87.00) via the internet at www.printscharlesrepro.com (Plan Vault). Plans and Specifications may also be purchased by calling or e-mailing Prints Charles Reprographics at (408) 240-3330 or incoming@printscharlesrepro.com. Please make checks payable to Prints Charles Reprographics. Bidders requesting that Plans and Specifications be mailed/shipped to them will be charged the full cost of shipping. Plans, Specifications, and Plan Holder's list may also be viewed at the website noted above.

ATTEST:


Shelley Neis, Clerk Administrator

BID DOCUMENTS

BID FORM

**TO: The Town of Los Gatos, County of Santa Clara,
State of California, herein called Owner**

FROM: _____ , herein called Contractor

A. UNIT PRICE SCHEDULE

Pursuant to and in compliance with your Notice to Contractors and the Contract Documents relating to the **PROJECT #13-31 Almond Grove Street Reconstruction Phase II**, including Addenda

No. _____, _____, _____, _____, _____, _____, _____, _____, _____, _____, the undersigned bidder, having become thoroughly familiar with the terms and conditions of the Contract Documents and with the local conditions affecting the performance and the costs of the Work at the place where the Work is to be done, and having inspected the site in all particulars, hereby proposes and agrees to fully perform the work within the time stated and in strict accordance with the Contract Documents (including the furnishing of any and all labor and materials) and do all the work required to construct and to complete said work in accordance with the Contract Documents, and that Contractor will take in full payment therefore the amounts shown on the following unit price schedule:

SCHEDULE OF QUANTITIES

Project #13-31 Almond Grove Street Reconstruction Phase II

BASE BID:

ITEM NO.	SPEC. SECTION	ITEM DESCRIPTION	UNIT	EST. QTY.	UNIT PRICE	EXTENSION
1.	10-2	Mobilization (Max. 4% of the contract price)	L.S.	1		
2.	10-3	Clearing and Grubbing	L.S.	1		
3.	10-3	Environmental Protection - Storm Water Pollution Prevention Plan	L.S.	1		
4.	10-4	Traffic Control	L.S.	1		
5.	10-5	Construction Staking and Layout	L.S.	1		
6.	10-6	6"-12" Tree Removal	Ea.	37		
7.	10-6	12"-18" Tree Removal	Ea.	30		
8.	10-6	18" or Greater Tree Removal	Ea.	10		
9.	10-8	Remove Existing Hardscape	S.F.	11,994		
10.	10-9	Remove Existing Pavement, Sidewalk, Ramps, Driveway Approach, and Curb & Gutter (FPQ)	S.F.	467,677		
11.	10-10	Roadway Excavation & Off-Haul (FPQ)	C.Y.	1,735		
12.	10-10	Over-Excavation (Revocable)	C.Y.	800		
13.	10-10	HDPE Irrigation Sleeve and PVC Pipe	L.F.	160		
14.	10-12	Install 6.5" Jointed Plain Concrete Pavement (JPCP)	S.Y.	39,213		
15.	10-13	Install Asphalt Transition	Ton	225		
16.	10-13	Install Driveway/Walkway Conform - Hardscape	S.F.	3,758		
17.	10-13	Install Driveway/Walkway Conform - PCC	S.F.	2,297		
18.	10-13	Install Driveway/Walkway Conform - Asphalt Pavement	S.F.	2,985		
19.	10-14	Install Curb and Gutter	L.F.	18,659		
20.	10-14	Install Vertical Curb	L.F.	380		
21.	10-15	Install Sidewalk	S.F.	46,422		

SCHEDULE OF QUANTITIES

Project #13-31 Almond Grove Street Reconstruction Phase II

ITEM NO.	SPEC. SECTION	ITEM DESCRIPTION	UNIT	EST. QTY.	UNIT PRICE	EXTENSION
22.	10-15	Install Villa Hermosa Sidewalk	S.F.	4,272		
23.	10-16	Install Curb Ramp	Ea.	54		
24.	10-17	Install Residential Driveway	S.F.	9,457		
25.	10-17	Install Commercial Driveway	S.F.	2,565		
26.	10-18	Install 15 Gallon Tree	Ea.	108		
27.	10-18	Install 24" Box Tree	Ea.	74		
28.	10-19	Install Centerline Monument	Ea.	10		
29.	10-20	Adjust SD Manhole to Grade	Ea.	16		
30.	10-20	Adjust SS Manhole to Grade (Revocable)	Ea.	30		
31.	10-20	Adjust Utility Vault to Grade (Revocable)	Ea.	7		
32.	10-20	Adjust Gas Valve Box to Grade (Revocable)	Ea.	1		
33.	10-20	Adjust Water Meter Box to Grade (Revocable)	Ea.	101		
34.	10-20	Adjust Sanitary Sewer Cleanout Box to Grade (Revocable)	Ea.	9		
35.	10-20	Replace Valve Box (Revocable)	Ea.	2		
36.	10-20	Replace Water Meter Box (Revocable)	Ea.	131		
37.	10-20	Replace Water Valve Box (Revocable)	Ea.	68		
38.	10-20	Replace Sanitary Sewer Cleanout Box (Revocable)	Ea.	60		
39.	10-21	Install Cobble Median	S.F.	310		
40.	10-22	Install Storm Drain Inlet	Ea.	4		
41.	10-22	Install Storm Drain Inlet Frame and Grate	Ea.	1		
42.	10-22	Install Storm Drain Pipe	L.F.	50		

SCHEDULE OF QUANTITIES

Project #13-31 Almond Grove Street Reconstruction Phase II

ITEM NO.	SPEC. SECTION	ITEM DESCRIPTION	UNIT	EST. QTY.	UNIT PRICE	EXTENSION
43.	10-22	Install Storm Drain Manhole	Ea.	1		
44.	10-23	Install Traffic Stop Bar - Thermo.	Ea.	51		
45.	10-23	Thermoplastic Pavement Marking	S.F.	1,400		
46.	10-23	Pavement Striping - Thermo.	L.F.	1,810		
47.	10-23	Parking Stall Striping - Thermo.	Ea.	57		
48.	10-23	Blue Retroreflective Raised Pavement Marker	Ea.	5		
49.	10-24	Remove Existing and Place New Sign	Ea.	146		
50.	10-25	Install Speed Hump	Ea.	1		

TOTAL BASE BID (ITEMS #1-50): \$ _____

ADD. ALTERNATE BID 1:

A1.	10-26	Bayview Ave. from Sta. 1+00 to Sta. 2+80	L.S.	1		
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TOTAL ADD. ALTERNATE 1 BID (ITEM #A1): \$ _____

ADD. ALTERNATE BID 2:

A2.	10-26	Bean Ave. from Sta. 9+50 to Sta. 11+20	L.S.	1		
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TOTAL ADD. ALTERNATE 2 BID (ITEM #A2): \$ _____

ADD. ALTERNATE BID 3:

A3.	10-26	Nicholson Ave. from Sta. 1+15 to Sta. 3+40	L.S.	1		
-----	-------	--	------	---	--	--

TOTAL ADD. ALTERNATE 3 BID (ITEM #A3): \$ _____

GRAND TOTAL BID (BASE BID + ADD. ALTERNATE BIDS 1-3): \$ _____

A class A California Contractor's License is required.

B. BID FORM

The quantities shown on this bid form are approximate only, being given as a basis for the comparison of bids, and the Owner does not, expressly or by implication agree that the actual amount of work will correspond therewith, but reserves the right to increase or decrease the amount or class or portion of the work as may be deemed necessary or advisable by the Director of Parks & Public Works. This bid will be rejected if bidder fails to provide a bid for each item. The Owner reserves the right to make a comparison of bids based on any combination of the above alternate bid items.

C. RESERVATION

It is understood that the Owner reserves the right to reject this bid, but that this bid shall not be withdrawn for a period of 60 days from the date prescribed for its opening.

D. SUBCONTRACTORS

Attached hereto and incorporated herein is the complete and entire list of subcontractors to be employed by the undersigned in the performance of the work.

E. NOTICE

If written notice of the acceptance of this bid is mailed or delivered personally to the undersigned within 60 days after the date set for the opening of this bid, or at any time thereafter before it is withdrawn, the undersigned bidder shall execute and deliver the Contract Documents to Owner in accordance with this bid as accepted, and will also furnish and deliver to Owner the Performance Bond, Labor and Material Bond as specified, and proof of insurance coverage as required in Part I, under "Construction Agreement," of these Specifications, all within 10 calendar days after personal delivery or after deposit in the mails, of the notification of acceptance of this bid. The above mentioned bonds shall be satisfactory to, and on the forms approved by Owner.

Notice of acceptance or request for additional information may be addressed to the undersigned at the address set forth below.

F. DISCLOSURE

The undersigned declares that this bid is not made in the interest of or on behalf of any undisclosed person, partnership, company, association, organization or corporation; that the bid is genuine and not collusive or sham; that the undersigned has not directly or indirectly induced or solicited any other bidder to put in a false or sham bid and has not directly or indirectly colluded or agreed with any bidder or anyone else to put in a sham bid or to refrain from bidding; that the undersigned has not directly or indirectly sought by agreement, communication or conference with anyone to fix his/her bid price or the bid price of any other bidder, or to fix any overhead, profit or cost element of such bid price or of that of any other bidder, or to secure any advantage against the Town of Los Gatos or anyone interested in the proposed Contract; that the only persons or parties interested in this bid as principals are those named herein; that all statements contained in this bid are true; that the undersigned has not directly or indirectly, submitted his/her bid price or any breakdown thereof, or the contents thereof, or divulged information or data relative thereto, to any other persons, partnership, corporation, or association except to such person or persons as have a direct financial interest in bidder's general business; and that the undersigned has not accepted any bid from any subcontractor or materialperson through any bid

depository, the Bylaws, Rules or Regulations of which prohibit or prevent the undersigned from considering any bid from any subcontractor or materialperson, which is not processed through said bid depository, or which may prevent any subcontractor or materialperson from bidding to any general contractor who does not use the facilities of or accept bids from or through such bid depository; and that the undersigned has not paid, and will not pay, any fee to any corporation, partnership, company, association, organization, bid depository, or to any member or agent thereof to effectuate a collusive or sham bid.

G. WORDS AND PHRASES

Wherever in this bid an amount is stated in both words and figures, in case of discrepancy between words and figures, the words shall prevail; if all or any portion of the proposal is required to be given in unit prices and totals and a discrepancy exists between any such unit prices and totals so given, the unit prices shall prevail.

H. CERTIFICATION

The undersigned certifies that the Contract Documents have been thoroughly read and understood and that, except as may be specifically noted and contained in addenda, there are no discrepancies or misunderstandings as to the meaning, purpose or intent of any provision in the Contract Documents or as to the interpretation of the same. The undersigned hereby incorporates by reference, the same as though set out in full, all provisions of the Notice to Contractors and Information for Bidders published by Owner and pertaining to the work described in this bid.

Accompanying this bid is _____ [insert words "cash", "cashier's check", "certified check", or "bidder's bond", as the case may be], in amount equal to at least 10% of total of the bid, naming the Owner as Obligee or Payee, as applicable.

The names of all persons interested in the foregoing bid as principals are as follows:

IMPORTANT NOTICE: If bidder or other interested person is a corporation, give legal name of corporation, state where incorporated and names of the president and secretary thereof; if a partnership, give name of the firm, also names of all individual co-partners composing firm; if bidder or other interested person is an individual, give first and last names in full.

I. LICENSING

The undersigned is licensed in accordance with State Law providing for the registration of Contractors, License No. _____. [A class "A" General Contractor's License is required.] The License expiration date is _____. No payment for work or material under this Contract will be made by Owner unless and until the Owner receives verification from the State Registrar of Contractors that the records of the Contractor's State License Board indicate the successful bidder was properly licensed at the time the Contract was awarded.

Any bidder not so licensed shall be subject to all legal penalties imposed by law, including, but not limited to, an appropriate disciplinary action by the Contractor's State License Board.

In addition, failure of the bidder to obtain and maintain proper and adequate licensing for the Contract shall constitute a failure to execute or perform this Contract and shall result in the forfeiture of the security of the bidder. The representations made herein are under penalty of perjury.

NOTE: If bidder is a corporation, the legal name of the corporation shall be set forth below, together with the signature of the officer or officers authorized to sign contracts on behalf of the corporation; if bidder is a co-partnership, the name of the firm shall be set forth below, together with the signatures of the partner or partners authorized to sign contracts in behalf of the co-partnership; and if bidder is an individual, his/her signature shall be placed below.

I declare under penalty of perjury that I have the authority to execute this bid form and that the foregoing is true and correct.

BUSINESS ADDRESS: _____

PLACE OF RESIDENCE: _____

DATE: _____

BIDDER: _____
(FIRM NAME)

BY: _____ TITLE: _____

ADDRESS / TELEPHONE: _____

CALIFORNIA DEPARTMENT OF INDUSTRIAL RELATIONS (DIR)

REGISTRATION NUMBER: _____

LIST OF SUBCONTRACTORS

In compliance with the provisions of §§4100-4107 of the Public Contracts Code of the State of California, and any amendments thereof, the undersigned bidder has set forth below the name and the location of the place of business of each subcontractor who will perform work or labor or render service to the undersigned in or about the construction of the Work to be performed under the Contract Documents to which the attached bid is responsive, or of a person who will, off the job site, specially fabricate a portion of the Work or improvement according to detailed drawings contained in the *Standard Specifications*, Part II, and the portion of the Work which will be done by each such subcontractor or person that will be in an amount in excess of ½ of 1% of the prime Contractor's total bid, or \$10,000, whichever is greater. Prime Contractor shall list the California Department of Industrial Relations (DIR) number for all subcontractors working on the project.

[illegible]

(If necessary, continue on another sheet of paper in the same format)

(Bidder's Signature)

BIDDER'S BOND

KNOW ALL PERSONS BY THESE PRESENTS:

That we, _____ as Principal, and _____ as Surety, are held and firmly bound unto the Town of Los Gatos, a municipal corporation of the State of California (hereinafter called "Town") in the penal sum of 10% of the total aggregate amount of the bid of the Principal above named, submitted by said Principal to the Town for the work described below, for the payment of which sum in lawful money of the United States, well and truly to be made, we bind ourselves, our heirs, executors, administrators and successors, jointly and severally, firmly by these presents. In no case shall the liability of the Surety hereunder exceed the sum of (\$_____) dollars.

The condition of this obligation is such that a bid to the Town for certain construction specifically described as follows, for which bids are to be opened on **Wednesday, March 22, 2017, at 10:00 a.m.**, has been submitted by Principal to Town:

BID TOTAL from BID SCHEDULE: _____

The quantities shown on this bid form are approximate only, being given as a basis for the comparison of bids, and the Owner does not, expressly or by implication agree that the actual amount of work will correspond therewith, but reserves the right to increase or decrease the amount or class or portion of the work as may be deemed necessary or advisable by the Director of Parks & Public Works.

NOW THEREFORE, if the Principal is awarded the Contract and within the time and manner required under the Specifications, after the prescribed forms are presented to the Principal for signature, enters into a written contract, in the prescribed form, in accordance with the bid, and files 2 bonds with the Town, to guarantee faithful performance of the Contract and to guarantee payment for labor and materials as provided by law as well as files insurance certificates and equal employment opportunity documentation required under the bid, then this obligation shall be null and void; otherwise, it shall remain in full force.

In the event suit is brought upon said bond by Town, and judgment is recovered, the Surety shall pay all costs incurred by Town in such suit, including a reasonable attorney's fee to be fixed by the Court.

IN WITNESS WHEREOF, we have hereunto set our hands and seals this _____ day of _____, 20__.

PRINCIPAL:

(Seal)

(Seal)

(Seal) (Principal)

(Address)

(City, State, Zip)

(Phone Number)

SURETY:

(Seal)

(Seal)

(Seal) (Principal)

(Address)

(City, State, Zip)

(Phone Number)

NOTE: Attach Notary Acknowledgment for signatures of those executing for **PRINCIPAL** (owner) and **SURETY**.

CONSTRUCTION AGREEMENT

CONSTRUCTION AGREEMENT

This Agreement is dated for identification this ____ day of _____, 2017, and is made by and between the TOWN OF LOS GATOS, a California municipal corporation, whose address is 110 East Main Street, Los Gatos, California 95030 (hereinafter "TOWN"), and (CONTRACTOR NAME), whose address is (CONTRACTOR ADDRESS) (hereinafter "CONTRACTOR").

NOW, THEREFORE, the parties agree:

ARTICE I: WORK TO BE DONE AND DOCUMENTS FORMING THE CONTRACT.

That for and in consideration of the payments and agreements hereinafter mentioned, to be made and performed by the said TOWN, and under the conditions expressed in the two bonds hereunto annexed, the said CONTRACTOR agrees with the said TOWN, at his own proper cost and expense, to do all the work and furnish all the materials and equipment necessary to construct and complete, in accordance with the plans and specifications hereinafter mentioned, in a good, workmanlike and substantial manner, under the supervision of the Town Engineer, or his, of the TOWN OF LOS GATOS, California, all the works and improvements described, mentioned and set forth in those plans and specifications on file in the Office of the Parks and Public Works of said TOWN, entitled:

"Plans and Specifications for
Project #13-31 Almond Grove Street Reconstruction Phase II"

which said plans and specifications and all the documents therein contained, including the TOWN OF LOS GATOS's Standard Provisions, are hereby specially referred to and by such reference made part of this contract.

ARTICLE II: CONTRACTOR'S ACCEPTANCE

CONTRACTOR agrees to receive and accept the prices shown on Exhibit "A," which is attached hereto and incorporated by reference herewith, as full compensation for furnishing all materials and equipment and for doing all the work described in the contract documents; also for all loss or damage as provided in the contract documents in the prosecution of the work until its acceptance by the Town Council of the TOWN OF LOS GATOS, and for well and faithfully completing the work, and the whole thereof, in the manner and according to the contract documents, plans and specifications, and the requirements of the Town Engineer.

ARTICLE III: ACCEPTANCE BY TOWN

The said TOWN hereby promises and agrees with the said CONTRACTOR to employ, and does hereby employ the said CONTRACTOR to provide the materials and to do the work according to the terms and conditions herein contained and referred to, for the prices aforesaid, and hereby contracts to pay the same at the time, in the manner and upon the conditions above

set forth; and the said parties for themselves their heirs, executors, administrators, successors and assigns, do hereby agree to the full performance of the covenants herein contained.

ARTICLE IV: COMPLETION OF AGREEMENT

Reference is made to Part I – Page 2 of the TOWN's Project Specifications Notice to Contractors which are hereby made a part of this contract. Inasmuch as the work called for under this contract concerns a needed public improvement, the time of performance and completion of this work is of the essence of this contract. It is expressly understood and agreed by the parties hereto that all the work called for under this contract, in all its parts and requirements, shall be completed one hundred and seven (107) working days from Notice to Proceed.

ARTICLE V: HOURS OF LABOR

The CONTRACTOR shall forfeit, as a penalty, to the TOWN, Twenty-Five Dollars (\$25) for each workman employed in the execution of the contract by him or by any subcontractor for each calendar day during which any workman is required or permitted to labor more than eight (8) hours in violation of the provisions of Sections 1810-1815 inclusive of the Labor Code and all amendments thereto.

ARTICLE VI: APPRENTICES

Attention is directed to the provisions in Sections 1777.5, 1777.6 and 1777.7 of the Labor Code governing the employment of apprentices by the CONTRACTOR or any subcontractor under him. CONTRACTOR and any of his subcontractors shall comply with the requirements of said sections of the Labor Code; CONTRACTOR shall have full responsibility for compliance with the said sections regardless of any other contractual or employment relationships alleged to exist.

Information relative to apprenticeship standards and other requirements may be obtained from the Director of Industrial Relations ex officio the Administrator of Apprenticeship, San Francisco, California or from the Division of Apprenticeship Standards at its branch offices.

ARTICLE VII: NONDISCRIMINATION

The CONTRACTOR sub recipient or subcontractor shall not discriminate on the basis of race, color, national origin or sex in the performance of this contract. CONTRACTOR shall carry out applicable requirements of 49 CFR Part 26 in the award and administration of DOT-assisted contracts.

Failure by CONTRACTOR to carry out these requirements is a material breach of this contract, which may result in the termination of this contract or such other remedy as recipient deems appropriate.

ARTICLE VIII: INDEPENDENT CONTRACTOR

It is agreed that CONTRACTOR is an independent contractor, and all persons working for or under the direction of CONTRACTOR are CONTRACTOR's agents, servants and employees, and said persons shall not be deemed agents, servants or employees of TOWN.

ARTICLE IX: OWNERSHIP OF DATA AND DOCUMENTS

CONTRACTOR agrees that all records, specifications, data, maps, designs, graphics, writings, recordings and other tangible materials regardless of form or format, including, without limitation, electronically transmitted documents and ACAD files, and other collateral materials collected, compiled, drafted, prepared, produced and/or generated in the performance of this Agreement shall be the property of TOWN. CONTRACTOR shall regularly provide such documents to TOWN upon TOWN's request. In the event that this Agreement is terminated prior to completion of the scope of work, CONTRACTOR shall provide all such data and documents to TOWN forthwith.

ARTICLE X: INSURANCE

a. Commercial General Liability/Automobile Liability Insurance:

CONTRACTOR shall obtain and maintain Commercial General Liability insurance and Automobile Liability insurance in the amount of One Million Dollars (\$1,000,000) per occurrence. If a general aggregate limit is used, either the general aggregate limit shall apply separately to this contract or the general aggregate limit shall be twice the required occurrence limit. CONTRACTOR's insurance coverage shall be written on an occurrence basis.

b. Workers' Compensation Insurance:

CONTRACTOR shall obtain and maintain statutory Workers' Compensation insurance and Employer's Liability insurance in the amount of One Million Dollars (\$1,000,000) per accident.

CONTRACTOR is familiar with the Workers' Compensation laws of California (generally contained in Section 3700 of the Labor Code), including those provisions which provide for specific exemptions from the requirement that all employers must carry Workers' Compensation insurance, and CONTRACTOR maintains they are exempted under the law from the requirement to maintain Workers' Compensation insurance coverage.

In addition, during the term of any work for TOWN under said agreement: (1) CONTRACTOR will not employ any person in any manner so as to become subject to the Workers' Compensation laws of California, or (2) should CONTRACTOR become subject to the Workers' Compensation provisions of Section 3700 of the Labor Code for any reason, CONTRACTOR shall forthwith comply with those provisions and send evidence of financial compliance to TOWN.

c. Acceptability of Insurers: Insurance is to be placed with insurers with a current *Best Rating* of A:VII unless otherwise acceptable to TOWN.

d. Verification of Coverage: Insurance, deductibles or self-insurance retentions shall be subject to TOWN's approval. Original Certificates of Insurance with endorsements shall be received and approved by TOWN before work commences, and insurance must be in effect for the duration of the contract. The absence of insurance or a reduction of stated limits shall cause all work on the project to cease. Any delays shall not increase costs to TOWN or increase the duration of the project.

e. Other Insurance Provisions:

(1) The TOWN OF LOS GATOS, its officers, officials, employees and volunteers are to be covered as additional insured by Endorsement CG 20 10 11 85 or other endorsement approved by Town Attorney for Commercial General and Automobile Liability coverage.

(2) For any claims related to this project, CONTRACTOR's insurance coverage shall be primary and any insurance or self-insurance maintained by TOWN, its officers, officials, employees and volunteers shall not contribute to it.

(3) Each insurance policy required shall be endorsed that a thirty (30) day notice be given to TOWN in the event of cancellation or modification to the stipulated insurance coverage.

(4) In the event CONTRACTOR employs subcontractors as part of the work covered by this Agreement, it shall be the responsibility of CONTRACTOR to ensure that all subcontractors comply with the same insurance requirements that are stated in this Agreement.

(5) Approval of the insurance by TOWN or acceptance of the Certificate of Insurance by TOWN shall not relieve or decrease the extent to which CONTRACTOR may be held responsible for payment of damages resulting from CONTRACTOR's services or operation pursuant to this Agreement, nor shall it be deemed a waiver of TOWN's rights to insurance coverage hereunder.

(6) If, for any reason, CONTRACTOR fails to maintain insurance coverage that is required pursuant to this contract, the same shall be deemed a material breach of contract. TOWN, at its sole option, may terminate this contract and obtain damages from CONTRACTOR resulting from said breach. Alternately, TOWN may purchase such required insurance coverage,

and without further notice to CONTRACTOR, TOWN may deduct from sums due to CONTRACTOR any premium costs advanced by TOWN for such insurance.

ARTICLE XI: HOLD HARMLESS

CONTRACTOR hereby agrees to and shall hold TOWN, its elective and appointive boards, commissions, officers, agents, registered volunteers, and employees harmless from any liability for damage or claims for damage for personal injury, including death, as well as from claims for property damage and any other claims of any sort whatsoever, including, but not limited to, any liabilities, claims, losses, or expenses in any manner caused by, arising out of, or in connection with, either directly or indirectly, the construction or installation of the work, the guarding of the work, the use of improper materials in construction of the work, or the negligent, willful, or intentional acts or omissions by CONTRACTOR or CONTRACTOR's subcontractors, agents, or employee operations under this Agreement, whether such operations by CONTRACTOR or by any of CONTRACTOR's subcontractors, or by any one or more persons directly or indirectly employed by, or acting as agent for CONTRACTOR or any of CONTRACTOR's subcontractors during the progress of the work or at any time before its completion and final acceptance, excepting suits and actions brought by the CONTRACTOR for default of this Agreement or arising from the sole active negligence or willful misconduct of the TOWN. The Town Council may retain so much of the money due to the CONTRACTOR as shall be reasonably necessary to protect the TOWN, until disposition has been made of such suits or claims for damages as aforesaid.

CONTRACTOR agrees to and shall pay TOWN's cost of defense (or, at the sole option of the TOWN, CONTRACTOR shall defend with counsel approved by the TOWN Attorney) and indemnify TOWN and its elective and appointive boards, commissions, officers, agents, and employees from any suits or actions at law or in equity arising out of the execution, adoption or implementation of this Agreement (exclusive of any such actions brought by CONTRACTOR), such indemnification to include all costs of defense, judgments, and any awards of attorneys' fees.

Should any accident or incident causing death, personal injury or property damage occur between the date CONTRACTOR is notified that its General Liability and/or Workers Compensation Insurance is canceled and the effective date of such cancellation, CONTRACTOR's obligation to indemnify, defend and save harmless the TOWN, as provided for hereinabove, shall in no manner be affected by the fact that the TOWN had not received the notice of cancellation prior to the date of such accident or incident.

ARTICLE XII: BONDING REQUIREMENT

CONTRACTOR agrees to post a Faithful Performance Bond and a payment bond for Labor and Materials, or other guarantees, in the required amounts upon bond forms provided by the TOWN, guarantying the performance of the terms of this Agreement. Surety issuing bonds for CONTRACTOR shall be approved by the U.S. Department of Treasury's Financial Management Service and shall be listed on the most current Treasury Circular 570 as contained in the Federal Register.

Contractor agrees to allow ten percent of the faithful performance bond to remain in effect for a period of two years following Town Council project acceptance as guarantee for any needed repair or replacement caused by defective materials and workmanship.

ARTICLE XIII: MAINTENANCE AND GUARANTY

CONTRACTOR shall promptly repair, replace, restore, or rebuild, as the TOWN may determine, any finished product in which defects of materials or workmanship may appear or to which damage may occur because of such defects, during a two (2) year period subsequent to the date of final acceptance.

This article does not in any way limit the guaranty on any items for which a longer guaranty is specified or on any items which a manufacturer gives a guaranty for a longer period, nor does it limit the other remedies of the TOWN in respect to a latent defect, fraud or implied warranties. CONTRACTOR shall furnish the TOWN all appropriate guaranties or warranty certificates upon completion of the project.

ARTICLE XIV: SHORING FOR TRENCHES

If the contract specifies an expenditure of Twenty-Five Thousand Dollars (\$25,000) or greater for trenching, and if the depth of the trench is five feet (5') or more, then Section 6705 of the Labor Code shall also be applicable.

ARTICLE XV: APPLICABLE LAWS AND ATTORNEY'S FEES

This Agreement shall be construed and enforced pursuant to the laws of the State of California. Should any legal action be brought by a party for breach of this Agreement or to enforce any provision herein, the prevailing party of such action shall be entitled to reasonable attorneys' fees, court costs, and such other costs as may be fixed by the court. Reasonable attorneys' fees of the TOWN Attorney's Office, if private counsel is not used, shall be based on comparable fees of private attorneys practicing in Santa Clara County.

ARTICLE XVI: LIQUIDATED DAMAGES

It is mutually agreed by CONTRACTOR and TOWN that in the event that completion of the construction by CONTRACTOR under this Agreement is delayed beyond DATE, TOWN will suffer damages and will incur other costs and expenses of a nature and amount which is difficult or impractical to determine. The Parties agree that by way of ascertaining and fixing the amount of damages, costs and expenses, and not by way of penalty, CONTRACTOR shall pay to TOWN the sum of Three Thousand Five Hundred Dollars (\$3,500.00) per day in liquidated damages for each and every calendar day such delay in completion of the services under this Agreement continues beyond DATE. In the event that the liquidated damages are not paid, CONTRACTOR agrees that TOWN may deduct the amount of unpaid damages from any money due or that may become due to CONTRACTOR under this Agreement.

ARTICLE XVII: INTERPRETATION OF CONTRACT

It is further expressly agreed by and between the parties hereto that should there be any conflict between the terms of this instrument and the bid or proposal of said CONTRACTOR, then this instrument shall control and nothing herein shall be considered as an acceptance of the said terms of said proposal conflicting herewith.

ARTICLE XVIII: AMENDMENTS AND CHANGE ORDERS

This Agreement may be amended from time to time as necessary by formal and written amendment or authorized change order executed by the Town Manager or designee and principal acting on behalf of the CONTRACTOR.

ARTICLE XIX: DBE RESPONSIBILITIES

For projects that are State or Federal funding; With respect to Disadvantaged Business Enterprises, CONTRACTOR shall do the following:

(1) Pay each subcontractor under this prime contract for satisfactory performance of its contract no later than ten (10) days from the receipt of each payment the prime contractor receives from TOWN. Any delay or postponement of payment from the above-referenced time frame may occur only for good cause following written approval of TOWN. This clause applies to both DBE and non-DBE subcontractors.

(2) Release all retainage owed to a subcontractor for satisfactory completion of the accepted work within thirty (30) days after TOWN's payment to CONTRACTOR. Any delay or postponement of payment from the above-referenced time frame may occur only for good cause following written approval of TOWN. This clause applies to both DBE and non-DBE subcontractors.

ARTICLE XX: PREVAILING WAGES

Reference is hereby made to copies of the general rate of per diem wages as determined by the Director of the Department of Industrial Relations on file in the Department of Parks and Public Works, TOWN OF LOS GATOS, Town Hall, which are available to any interested party.

For failure to pay the prevailing wages, the CONTRACTOR shall forfeit, as a penalty, to the TOWN, Fifty Dollars (\$50) for each workman for each calendar day or portion thereof who is paid less than the stipulated prevailing wage for work done under this contract, in violation of the provisions of the Labor Code, Sections 1770 to 1780, inclusive. In addition to said penalty, the CONTRACTOR, or subcontractor, shall pay to each worker the difference between the prevailing wage and the amount paid to said worker for each calendar day for which said worker was paid less than the prevailing wage.

CONTRACTOR shall comply with the provisions of the Davis-Bacon Act, as amended (40 USC 276a-376a-5), and related requirements as certified in CONTRACTOR's bid proposal.

ARTICLE XXI: ENTIRE AGREEMENT

This Agreement contains the entire understanding between the parties with respect to the subject matter herein. There are no representations, agreements or understandings (whether oral or written) between or among the parties relating to the subject matter of this Agreement which are not fully expressed herein.

ARTICLE XXII: PUBLIC RECORDS

The parties recognize and acknowledge that TOWN is subject to the California Public Records Act, California Government Code Section 6250 and following. Public records are subject to disclosure.

ARTICLE XXIII: NOTICES

Any notice required to be given to CONTRACTOR shall be deemed to be duly and properly given if mailed to CONTRACTOR, postage prepaid, addressed to:

CONTRACTOR NAME
ADDRESS
CITY, STATE ZIP

or personally delivered to CONTRACTOR at such address or at such other addresses as CONTRACTOR may designate in writing to TOWN.

Any notice required to be given TOWN shall be deemed to be duly and properly given if mailed to TOWN, postage prepaid, addressed to:

Lisa Petersen, P.E.
Town Engineer
TOWN OF LOS GATOS
41 Miles Avenue
Los Gatos, California 95030

or personally delivered to TOWN at such address or at such other addresses as TOWN may designate in writing to CONTRACTOR.

ARTICLE XXIV: SECTION 7106 FORM

Attached to the Agreement is a fully executed and sworn non-collusion affidavit as required by Section 7106 of the California Public Contracts Code. Said affidavit is incorporated herein by this reference.

IN WITNESS WHEREOF, the parties to these presents have hereunto set their hands the year and date first written above.

APPROVED AS TO CONTENT:

"TOWN":
TOWN OF LOS GATOS

Matt Morley
Director of Parks and Public Works

By: _____
Laurel Prevetti
Town Manager

APPROVED AS TO FORM:

Robert Schultz
Town Attorney

Attest: _____
Shelley Neis
Clerk Administrator

CONTRACTOR:

By: _____

Name: _____

Title: _____

Address: _____

By: _____

Title: _____

Tax ID No. or SSAN:

Corporate Seal

CONTRACTOR'S BOND FOR LABOR AND MATERIAL

KNOW ALL MEN BY THESE PRESENTS:

That _____, as Principal, and _____, incorporated under the laws of the State of _____, and authorized to execute bonds and undertakings as Surety, are held and firmly bound unto any and all materialmen, persons, companies or corporations furnishing materials, provisions, provender or other supplies used in, upon, for or about the performance of the work contracted to be executed or performed under the contract hereinafter mentioned, and all persons, companies or corporations renting implements or machinery, or hiring crews, for or contributing to said work to be done, and all persons who perform work or labor upon the same, and all persons who supply both work and materials, and whose claim has not been paid by the contractor, company, or corporations in the just and full sum of _____ Dollars (\$_____), for the payment whereof, well and truly to be made, said Principal and Surety bind themselves, their administrators, successors and assigns, jointly and severally firmly by these presents.

The condition of the foregoing obligation is such that; WHEREAS, the above-bounden Principal has entered into a certain contract attached hereto and incorporated herein by reference as though fully set forth, with the TOWN OF LOS GATOS, to do and perform the following work; to wit:

Project #13-31 Almond Grove Street Reconstruction Phase II

as required by the plans and specifications, pursuant to the award made to said contractor by the Council of the TOWN OF LOS GATOS, on _____, 2017, as will more fully appear by reference to the minutes of said Council of said TOWN of said date.

NOW, THEREFORE, if the above-bounden Principal, contractor, person, company, or corporation, or his agent, or the subcontractors, fails to pay for any materials, provisions, provender, or other supplies, or crews used in, upon, for, or about the performance of the work contracted to be done, or for any work or labor done thereon of any kind, or for amounts due under the Unemployment Insurance Act with respect to such work or labor, or for any amount required to be deducted, withheld, and paid over to Franchise Tax Board, from the wages of employees of the contractor or subcontractor, pursuant to Section 18806 of the Revenue and Tax Code, then the Surety of this bond will also pay the same in an amount not exceeding the sum specified in the bond; and also, in case suit is brought upon this bond, a reasonable attorney's fee, which shall be awarded by the court to the prevailing party in said suit, said attorney's fee to be taxed as costs in said suit and to be included in the judgment therein rendered.

The surety hereby stipulates and agrees that no change, extension of time, alteration or addition to the terms of the agreement or to the work to be performed thereunder or to the specifications accompanying the same shall in any way affect its obligation on this bond and it

does hereby waive notice of any such change, extension of time, alteration or addition to the terms of the agreement or to the work or to the specifications.

This bond is executed and filed to comply with the provisions of Sections 3247, *et seq.*, of the Civil Code.

Signed and sealed this _____ day of _____, 2017.

BY: _____

CONTRACTOR

(CORPORATE SEAL)

BY: _____

SURETY (Address and Phone No.)

(SURETY SEAL)

The amount of the within obligation is hereby fixed by the TOWN Council in the sum of (CONTRACT AMOUNT) Dollars (\$XXXXXX), that sum being more than fifty percent (50%) of the contract price, is by said TOWN Council deemed adequate, and is the sum fixed by it for that purpose and the TOWN Manager is hereby authorized to approve said bond.

APPROVED AS TO FORM:

Robert Schultz, Town Attorney

Laurel Prevetti, Town Manager

ATTEST: _____
Shelley Neis, Clerk Administrator

CONTRACTOR'S BOND FOR FAITHFUL PERFORMANCE

KNOW ALL MEN BY THESE PRESENTS:

That _____, as Principal, and _____, incorporated under the laws of the State of _____, and authorized to execute bonds and undertakings as Surety, are held firmly bound unto the TOWN OF LOS GATOS, a municipal corporation of the State of California, in the sum of _____ Dollars (\$_____), for payment whereof, well and truly to be made, said Principal and Surety bind themselves, their administrators, successors and assigns, jointly and severally, firmly by these presents.

The condition of the foregoing obligation is such that: WHEREAS, the above-bounden Principal has entered into a certain contract attached hereto and incorporated herein by reference as though fully set forth, with the TOWN OF LOS GATOS, to do and perform the following work; to wit:

Project #13-31 Almond Grove Street Reconstruction Phase II

as required by the plans and specifications, pursuant to the award made to said contractor by the Council of the TOWN OF LOS GATOS, on _____, 2017, as will more fully appear by reference to the minutes of said Council of said date.

The surety hereby stipulates and agrees that no change, extension of time, alteration or addition to the terms of the agreement or to the work to be performed thereunder or to the specifications accompanying the same shall in any way affect its obligation on this bond and it does hereby waive notice of any such change, extension of time, alteration or addition to the terms of the agreement or to the work or to the specifications.

NOW, THEREFORE, if the above-bounden Principal shall well and truly perform the work contracted to be performed under said contract, then this obligation shall be void; otherwise, to remain in full force and effect.

Signed and sealed this _____ day of _____, 2017.

BY: _____

CONTRACTOR

(CORPORATE SEAL)

BY: _____

SURETY (Address and Phone No.)

(SURETY SEAL)

The amount of the within obligation is hereby fixed by the TOWN Council in the sum of (CONTRACT AMOUNT) Dollars (\$XXXXX), that sum being more than one hundred percent (100%) of the contract price, is by said TOWN Council deemed sufficient and adequate, and is the sum fixed by it for that purpose.

APPROVED AS TO FORM:

Robert Schultz, Town Attorney

Laurel Prevetti, Town Manager

ATTEST: _____
Shelley Neis, Clerk Administrator



TOWN OF LOS GATOS

STANDARD SPECIFICATIONS Part II

For Further Information, Contact:

Department of Parks and Public Works
Engineering Division
41 Miles Avenue
Los Gatos, CA 95030
(408) 399-5770

Section 1

DEFINITIONS AND TERMS

1-1.01 DEFINITIONS

Wherever in these Specifications and other Contract Documents the following terms or pronouns in place of them are used, the intent and meaning shall be interpreted as follows:

A. *Contract Documents.* The Notice to Contractors, Information for Bidders, Bid Form, Designation of Subcontractors, Agreement, Bidder's Bond, Performance Bond, Labor and Materialperson's Bond, Progress Schedule, General Conditions, Equal Employment Opportunity Conditions if applicable, Technical Provisions, Plans, Specifications, and such provisions of the Standard Specifications of the State of California, Department of Transportation, dated July, 2006, except as specifically noted in the Technical Specifications, are hereby incorporated by reference.

B. *Contractors.* The person, firm, partnership, or corporation to whom this Contract is awarded by Owner and who is subject to the terms thereof.

C. *Director of Parks and Public Works.* The Director of Parks and Public Works of the Town of Los Gatos and the representative of the Director of Parks and Public Works, duly authorized and appointed by the Director of Parks and Public Works.

D. *Engineer.* The Town Engineer of the Town of Los Gatos, or the representative of the Town Engineer duly authorized and appointed by the Town Engineer. In the event Owner has hired any person or corporation as an independent Contractor to act in lieu of the Town Engineer, the term "Engineer" shall be deemed to include such person or corporation.

E. *Governing Body of the Owner.* The Town Council of the Town of Los Gatos.

F. *Inspector.* The Inspector employed by Owner to perform inspection during construction of the work, under the direction of the Director of Parks and Public Works.

G. *Owner.* The Town of Los Gatos, a municipal corporation in the State of California.

H. *Plans.* The Official Plans, working drawings or exact reproductions thereof, approved by the Governing Body of the Owner which show the location, character, dimensions and details of the work on the Project and the work to be done. The Plans are to be considered as a part of the Contract Documents, complementary to the Specifications.

I. *Project.* The entire public improvement proposed by Owner to be constructed in whole or in part, pursuant to this Contract.

J. *Revocable.* Items noted as "Revocable" in the Proposal may be deleted entirely or in part at the sole discretion of the Town. The provision of Section 4-1.03B, "Increased or Decreased Quantities," shall not apply to entire or partial deletion of Revocable items.

J. *Specifications.* The directions, provisions, and requirements contained herein, or contained in any Specifications referred to herein, pertaining to the method and manner of performing the work on the Project, or to the quantities, or the quality of materials to be furnished under the Contract.

K. *Subcontractor*. A person, firm, partnership, or corporation having a direct contract with Contractor and not with Owner, for the performing of work or labor or the rendering of service to Contractor for the work.

L. *Surety*. Any persons, firm, partnership, or corporation that executes as Surety on Contractor's Performance Bond or Contractor's Labor and Materialperson's Bond or Bidder's Bond.

M. *Work*. Work to be performed on the Project under this Contract, including work normally done at the site of the Project plus labor and materials.

1-1.02 SPECIFICATIONS

Wherever in these Specifications the term "Standard Specifications" is used, it shall mean the State of California, Department of Transportation, Standard Specifications dated July, 2006, except as specifically noted in the Technical Specifications, are hereby incorporated by reference.

. In case of conflict between the State of California Standard Specifications and these Specifications, these Specifications shall take precedence over and be used in lieu of such conflicting portions.

Any item not covered in these Specifications shall be performed in accordance with the appropriate section of the Standard Specifications. Whenever in the Standard Specifications the following terms are used, they shall be understood to mean and refer to the following:

A. *Department of Public Works or Department of Transportation*. The Town of Los Gatos, Department of Parks and Public Works.

B. *Director of Parks and Public Works*. The Town of Los Gatos, Director of Parks and Public Works.

C. *Engineer*. The Engineer is defined as the Director of Parks and Public Works, acting either directly or through properly authorized agents, such agents acting within the scope of the particular duties entrusted to them.

D. *Laboratory*. The designated laboratory authorized by the Town of Los Gatos to test materials and work involved in the Contract.

E. *State*. The Town of Los Gatos.

1-1.03 GENERAL

All work shall be done in conformance with the applicable provisions of the Standard Specifications except as modified herein. Payment for work, equipment and materials not specifically covered herein shall be included in the payment for related items of work. No additional payment will be made for work, equipment or materials not covered in these plans and specifications, but necessary to insure a completed project as specified. Any plan or method of work suggested by the Owner or the Engineer to Contractor but not specified or required, if adopted or followed by Contractor in whole or in part, shall be used at the risk and responsibility of Contractor; and the Owner and the Engineer shall assume no responsibility therefor and in no way be held liable for any defects in the work which may result from or be caused by use of such plans or method of work.

1-1.04 STATEMENT OF WORK

Furnish all labor, equipment and materials and perform all work called for in the Contract Documents and as necessary to furnish to the Town a complete project ready for use.

1-1.05 DRAWINGS

Five sets of the Contract Drawings and Specifications will be furnished without charge to the Contractor to whom the contract for the work is awarded. Additional sets will be furnished to Contractor on request, at the cost of reproduction. The work shall conform to the drawings which shall form a part of these Specifications, and are available at the Office of the Director of Parks and Public Works, Engineering Division, 41 Miles Avenue, Los Gatos, California.

1-1.06 BUSINESS LICENSE

All Contractors, whether they be general Contractors or subcontractors, who transact or carry on business in the Town of Los Gatos, shall acquire a Business License in conformance with Chapter 14 of the Los Gatos Town Code.

1-1.07 MINORITY AND WOMEN BUSINESS ENTERPRISES

It is the policy of the Town of Los Gatos to encourage the participation of Minority and Women Business Enterprises in the bidding process for all Town contracts. Any reference using the word "his" is to be construed as meaning "his, hers or its".

1-1.08 PROOF OF COMPETENCY OF BIDDER

Any bidder may be required to furnish evidence satisfactory to Owner that he/she and his/her proposed subcontractors have sufficient means and experience in the type of work called for to insure completion of the contract in a satisfactory manner.

1-1.09 SPECIAL NOTICE

Bidders are required to inform themselves fully of the conditions relating to construction and labor under which the work will be or is now performed, and, so far as possible, the successful bidder must employ such methods and means in carrying out his/her work as will not cause any interruption or interference with any other Contractor.

Section 2

PROPOSAL REQUIREMENTS AND CONDITIONS

2-1.01 EXAMINATION OF PLANS, SPECIFICATIONS AND SITE WORK

Before submitting a bid, each bidder shall carefully read the Specifications and all other Contract Documents. The bidder shall visit the site of the Project and shall fully inform himself/herself as to all existing conditions and limitations under which the work is to be performed, and he/she shall include in his/her bid a sum to cover the cost of all items necessary to perform the work as set forth in the Contract Documents. No allowance of any kind whatsoever will be made to any bidder because of lack of such examination or knowledge. The submission of a bid shall be conclusive evidence that the bidder has made such an examination.

2-1.02 CONTENTS OF BID

In order to receive consideration, all bids shall be made in accordance with the following instructions:

A. Bids shall be made upon the form provided therefor, properly executed and with all items filled out; the signature of all persons signing shall be in longhand.

B. Blank spaces in the bid must be properly filled in, and the phraseology thereof must not be changed. Additions must not be made to the items mentioned therein. Any unauthorized conditions, limitations or provisions attached to a proposal may cause its rejection. Alterations by erasures or interlineation must be explained or noted in the bid over the signature of the bidder.

C. Late bids will be returned to the bidder unopened.

D. Each bid shall be addressed to the Town Clerk of the Town of Los Gatos, and shall be delivered to the office of the Clerk of the Town of Los Gatos on or before the day and hour set for the opening of bids. The bid shall be enclosed in a sealed envelope bearing the title of the work, the name of the bidder, and the date and hour of the opening. It is the sole responsibility of the bidder to see that the bid is received in proper time.

2-1.03 WITHDRAWAL OF BID

Any bidder may withdraw his/her bid, either personally or by a written request, at any time prior to the scheduled time for opening of bids.

2-1.03.A WITHDRAWAL OF BIDS AFTER OPENING

No bidder may withdraw his/her bid for a period of 60 calendar days after the date set for the opening thereof, and the same shall be subject to acceptance by the Owner during this period.

2-1.03.B BIDDERS INTERESTED IN MORE THAN ONE BID

No person, firm or corporation shall be allowed to make or file or be interested in more than 1 bid for the same work, unless alternate bids are called for. A person, firm or corporation submitting a sub-proposal to a bidder, or who has quoted prices on materials to a bidder, is not thereby disqualified from submitting a sub-proposal or quoting prices to other bidders.

2-1.04 SUBMISSION OF BIDS; AGREEMENT TO ASSIGN

In accordance with Government Code §4552, the bidder shall conform to the following requirements. In submitting a bid to a public purchasing body, the bidder offers and agrees that if the bid is accepted, he/she/it will assign to the purchasing body all rights, title, and interest in and to all causes of action it may have under §4 of the Clayton Act (15 U.S.C. Sec. 15) or under the Cartwright Act [Chapter 2 (commencing with §16700) of Part 2 of Division 7 of the Business and Professions Code], arising from purchase of goods, materials, or services by the bidder for sale to the purchasing body pursuant to the bid. Such assignment shall be made and become effective at the time the purchasing body tenders final payment to the bidder.

2-1.05 LIST OF SUBCONTRACTORS

Bidders must submit a list of their proposed subcontractors in compliance with §§4100-4113 of the Public Contract Code of the State of California. Forms for this designation are furnished in the Bid Documents, Part I.

2-1.06 INSURANCE

At or prior to the delivery of the signed Agreement, Contractor shall deliver to Owner the policies of insurance or insurance certificates as are required by the Plans and Specifications. All policies or certificates of insurance shall be approved by the Director of Parks and Public Works of the Town of Los Gatos before the successful bidder may proceed with the work. Failure or refusal to furnish insurance policies or certificates in the form satisfactory to the Director of Parks and Public Works of the Town of Los Gatos shall subject the bidder to penalties for delay in commencement of the Work.

2-1.07 BIDDER'S BOND

Each bid shall be accompanied by cash, a certified or cashier's check, or a bidder's bond in the sum of not less than 10% of the total aggregate of the bid, and said checks or bond shall be made payable to the order of the Town of Los Gatos (herein after referred to as "Owner") as defined in Part I, Section 1-1.01 of these Specifications. Cash and certified or cashier's checks shall not be accepted unless accompanied by a waiver of all interest on the amount paid to the Town. In case the successful bidder fails to file satisfactory bonds or provide the insurance required by the Contract Documents, or refuses to enter into a contract within the specified time, he/she shall be liable for any difference by which the cost of procuring the work exceeds the amount of his/her bid and the bond or the amount of cash or check shall be available to offset such difference. If the bid is not accepted by Owner within 60 calendar days after the date set for the opening of bids, or if the bidder to whom the contract is awarded executes and delivers to Owner the required Contract Documents and insurance, the cash or the amount of the certified or cashier's check with out interest shall be returned to the bidder.

2-1.08 GUARANTEE OF MATERIALS AND EQUIPMENT

All materials and equipment furnished and the work performed under these Specifications and/or drawings, shall be guaranteed in writing for a period of 2 years from the date of final acceptance against defective material, design and workmanship. In addition, the Contractor shall guarantee in writing that the system as a whole shall be free of defects for a period of 2 years from the date of final acceptance, the system shall operate perfectly, and all apparatus shall perform in accordance with their individual Specifications.

Contractor shall allow 10% of the faithful performance bond to remain in effect for a period of two years

following Town Council project acceptance as guarantee for any needed repair or replacement caused by defective materials and workmanship.

Section 3

AWARD AND EXECUTION OF CONTRACT

3-1.01 AWARD OR REJECTION OF BIDS

The Contract, if awarded, will be awarded to the lowest responsible bidder subject to Owner's right to reject any or all bids and to waive any informality in the bids or the bidding.

3-1.02 REJECTION OF PROPOSALS

The Town, at its sole discretion, may reject all bids. Additionally, individual proposals may be rejected if (among other things) they any alteration of form, additions not called for, conditional bids, incomplete bids, erasures, or irregularities of any kind, or a disproportionate amount of payment being made on any item of work during any phase of the project, or fail to provide a price on all bid items, including all alternates or proposals submitted which are in strict compliance with the directions in the Notice to Contractors. The Town may, in its sole discretion, waive any informalities or minor irregularities in the bid or proposal.

Proposals not submitted in strict compliance with the directions in the Notice to Contractors may, in Town's sole discretion, be deemed non-responsive and rejected on that basis.

When proposals are signed by an agent, other than the officer or officers of a corporation authorized to sign contracts on its behalf or a member of a co-partnership, a "Power of Attorney" must be on file with the Town Clerk prior to opening bids or shall be submitted with the proposal; otherwise, the proposal may be rejected at the Town's sole discretion as irregular and unauthorized.

Proof of authority of the person or persons signing on behalf of the bidder shall be provided to the Town upon request after the bid opening.

3-1.03 SUBSTITUTION OF SUBCONTRACTORS

No contractor whose bid is accepted shall:

1. Substitute any person as subcontractor in place of the subcontractor listed in the original bid, except where the Town, or its duly authorized officer, may, except as otherwise provided, have consented to the substitution in any of the following situations:

- a. When the subcontractor listed in the bid after having had a reasonable opportunity to do so fails or refuses to execute a written contract, when that written contract, based upon general terms, conditions, plans and specifications for the project involved or the terms of that subcontractor's written bid, is present to the subcontractor by the Contractor.

- b. When the listed subcontractor becomes bankrupt or insolvent.

- c. When the listed subcontractor fails or refuses to perform its subcontract.

- d. When the listed subcontractors fails or refuses to meet the bond requirements of the Contractor.

- e. When the Contractor demonstrates to the Town that the name of the subcontractor was listed as the result of an inadvertent clerical error.

- f. When the listed subcontractor is not licensed at the time of bid pursuant to the Contractor License Law on non-federally funded projects or at the time of award on federally funded projects.

g. When the Town determined that the work performed by the listed subcontractor is substantially unsatisfactory and not in substantial accordance with the plans and specifications, or that the subcontractor is substantially delaying or disruption the progress of the work.

Prior to approve of the Contractor's request for a substitution of subcontractor, the Town shall give notice in writing to the listed subcontractor of the Contractor's request to substitute and of the reasons for the request. The notice shall be served by certified or registered mail to the last known address of the subcontractor. The listed subcontractor who has been notified shall have 5 working days within which to submit written objections to the substitution to the Town. Failure to file these written objections shall constitute the listed subcontractor's consent to the substitution.

If written objection are filed, the Town shall give notice in writing of at least 5 working days to the listed subcontractor of a hearing by the Town on the Contractor's request for substitution.

2. Permit any subcontractor to be voluntarily assigned or transferred or allow it to be performed by anyone other than the subcontractor listed in the original bid, without consent of the Town.

3. Other than in the performance of change orders causing changes or deviations from the original contract, sublet or subcontract any portion of the work in excess of ½ of one percent of the prime contractor's total bid as to which the Contractor's original bid did not designate a subcontractor.

3-1.04 PERFORMANCE BOND AND LABOR AND MATERIALS BOND

At or prior to the delivery of the signed Agreement, Contractor shall deliver to Owner the Performance Bond and Labor and Materialperson's Bond as are required by Part 1, Section 2 of these Specifications. All bonds shall be on forms provided by Owner, and each shall be in an amount equal to 100% of the contract price. All bonds shall be approved by the Director of Parks and Public Works of the Town of Los Gatos before the successful bidder may proceed with the Work. Failure or refusal to furnish bonds in the form satisfactory to the Director of Parks and Public Works of the Town of Los Gatos shall subject the bidder to penalties for delay in commencement of the Work or revocation of the Award of Contract.

Pursuant to California Public Contract Code §22300, the Contractor will be permitted, at its request and sole expense, to substitute securities for any monies withheld by the Town to ensure performance under the contract. Said securities will be deposited either with the Town or with the state or federally chartered bank as escrow agent. Securities eligible for this substitution are those listed in California Government Code §16430 or bank or savings and loan certificate of deposit, interest bearing demand deposit accounts, standby letters of credit, or any other mutually agreed to by Contractor and the Owner. The Contractor shall be the beneficial owner of any securities substituted for monies withheld and shall receive any interest thereon.

3-1.05 EXECUTION OF AGREEMENT

The form of agreement which the successful bidder, as Contractor, will be required to execute is included in the Contract Documents and must be carefully examined by each bidder. The bidder to whom the Contract is awarded by Owner shall, within 10 calendar days after *Notice of Award*, execute and deliver to Owner 1 original and 1 counterpart of the Agreement.

3-1.06 NOTIFICATION BY CONTRACTOR

A. The Contractor shall notify the Director of Parks and Public Works and the project inspector at least 24 hours prior to commencing work and shall comply with any Notifications or approvals mentioned in the Specifications, Part IV.

B. Immediately after the award of Contract by the Town of Los Gatos and where applicable and required by the Plans and Specifications, the Contractor shall notify the following agencies:

AT&T Broadband
1900 S. Tenth Street
San Jose, CA 95112
Telephone: (408) 918-3200

Pacific Gas and Electric Co.
10900 N. Blaney Avenue
Cupertino, CA 95014
Telephone: (408) 725-2011
FAX: (408) 725-2034

San Jose Water Company
1221 So. Bascom Ave.
San Jose, CA 95128
Telephone: (408) 279-7866
FAX: (408) 292-7868

Santa Clara Water District
5750 Almaden Expressway
San Jose, CA 95118
Telephone: (408) 395-8121 ext.
2132
FAX: (408) 395-3627

U.S.A. Cable Locator
(Notify two weeks prior)
Telephone: 1 (800) 227-2600

Verizon
15900 Los Gatos Boulevard
Los Gatos, CA 95030
Telephone: (408) 358-6757
FAX: (408) 356-8756

West Valley Sanitation District
100 E. Sunnyside Avenue
Campbell, CA 95005
Telephone: (408) 378-2407
FAX: (408) 364-1821

C. The Contractor shall notify residents and business owners adjacent to the Work, as noted in the Special Provisions of these Specifications.

Section 4

SCOPE OF WORK

4-1.01 LOCATION OF WORK

The Town reserves the right to add or delete from quantities of work during the project and to add or delete locations (see Part I, Section 9-1.01). Locations of work for this project are set out in *Plans & Specifications* and incorporated herein.

4-1.02 CHANGES TO THE WORK

The bidder's attention is directed to the provisions of Section 4 of the Standard Specifications and the following modifications, all of which are applicable to this Contract:

A. Owner, without invalidating the Contract, may order additions to or deductions from the Work, the Contract Sum being adjusted accordingly. Any claim for extension of time cause thereby shall be adjusted at the time of ordering such change. See Section 9-1.01A of these Specifications regarding measurement and payment for increased or decreased quantities.

B. Any alteration or alterations made in the *Plans & Specifications* which are a part of this Contract, or any provision of this Contract shall not operate to release any surety or sureties from liability on any bond or bonds attached hereto and made a part hereof, and consent to make such alterations is hereby given, and the sureties to said bonds hereby waive the provisions of Civil Code §2819.

C. In giving instructions, the Engineer shall have authority to issue written change orders not inconsistent with the purpose of the Work. All change orders require issuance of a purchase order. Except in an emergency endangering life and property, no extra work or change shall be made unless in pursuance of such written order, and no claim for an addition to the Contract Sum shall be valid unless the additional work was so ordered.

D. Any change order that is in excess of the original Contract amount, plus any contingency, must be approved in the same manner as the original Contract.

E. Any change order exceeding the amount of the approved budget is invalid unless and until a budget adjustment has been approved by the Town Council.

F. Unit prices in any change order shall be the same as those unit prices in the original Contract.

4-1.03 NOTIFICATION OF CHANGE IN CONDITION

Pursuant to Public Contracts Code §7104, when trenches or other excavations must be dug pursuant to this Contract that extend deeper than 4 feet below the surface, the Contractor shall promptly, and before the following conditions are disturbed, notify the Owner in writing of any:

A. Material that the Contractor believes may be material that is hazardous waste, as defined in Health & Safety Code §25117, that is required to be removed to a Class I, Class II, or Class III disposal site in accordance with provisions of existing law; or,

B. Subsurface or latent physical conditions at the site differing from those indicated; or,

C. Unknown physical conditions at the site of any unusual nature, different materially from those ordinarily encountered and generally recognized as inherent in the work of the character provided for in the Contract.

The Owner will promptly investigate the conditions identified by the Contractor, and if the Owner finds that the conditions do materially so differ, or do involve hazardous waste, and cause a decrease or increase in the Owner's cost of, or the time required for, performance of any part of the work will issue a change order under the procedures described in the Contract Documents.

In the event a dispute arises between the Owner and the Contractor whether the conditions materially differ, or involve hazardous waste, or cause a decrease or increase in the Contractor's cost of, or time required for, performance of any part of the work, the Contractor shall not be excused from any scheduled completion date provided for by the Contract Documents, but shall proceed with all work to be performed under the Contract Documents. The Contractor shall retain any and all rights provided either by the Contract Documents or by law which pertain to the resolution of disputes and protects between the contracting parties.

Section 5

CONTROL OF WORK

5-1.01 CONTROL OF WORK

The bidder's attention is directed to the provisions of Section 5 of the Standard Specifications, all of which are applicable to this Contract.

5-1.02 INTERPRETATION OF DRAWINGS AND DOCUMENTS PRIOR TO BIDDING

If any person contemplating submitting a bid for the construction of the Project is in doubt as to the true meaning of any part of the Plans, Specifications, or other Contract Documents, or finds discrepancies in, or omissions from the Plans or Specifications, he/she may submit to Owner a written request for an interpretation or correction thereof not later than 5 working days before the date bids will be opened. The person submitting the request will be responsible for its prompt delivery. Any interpretation or correction of the Contract Documents will be made only by addendum and will be mailed or delivered to each person receiving a set of such documents. Owner will not be responsible for any other explanation or interpretation of the Contract Documents.

Section 6

CONTROL OF MATERIALS

6-1.01 CONTROL OF MATERIALS

The bidder's attention is directed to the provisions of Section 6 of the Standard Specifications and the following modifications, all of which are applicable to this Contract. At the option of the Director of Parks and Public Works, the Contractor shall provide testing from Owner's list of certified labs at the Contractor's own expense.

Section 7

LEGAL RELATIONS AND RESPONSIBILITY

7-1.01 WAGES

Workers employed in the work must be paid at rates at least equal to the then current prevailing wage scale as determined by the State Director of the Department of Industrial Relations. A copy is usually on file in the Office of the Director of Parks and Public Works.

Pursuant to California Labor Code §1770, any Contractor who is awarded a public works project and intends to use a craft of classification not shown on the general prevailing wage determinations, may be required to pay the wage rate of that craft of classification most closely related to it as shown in the general determinations effective at the time of the calls for bids.

Statutory provisions for penalties for failure to pay prevailing wages and for failure to comply with state wage and hour laws will be enforced. Eight hours of labor constitutes a day's work. The Contractor must comply with the statutory requirements relating to certified copies of payroll records, including the maintenance of the records, their certification and their availability for inspection.

7-1.02 ADDITIONAL SURETIES

If at any time during the continuance of the Contract the Sureties, or any of them, shall, in the opinion of the Owner, become irresponsible, the Owner shall have the right to require additional and sufficient Sureties which the Contractor shall furnish to the satisfaction of the Owner within 10 working days after notice.

7-1.03 LEGAL RELATIONS AND RESPONSIBILITY

The bidder's attention is directed to the provisions of Section 7 of the Standard Specifications and the following modifications, all of which are applicable to this Contract, with the exception that the Town shall not pay for any of the requirements covered by this section, the cost of which, if any, shall be considered as included in the bid items.

A. *Notices.* Any notice from one party to the other under this Contract shall be in writing and shall be dated and signed by the party giving such notice, or by a duly authorized representative of such party. Any such notice shall not be effective for any purpose whatever unless served in the following manner:

1. If the notice is given to Owner, it must be by personal delivery thereof to the Director of Parks and Public Works or by depositing the same in the United States mails, enclosed in a sealed envelope, addressed to Owner for the attention of said Director of Parks and Public Works, 110 E. Main Street, Los Gatos, California 95031, postage prepaid and registered;

2. If the notice is given to the Contractor, it must be by personal delivery thereof to the Contractor, or to the Contractor's foreman at the site of the work, or by depositing the same in the United States mails, enclosed in a sealed envelope addressed to the Contractor at the Contractor's regular place of business or at such other address as may have been established for the conduct of the work, postage prepaid and registered; or

3. If the notice is given to the Surety or any other person, by personal delivery to such

Surety or by depositing the same in the United States mails, enclosed in a sealed envelope, addressed to such Surety or person at the address of such Surety or person last communicated by him to the party giving the notice, postage prepaid and registered; and

4. The effective date of such notice(s) shall be the date personal delivery is made or the date shown on the return receipt of the registered mailed notice.

B. *Entire Contract.* No verbal agreement or conversation with any officer, agent or employee of Owner, either before, during or after the execution of this Contract, shall affect or modify any of the terms or obligations contained in the Contract Documents, nor shall such verbal agreement or conversation entitle the Contractor to any additional payment whatsoever under the terms of this Contract.

C. *Failure to Complete the Work on Time (Liquidated Damages).* If the Work is not completed by Contractor in the time specified herein above, or within any period of extension as above authorized, it is understood that the Owner will suffer damage; and it being impracticable and infeasible to determine the amount of actual damage, it is agreed that the Contractor shall pay to the Owner, as fixed and liquidated damages, and not as a penalty, the sum as stated in the Contract, and the Contractor and the Contractor's Surety shall be liable for the amount thereof; provided, however, that the Contractor shall not be charged liquidated damages because of any delays in the completion of the work due to unforeseeable causes beyond the control and without the fault or negligence of Contractor (including, but not restricted to, Acts of God or of the public enemy, acts of the Government, acts of the Owner, fires, floods, epidemics, quarantine restrictions, strikes and freight embargoes).

The Contractor shall, within 10 calendar days from the beginning of any such delay, notify the Owner in writing of the cause of the delay and the amount of time extension requested, if any; whereupon the Owner shall ascertain the facts and the extent of the delay and extend the time for completing the Work when, in its judgment and for the amount of time if any, the findings of fact justify such an extension. The Director of Parks and Public Works' determination shall be final and binding on the parties hereto.

7-1.04 EMPLOYMENT OF APPRENTICES

A. Attention is directed to the provisions of Labor Code §§1777.5 and 1777.6 concerning the employment of apprentices by the Contractor or any subcontractor under Contractor. Section 1777.5 only does not apply to contracts of general Contractors or specialty Contractors not bidding for work through a general or prime contractor involving less than \$30,000 or 20 working days.

B. Section 1777.5, requires the Contractor or subcontractor employing tradepersons in any apprenticeable occupation to apply to the joint apprenticeship committee nearest the site of the public works project, and which administers the apprenticeship program in that trade for a certificate of approval. The certificate will also fix the ratio of apprentices to journeypersons that will be used in the performance of the contract. Section 1777.5 also requires submission of specified award information to the committee.

The ratio of apprentices to journeypersons in such cases shall not be less than 1 to 5, except that the joint committee may grant a certificate, subject to the approval of the Administrations of Apprenticeship, exempting a Contractor from the 1 to 5 ratio when it finds that any one of the following conditions are met;

1. In the event unemployment for the previous 3 month period in such area exceeds an average of 15%, or

2. In the event the number of apprentices in training in such area exceeds a ratio of 1 to 5, or

3. If there is a showing that the apprenticeable craft or trade is replacing at least 1/13th of its journeyman annually through apprenticeship training, either on a statewide basis, or on a local basis, or

4. If assignment of an apprentice to any work performed under a public works contract would create a condition which would jeopardize apprentice's life or the life, safety, or property of fellow employees or the public at large or if the specific task to which the apprentice is to be assigned is of such a nature that training cannot be provided by a journeyman

C. The Division of Apprenticeship Standards may grant a certificate exempting the Contractor from the 1 to 5 ratio upon proper showing by the Contractor that it employs apprentices in a specific apprenticeable craft or trade in the state on all its contracts on an annual average if not less than 1 apprentice to each 5 journeymen.

D. The Contractor is required to make contributions to funds established for the administration of apprenticeship programs if the Contractor employs registered apprentices or journeymen in any apprenticeable trade on such contracts, and if other Contractors in the area of the public works site are making such contributions.

E. The Contractor and any subcontractor under Contractor shall comply with the requirements of §§1777.5 and 1777.6 in the employment of apprentices.

F. Information relative to apprenticeship standards, wage schedules, and other requirements may be obtained from the Director of Industrial Relations ex officio the Administrator of Apprenticeship, San Francisco, California, or from the Division of Apprenticeship Standards and its branch offices.

G. Responsibility for compliance with this section and this section's reference to the Standard Specifications lies with the Contractor.

7-1.05 STORM WATER POLLUTION PREVENTION

The Contractor shall be responsible for ensuring that all work conforms to "Best Management Practices for the Construction Industry" from the Santa Clara Valley Urban Runoff Pollution Prevention Program in the Specifications, Part IV, as well as the Town Code.

7-1.06 PUBLIC WORKS CONTRACTS; ASSIGNMENT TO AWARDING BODY

In accordance with California Public Contract Code §7103.5, the Contractor and subcontractors shall conform to the following requirements. The Contractor and its subcontractors offer and agree to assign to the Owner all rights, title, and interest in and to all causes of action it may have under §4 of the Clayton Act (15 U.S.C. Sec. 15) or under the Cartwright Act [Chapter 2 (commencing with §16700) of Part 2 of Division 7 of the Business and Professions Code], arising from purchases of goods services, or materials pursuant to the public works Contract or its subcontracts. This assignment shall be made and become effective at the time the Owner tenders final payment to the Contractor, without further acknowledgment by the parties.

7-1-07 UNFAIR BUSINESS PRACTICE CLAIMS

Pursuant to Public Contract Code § 7103.5, the Contractor agrees to assign all unfair business practices claims under the Clayton Act and the Cartwright Act to the Town of Los Gatos.

7-1.08 TRAFFIC CONTROL PLAN AND DEVICES

The Contractor shall supply, place, and maintain all necessary traffic control devices during construction in accordance with the applicable requirements of the Standard Specifications.

7-1.09 INSURANCE

Bidders' attention is directed to the insurance requirements below. It is highly recommended that bidders confer with their respective insurance carriers or brokers to determine in advance of bid submission the availability of insurance certificates and endorsements as prescribed and provided herein. If an apparent low bidder fails to comply strictly with the insurance requirements, that bidder may be disqualified from award of the contract.

The Contractor shall procure and maintain for the duration of the Contract insurance against claims for injuries to persons or damages to property which may arise from or in connection with the performance of the Work hereunder by the Contractor, Contractor's agents, representatives, employees or subcontractors. The cost of such insurance shall be included in the Contractor's bid and shall not be otherwise recoverable from Owner.

A. Minimum Scope of Insurance. Coverage shall be at least as broad as:

1. Insurance Services Office form number GL 0002 (Ed. 1/73) covering Comprehensive General Liability and Insurance Services Office form number GL 0404 covering Broad Form Comprehensive General Liability; or Insurance Services Office Commercial General Liability coverage ("occurrence" form GC 0001).
2. Insurance Services Office form number CA 0001 (Ed. 1/78) covering Automobile Liability, code 1 "any auto" and endorsement CA 0025.
3. Worker's Compensation insurance as required by the Labor Code of the State of California and Employers Liability insurance.

B. Minimum Limits of Insurance. The Contractor shall maintain limits no less than:

1. General Liability: \$1,000,000 combined single limit per occurrence for bodily injury, personal injury and property damage. If Commercial General Liability Insurance or other form with a general aggregate limit is used, either the general aggregate limit shall apply separately to this Project/Location or the general aggregate limit shall be twice the required occurrence limit.
2. Automobile Liability: \$1,000,000 combined single limit per accident for bodily injury and property damage.
3. Workers' Compensation and Employers Liability: Worker's compensation limits as required by the Labor Code of the State of California and Employers Liability limits of \$1,000,000 per accident.

C. Deductibles and Self-insured Retentions. Any deductibles or self-insured retentions must be

declared to and approved by the Town of Los Gatos. At the option of the Town of Los Gatos, either: the insurer shall reduce or eliminate such deductibles or self-insured retentions as respects the Town of Los Gatos, its officers, officials, employees and volunteers; or the Contractor shall procure a bond guaranteeing payment of losses and related investigations, claim administration, and defense expenses.

D. *Other Insurance Provision.* The policies are to contain, or be endorsed to contain the following provision:

1. General Liability and Automobile Liability Coverages

a. The Town of Los Gatos, its officers, officials, employees and volunteers are to be covered as insureds as respects: liability arising out of activities performed by or on behalf of the Contractor, products and completed operations of the Contracts, premises owned, occupied or used by the Contractor, or automobiles owned, leased, hired or borrowed by the Contractor. The coverage shall contain no special limitations on the scope of protection afforded to the Town of Los Gatos, its officers, officials, employees, or volunteers.

b. The Contractor's insurance coverage shall be primary insurance as respects the Town of Los Gatos, its officers, officials, employees, and volunteers. Any insurance or self-insurances maintained by the Town of Los Gatos, its officers, officials, employees, or volunteers shall be excess of the Contractor's Insurance and shall not contribute with it.

c. Any failure to comply with reporting provisions of the policies shall not affect coverage provided to the Town of Los Gatos, its officers, officials, employees, or volunteers.

d. The Contractor's insurance shall apply separately to each insured against whom claim is made or suit is brought, except with respect to the limits of the insurer's liability.

2. Workers' Compensation and Employers Liability Coverage. The insurer shall agree to waive all rights of subrogation against the Town of Los Gatos, its officers, officials, employees, or volunteers for losses arising from work performed by the Contractor for the Town of Los Gatos.

3. All Coverages. Each insurance policy required by this clause shall be endorsed to state that coverage shall not be suspended, voided, canceled by either party, reduced in coverage or in limits except after 30 days prior written notice by certified mail, return receipt required, has been given to the Town of Los Gatos.

E. *Acceptability of Insurers.* Insurance is to be placed with insurers with a Best's rating of no less than B+.

F. *Verification of Coverage.* The Contractor shall furnish the Town of Los Gatos with certificates of insurance and with original endorsements effecting coverage required by this clause. The certificates and endorsements for each insurance policy are to be signed by a person authorized by that insurer to bind coverage on its behalf. The certificates and endorsements are to be on forms provided by the Town of Los Gatos. Where by statute, the Town of Los Gatos' workers' compensation-related forms cannot be used, equivalent forms approved by the State Insurance Commissioner are to be substituted. All certificates and endorsements are to be received and approved by the Town of Los Gatos before work commences. The Town of Los Gatos reserves the right to require complete, certified copies of all required insurance policies, at any time.

G. *Subcontractors.* The Contractor shall include all subcontractors as insureds under its policies

or shall furnish separate certificates and endorsements for each subcontractor. All coverages for subcontractors shall be subject to all of the requirements stated herein.

H. *Indemnification.* The Contractor shall save, keep and hold harmless indemnify and defend the Town its officers, agent, employees and volunteers from all damages, liabilities, penalties, costs, or expenses in law or equity that may at any time arise or be set up because of damages to property or personal injury received by reason of, or in the course of performing work which may be occasioned by a willful or negligent act or omissions of the Contractor, or any of the Consultant's officers, employees, or agents or any subcontractor.

7-1.10 CONTRACT DOCUMENTS ON SITE

The Contractor shall maintain on the job site an official set of Contract Documents, available at all times to the Director of Parks and Public Works, Inspector, or their representatives.

7-1.11 COORDINATION OF WORK WITH OTHER CONTRACTS

The Contractor must ascertain to the Contractor's own satisfaction the scope of the Work and the nature of any other Contracts that have been or may be awarded by the Owner in the prosecution of the Work, to the end that the Contractor may perform this Contract in the light of such other Contracts, if any. Nothing herein contained shall be interpreted as granting to the Contractor exclusive occupancy of the site of the work. The Contractor shall not cause any unnecessary hindrance or delay to any other Contractor working on any project which encompasses the Work. If the performance of any Contract for the work is likely to be interfered with by the simultaneous execution of some other Contract or Contracts, the Owner shall decide which the Contractor shall cease work temporarily and which the Contractor shall continue or whether the work can be coordinated so that the Contractors may proceed simultaneously. The Owner shall not be responsible for any damage suffered or extra costs incurred by the Contractor resulting directly or indirectly from the award or performance or accepted performance of any other Contract or Contracts on the Work or caused by any decision or omission of Owner respecting the order of precedence in the performance of the Contracts awarded for the completion of the Work.

The Owner reserves the right to do the Work with its own forces or to let other Contracts for work on or contiguous to the Work set forth in the *Plans and Specifications*.

7-1.12 EQUAL EMPLOYMENT OPPORTUNITY POLICY

From and after the award of the Contract and during the course of the work on the project, the Contractor shall comply with the following Equal Employment Opportunity Conditions. The Contractor adopts and accepts as its operating policy the following statement:

"It is the policy of this company to assure that applicants are employed and that employees are treated during employment without regard to their race, religion, sex, color, or national origin. Such action shall include employment, upgrading, demotion, transfer, recruitment and recruitment advertising, termination, pay, and selection for training, including apprenticeship."
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7-1.12.A EQUAL EMPLOYMENT OPPORTUNITY OFFICER

The Contractor shall designate and make known to the Director of Parks and Public Works an Equal Employment Opportunity Officer capable of administering and promoting an active Contractor program of equal opportunity who will be assigned adequate authority and responsibility to do so.

7-1.12.B DISSEMINATION OF POLICY

All members of the Contractor's organization with authority to hire, supervise, promote, and terminate employees, or who recommend such action, shall be made fully cognizant of and shall implement the Contractor's Equal Employment Opportunity policy: The following actions shall be taken as a minimum:

A. Periodic meetings of supervisory personnel shall be conducted before start of work and at least once every 3 months for the purpose of reviewing and explaining the Contractor's Equal Employment Opportunity Policy and its implementation. The meetings shall be conducted by the Equal Employment Opportunity Officer or other knowledgeable company officials.

B. All new supervisory employees shall be indoctrinated as to the Contractor's Equal Employment Opportunity obligations within 30 calendar days following their reporting for duty with the Contractor.

C. The Equal Employment Opportunity Officer or appropriate company official will instruct all employees engaged in recruitment and hiring as to the methods followed by the Contractor in recruiting and hiring qualified employees.

7-1.12.C RECRUITMENT

A. When advertising for employees, the Contractor shall include in all advertisements for employees the notation *An Equal Opportunity Employer*. It shall insert all such advertisements in newspapers or other publications having a large circulation among minority groups in the area from which the project work force would normally be derived.

B. If the Contractor does not restrict individuals who are hired as employees exclusively to those who are related by blood or marriage to persons possessing an ownership interest in the Contractor's business, in those case where the Contractor is not precluded therefor by a valid collective bargaining agreement, systematic and direct recruitment shall be conducted through public and private employee referral sources likely to yield qualified minority group applicants, including, but not limited to State employment agencies, schools, colleges and minority group organizations. To meet this requirement, the Contractor shall, through its Equal Employment Opportunity Officer, identify sources of potential minority group employees and establish with such identified sources procedures whereby minority group applicants may be referred to the Contractor for employment consideration.

C. If the Contractor does not restrict individuals who are hired as employees exclusively to those who are related by blood or marriage to persons possessing an ownership interest in the Contractor's business, the Contractor shall encourage present employees to refer minority group applicants for employment. Information and procedures with regard to referring minority group applicants shall be provided to such employees.

7-1.12.D PERSONNEL ACTIONS

Wages, working conditions, and employee benefits shall be established and administered, and personnel actions of every type, including hiring, upgrading, promotion, transfer, demotion, layoff, and termination shall be taken without regard to race, color, religion, sex, or national origin. The following procedures shall be followed:

A. The Contractor shall conduct periodic inspections of project sites to insure that working conditions and employee facilities do not indicate discriminatory treatment of project site personnel.

B. The Contractor shall periodically evaluate the spread of wages paid within each classification to determine any evidence of discriminatory wage practices.

C. The Contractor shall periodically review selected personnel actions in depth to determine whether there is evidence of discrimination. Where evidence is found, the Contractor shall promptly take corrective action. If the review indicates that the discrimination may extend beyond the actions reviewed, such corrective action shall include all affected persons.

D. The Contractor shall investigate all complaints of alleged discrimination made to the Contractor in connection with its obligations under this contract, shall attempt to resolve such complaints, and shall take appropriate corrective action. If the investigation indicates that the discrimination may affect persons other than the complainant, such corrective action shall include such other persons. Upon completion of each investigation, the Contractor shall inform every complainant of all of his/her avenues of appeal.

7-1.12.E TRAINING AND PROMOTION

If the Contractor does not restrict individuals who are hired as employees exclusively to those who are related by blood or marriage to persons possessing an ownership interest in the Contractor's business, programs designed to increase the skills of all employees and applicants for employment shall be promoted as follows:

A. Consistent with its manpower requirements and as permissible under Federal and State regulations, the Contractor shall make full use of training programs, such as pre-apprenticeship, apprenticeship, and/or on-the-job training programs for the geographical area of contract performance.

B. The Contractor shall advise employees and applicants for employment of available training programs and entrance requirements for each.

C. The Contractor shall periodically review the training and promotion potential of employees and shall encourage eligible employees to apply for such training and promotion.

7-1.12.F UNIONS

If the Contractor relies in whole or in part upon unions as a source of Contractor's work force, the Contractor shall use its best efforts to incorporate an Equal Employment Opportunity clause into all union agreements which defines responsibilities for non-discrimination in hiring, referral, up-grading and training, and otherwise implements an affirmative anti-discrimination program in terms of the union's specific areas of skill and geography, to the end that all qualified workers will be available and given an equal opportunity for employment, and such unions will be contractually bound to refer applicants without regard to their race, color, religion, sex or national origin.

In the event a union is unable to refer applicants as requested by the Contractor within the time limit set forth within the union agreement, the Contractor shall, through its recruitment procedures, fill the employment vacancies without regard to race, color, religion, sex or national origin, making full efforts to obtain qualified persons.

7-1.12.G SUBCONTRACTING

The Contractor shall use its best efforts to assure subcontractor compliance with their Equal Employment Opportunity obligations.

7-1.12.H DEBARRED CONTRACTORS AND SUBCONTRACTORS

Pursuant to Public Contract code § 6109, contractors and subcontractors who are ineligible pursuant to Labor Code §§ 1777.1 and 1777.7 are prohibited from work on the project

7-1.12.I NOTICES AND POSTERS

The Contractor shall make known its Equal Employment Opportunity responsibilities under this Contract by the following methods:

A. Executed copies of the Contractor's *Fair Employment Practices Statement* shall be:

1. Conspicuously posted in all areas where job applicants and potential employees appear for purposes of gaining employment by the Contractor;

2. Conspicuously posted on all employee bulletin boards and in other areas where employees of the Contractor congregate; and,

3. Transmitted to each labor union or representative of workers with which the Contractor has a collective bargaining agreement or other contract or understanding, and to all other sources or employee referrals, including schools and employment agencies.

B. Posters containing the following wording shall be conspicuously posted in all areas where job applicants and potential employees appear for purposes of gaining employment by the Contractor: "(NAME OF CONTRACTOR)" is an Equal Employment Employer."

C. The Contractor's Equal Employment Opportunity policy, as described in these Specifications, Section 7-1.10, and shall be distributed in written form to all employees.

7-1.12.J FAIR EMPLOYMENT PRACTICES STATEMENT

The Contractor shall execute the following Fair Employment Practices Statement:

"Fair Employment Practices Statement": (Name of Contractor) is an Equal Employment Opportunity Employer, as such has adopted the policy and will take affirmative action to employment without regard to their race, color, religion, ancestry or national origin. On (Date), (Name of Contractor) was awarded a public works contract by the Town of Los Gatos, a municipal corporation situated in the County of Santa Clara, State of California, for the work of (Name of Contract). Under said Contract (Name of Contractor) has agreed to comply with those Equal Employment Opportunity Conditions described in Section 7 of the Contract Documents for said project, and has agreed, among other things, that damages will be paid to the Town in event it is found that the requirements of said Conditions have not been satisfied.

Dated: _____

Signed: _____

7-1.12.K RECORDS

The Contractor shall keep such records as are necessary to determine compliance with its Equal Employment Opportunity obligations under this Contract. Such records shall be retained for a period of 2 years following completion of the project. Such records show:

A. The number of minority and non-minority group members employed in each work classification on the project.

B. The efforts and progress being made in cooperation with unions to increase minority group employment opportunities. (Applicable only to Contractors who rely in whole or in part on Unions as a source of their work force).

C. The efforts and progress being made in locating, hiring, training, qualifying, and upgrading employees.

The above-described records, together with the Contractor's records of employment, employment advertisements, application forms, and other pertinent data shall, upon request, be opened to inspection and copying by the Director of Parks and Public Works or the Director of Parks and Public Works authorized representative, or any other agency of the State of California designated by the Director of Parks and Public Works, for purposes of investigating whether the Contractor has complied with the Equal Employment Opportunity conditions of this Contract.

7-1.12.L REPORTS

Between the date of the award of the Contract and the date of the commencement of work on the project, the Contractor shall in conformity and compliance with the directions of the Director of Parks and Public Works, submit to the Director of Parks and Public Works a basic compliance report which shall include the following:

A. The name, business address and telephone number of the Contractor's Equal Employment Opportunity Officer.

B. An executed copy of the Contractor's Fair Employment Practices Statement.

C. A description of the Contractor's sources of potential employees, and the identity of the person or persons who have responsibility for determining who the Contractor will hire and whether or not to hire.

D. Such evidence as is required by the Director of Parks and Public Works, showing that the Contractor has notified all supervisors, foremen, and other personnel officers, in writing, of the content of the Contractor's Equal Employment Opportunity policy.

E. Such evidence as is required by the Director of Parks and Public Works showing that the Contractor has transmitted its *Statement of Fair Employment Practices* to all sources of employee referrals.

F. Such evidence as is required by the Director of Parks and Public Works showing that the Contractor has posted bulletins, posters, and the *Fair Employment Practices Statement* in the manner required by these Equal Employment Opportunity Conditions.

7-1.12.M BREACH OF EQUAL EMPLOYMENT CONDITIONS

In the event the Director of Parks and Public Works, as a result of supervising the Contractor's performance under the Contract or after investigating a complaint by a third party, finds that the Contractor is or has been in violation of its agreement to comply with these Equal Employment Opportunity Conditions, notice of such violations shall be filed with the Director of Parks and Public

Works and given to the Contractor by depositing same in the United States mail, postage prepaid, addressed to the last known business address of the Contractor, with return receipt requested. Not later than 15 calendar days after the filing of said notice with the Director of Parks and Public Works, a hearing shall be held by the Town Council for the purpose of ascertaining whether the charges contained in the notice are true, and, if true, whether the Contractor has failed to make a reasonable and substantial effort to comply with these Equal Employment Opportunity Conditions. Notice of the time and place of said hearing shall be given the Contractor not less than 5 days prior thereto in the same manner as the notice of violations is given. During said hearing, the Town Council shall receive and consider any evidence offered by the Director of Parks and Public Works, the Contractor, and any third party. At the conclusion of said hearing, the Town Council shall determine the matter and its determination shall be final.

If after the hearing above described the Town Council determines that the Contractor has failed to comply with these Equal Employment Opportunity Conditions, and has failed to make a reasonable and substantial effort to comply with said conditions, the Contractor shall be deemed in material breach of the Contract. It is understood that the Owner will have suffered damage by virtue of said breach; and it being impractical and unfeasible to determine the amount of actual damage, it is agreed that the Contractor shall pay to Owner, as fixed and liquidated damages, and not as a penalty, the sum of \$50.00 for each calendar day during which the Contractor is found to have been in noncompliance. Such monies may be recovered from the Contractor and its Surety. The Owner may deduct any such damages from monies due the Contractor.

7-1.12.N DISQUALIFICATION FROM FUTURE CONTRACTS

A finding by the Town Council that the Contractor has failed to comply with these Equal Employment Opportunity Conditions and has failed to make a reasonable and substantial effort to so comply, or a finding of willful violation of the nondiscrimination provisions of the State of California Fair Employment Practices Act, or similar provisions of Federal law or Executive Order, in the performance of work on the project shall be deemed a basis for determining the Contractor to be not a "responsible bidder" as to future contracts for which the Contractor may submit bids. A finding of willful violation of the nondiscrimination provisions of the State of California Fair Employment Practices Act shall be deemed to have occurred upon receipt by the Owner of written notice from the California Fair Employment Practices Commission that it has investigated and determined that the Contractor has violated said Fair Employment Practices Act and has issued an order under Government Code §12970, or obtained judgment and order of enforcement under Government Code §12973.

7-1.12.O OTHER REMEDIES

Nothing contained in these Equal Employment Opportunity Conditions shall be construed in any manner or fashion so as to prevent the Owner from pursuing any other remedies that may be available at law or in equity.

7-1.13 EQUIPMENT AND MATERIAL REPLACEMENT

A. The Contractor shall replace at Contractor's cost and expense any piece of equipment, or part thereof, or any material furnished under these Specifications, which fails because of defective material or workmanship, within 2 years following completion and acceptance of the Work.

B. All decisions regarding acceptable equipment or installation shall be made by the Director of Parks and Public Works, and the Director of Parks and Public Works decision shall be final.

7-1.14 PUBLIC SAFETY - NOISE

It shall be the Contractor's responsibility to keep noise pollution due to construction activities as low as possible. In no case shall noise levels produced by the Contractor exceed either of the following maximums:

A. No individual piece of equipment shall produce a noise level exceeding 85dBA at a distance of 25 feet.

B. The noise level at no point outside of the property line or temporary construction area shall not exceed 85dBA. No equipment violating these standards will be allowed to operate.

In no case shall the Contractor's operations violate the noise ordinance (Chapter 16) of the Town Code.

Section 8

PROSECUTION AND PROGRESS

8-1.01 PROGRESS SCHEDULE

The bidder's attention is directed to the provisions of Section 8 of the Standard Specifications, and these Specifications, all of which are applicable to this Contract, except that it shall be the bidder's responsibility to contact the utility companies and to determine for itself what, if any utility construction, removal, alteration or relocation work might delay or otherwise affect its operations under this Contract, and the Contractor shall not be entitled to any compensation for such delay or effect, except that time extensions may be granted, at the option of the Director of Parks and Public Works, as provided for in the Standard Specifications.

Prior to beginning work, the Contractor shall submit to the Director of Parks and Public Works for approval a detailed construction schedule for accomplishing the Work within the time allowed.

The detailed construction schedule shall include evidence of a capable work force, availability of construction materials and ability to prosecute the Work diligently to completion.

As a minimum, the construction schedule shall identify all major tasks necessary to complete the Work, shall indicate when each such task will be started and how many working days will be used in completing it, shall indicate the time relationship among the activities, and shall indicate the amount of each Contract item that will be completed after each 10% increment of Contract time has elapsed.

Whenever performance falls behind the approved construction schedule rates, the Contractor shall, by the next day, submit to the Director of Parks and Public Works for approval, a revised construction schedule indicating how the remaining work will be completed within the remaining time.

The Contractor shall also submit to the Director of Parks and Public Works each Friday a detailed plan and schedule for the proposed construction during the following week.

If and when the Director of Parks and Public Works determines that the Contractor will exceed the Contract time allowance, plus approved time extensions, the Director of Parks and Public Works shall suspend further payments due the Contractor until such time as the revised construction schedule is approved and the Contractor demonstrates satisfactory progress in accordance with the approved revised schedule.

Full compensation for providing, updating, and revising the project schedule shall be considered as included in the contract unit prices paid for the various items of work required to be listed in the progress schedule and no further compensation will be made therefor.

8-1.02 START OF WORK AND TIME OF COMPLETION

The Contractor shall mobilize within the time frame set forth in the Notice to Proceed and the Special Provisions. Entire contract shall be completed within the time set forth in the Notice after Contractor's receipt of said Notice.

8-1.03 LIQUIDATED DAMAGES

Liquidated damages will be assessed in the amount of \$3,500.00 for each calendar day any work remains

incomplete beyond the time fixed above for completion.

8-1.04 ADJUSTMENT AND PRESERVATION OF UTILITIES

This section is supplemental to the Standard Specifications. In case of conflict, these conditions shall govern insofar as applicable.

It shall be the sole responsibility of the Contractor to pothole and verify the exact locations and depths of all utilities prior to making borings or excavations. Power poles and overhead wires shall be protected. Call Underground Service Alert (USA) at 1-800-227-2600 prior to any digging.

The Contractor shall notify Director of Parks and Public Works of Contractor's findings in writing where possible conflicts may exist.

The Contractor shall bear full responsibility for all damages and cost of repairs to existing utilities and surface improvements that are to remain or not in direct conflict. If any utilities or improvements, including sprinklers, are damaged during the course of construction, all expenses, or whatever nature, arising from the restoration of improvements to its original conditions shall be borne by the Contractor, and no additional compensation shall be allowed therefor.

Any damaged, broken or cracked utility boxes must be brought to the attention of the Public Works Inspector prior to construction or the Contractor shall assume liability for the damaged boxes.

Unless otherwise indicated on the drawings or specified herein, the Contractor shall maintain in service all water, gas, and sewer lines and any lighting, power, and telephone surface and sub-surface structures of any nature that may be affected by the work.

If the Contractor fails to maintain and protect such facilities, the Town of Los Gatos reserves the right, if requested by the owners of the utilities, to permit the Owner to move or maintain the utilities at the Contractor's expense.

Should it become necessary in the performance of the Work to disconnect or re-route any underground utility due to a direct conflict with the new work, Contractor shall inform respective utility company involved.

8-1.05 WORKING HOURS

Hours of work shall be limited to 8:00 a.m. to 5:00 p.m. on Monday through Friday unless otherwise stated in the Special Provisions. Other hours must be specifically approved by the Director of Parks and Public Works.

8-1.06 SUPERVISION

The Contractor shall have a qualified superintendent on the job site at all times when work is in progress. Contractor shall submit Superintendents name and resume of experience to the Director Parks and Public Works for approval at pre-construction meeting.

8-1.07 PRE-CONSTRUCTION CONFERENCE

The Contractor shall arrange for a pre-construction conference meeting with the Director of Parks and Public Works. This meeting shall be held at least one (1) week before the Contractor intends to start

construction.

At the pre-construction conference, the Contractor shall provide the Director of Parks and Public Works with the name(s) and telephone number(s) of Contractor's personnel who can be reached and who can respond during non-working hours in the event of an emergency or other contingency requiring the Contractor's immediate attention.

Section 9

MEASUREMENT AND PAYMENT

9-1.01 MEASUREMENT AND PAYMENT

A. *Payment for Increased or Decreased Quantities.* Should there be any variance between the estimated amount of the work to be done and the actual amount of authorized work performed, the provisions of Section 4 of the Standard Specifications, which provide for an adjustment of the unit price by reason of overruns or underruns in excess of 25% of the Director of Parks and Public Works estimate, shall apply.

It is the Contractor's responsibility to continually analyze and apply the estimated quantities provided in the Contract Documents and to use the knowledge gained from site visits, construction, and professional experience, to update the estimated quantities as the work progresses. If and when the Contractor reaches 90% of the estimated quantities of materials required for any portion of the work as specified in the *Plans and Specifications* and has any reasonable belief that the Contractor will be required to exceed those estimated quantities by more than 10%, the Contractor shall provide written notice to the Owner of the possibility and the estimated quantities required to complete the work. If the Contractor fails to provide that written notice before delivering materials in excess of the originally estimated quantities, the Contractor shall not be entitled to any additional compensation or payment for the additional work or materials needed for the additional materials above 110%, but nevertheless shall be required to complete the Work.

B. *Progress Payments.* On or before the 20th day of each month, the Contractor shall prepare and forward to Owner an estimate, in writing, of the total amount of the work completed in place, and the value thereof as of the 15th day of each month.

The Owner shall retain 5% of such estimated value of the Work completed in place, unless otherwise approved by the Engineer, and shall pay to Contractor, while carrying on the work, the balance not retained, as aforesaid, after deducting therefrom all previous payments, and all sums to be kept or retained under the provisions of this Contract. No such estimate or payment shall be construed to be an acceptance of any defective work or improper materials.

Work completed in place, as estimated, shall be an estimate only, and no inaccuracy or error in said estimates shall operate to release the Contractor or any Surety from damages arising from such work or from enforcing each and every provision of this Contract, and the Owner shall have the right subsequently to correct any error made in any estimate for payment. The Contractor shall not be entitled to have any payment estimates processed, or be entitled to have any payment made for work performed, so long as any lawful or proper direction concerning the work or any portion thereof given by Owner or the Director of Parks and Public Works shall remain uncompleted. In addition to the amount which Owner may retain, as provided herein above, the Owner may withhold a sufficient amount or amounts of any payment or payments otherwise due to the Contractor as in its judgment may be necessary to cover:

1. Payments which may be past due and payable for just claims against the Contractor or any subcontractor for labor or materials furnished in or about the performance of the Work on the Project under this Contract;
2. For defective work not remedied;
3. For failure of the Contractor to make proper payments to any of the Contractor's

subcontractors;

4. A reasonable doubt that the Contractor will complete the Work within the agreed time limits;
5. Costs to the Owner resulting from failure of Contractor to complete the Work within the proper time;
6. Damage to other work on property;
7. Potential liquidated damages.

Whenever the Owner shall, in accordance herewith, withhold any monies otherwise due the Contractor, written notice of the amount withheld and the reasons therefor shall be given the Contractor, and when the Contractor shall remove the grounds for such withholding, the Owner will promptly pay the Contractor the amount so withheld.

C. *Progress Payment Requests.* Pursuant to Public Contracts Code §20104.50, the Owner will promptly process all requests for progress payments pursuant to this Contract. As to any undisputed payments that are made more than 30 days after receipt of an undisputed and properly submitted payment request from the Contractor, the Owner will pay interest equivalent to the legal rate set forth in Code of Civil Procedure §685.10. This section shall not apply to progress payments received between July 1 and August 1 which may take up to an additional 6 weeks to process payments.

D. *Acceptance of the Work and Final Payment*

1. The final payment for the Work done under this Contract shall be made 60- calendar days after acceptance of the Work by Owner.
2. Owner shall deduct from the final payment for the Work done under this Contract any unpaid fees for business licenses required in conformance with Section 1-1.05 of these Specifications.
3. Upon receipt of written notice from the Contractor that the Work is ready for final inspection and acceptance, the Director of Parks and Public Works shall promptly make such inspection, and when the Director of Parks and Public Works finds the Work acceptable under this Contract and this Contract fully performed, the Director of Parks and Public Works shall promptly issue a final certificate to Governing Body or Owner, stating that the Work provided for in this Contract has been completed and is accepted by the Director of Parks and Public Works under the terms and conditions thereof.
4. Acceptance of the Work will be made by the Governing Body of Owner only upon filing with said Governing Body of a certificate by the Director of Parks and Public Works showing the Work has been given a final inspection and approval by Director of Parks and Public Works and that Contractor has submitted satisfactory evidence to the Director of Parks and Public Works that all payrolls, material bills and other indebtedness connected with said work have been paid. The acceptance will be made only by action of the Governing Body of Owner to regular session.
5. If, after the Work has been substantially completed, full completion thereof is materially delayed through no fault of Contractor, and Director of Parks and Public Works so certifies, Owner shall, upon certificate of the Director of Parks and Public Works, and without terminating this Contract, make payment of the balance due for that portion of the Work completed and accepted. Such payment shall be made under the terms and conditions governing final payment, except that it shall not

constitute a waiver of claims.

6. The acceptance by Contractor of said final payment shall constitute a waiver of all claims against the Owner arising under this Contract.

Submission of Requests for Payment / Invoices. The Contractor shall submit all original requests for payments or invoices directly to the Owner as follows: Town of Los Gatos Finance Department, Attn: Accounts Payable, Post Office Box 655, Los Gatos, California 95030. A copy of such request or invoices shall also be sent to the Director of Parks and Public Works.

Void Contract Provisions. Payment of undisputed contract amounts by the Owner are contingent upon the Contractor furnishing the Owner with a release of all claims against the Owner arising by virtue of the public works contract related to those amounts. Disputed contract claims in stated amounts may be specifically excluded by the Contractor from the operation of the release.

Damages. Any provision in the Contract which limits the Owner's liability to an extension of time for delay for which the Owner is responsible and which delay is unreasonable under contemplation of the circumstances involved, and not within the parties' control, shall not be construed to preclude the recovery of damages by the Contractor or subcontractor. This section shall not be construed to void any provision in this Contract which requires notice of delays, provides for arbitration or other procedure for settlement, or provides for liquidated damages.



TOWN OF LOS GATOS

SPECIAL PROVISIONS Part III

**Town of Los Gatos
Department of Parks and Public Works**

SPECIAL PROVISIONS

**PROJECT #13-31 ALMOND GROVE STREET RECONSTRUCTION
PHASE II**

SECTION 1. SPECIFICATIONS AND PLANS

Special Provisions Section 1 – Section 9

Special Provisions Sections 1 – Section 9 shall apply to all elements of the project. Full compensation for furnishing all labor, materials, tools, equipment and all incidentals for doing all the work involved in compliance with the Plans, Specifications, and Special Provisions Sections 1 – Section 9 shall be deemed included in the price paid for the various other contract bid items and no additional compensation shall be allowed therefore.

SECTION 2. PROPOSAL REQUIREMENTS AND CONDITIONS

Proposal Guaranty

The Bidder's Bond shall conform to the bond form included in the Proposal for the project and shall be properly filled out and submitted with the Proposal.

Pre-Bid Site Inspection

As noted in the Town of Los Gatos Standard Plans and Specifications, prospective bidders shall carefully examine the job-site. The submission of the bid shall be conclusive evidence that the bidder has investigated and is satisfied as to the conditions to be encountered, as to character, quality, and scope of work to be performed, the quantity of materials to be furnished, and as to the requirements of the proposals, plans, specifications, and the contract. All questions relative to this project must be submitted in writing and received a minimum of five (5) working days prior to the bid opening date and shall be directed to:

Town of Los Gatos, Parks and Public Works Department
41 Miles Avenue, Los Gatos, CA 95030
Attention: Janice Chin, Project Manager
Telephone: (408) 395-3460
Fax: (408) 399-5763
E-mail: jchin@losgatosca.gov

SECTION 3. AWARD AND EXECUTION OF CONTRACT

Determination of Low Bid

All bids will be compared on the basis of the Bid Form of quantities of work to be done. The determination of the low bid will be based on the total base bid listed. The contract will be awarded to the lowest responsible bidder meeting the contract requirements.

The bidder's attention is directed to the provisions in Section 3, "Award and Execution of Contract," of the Town Standard Specifications and these Special Provisions for the requirements and conditions concerning award and execution of contract.

Bid Protests are to be delivered to the following:

Town of Los Gatos, Parks and Public Works Department
41 Miles Avenue, Los Gatos, CA 95030
Attention: Lisa Petersen, Town Engineer
Telephone: (408) 399-5773
Fax: (408) 399-5763

The award of the contract, if it be awarded, will be to the lowest responsible bidder whose bid complies with all the requirements prescribed.

The contract shall be executed by the successful bidder and shall be returned together with the contract bonds, to the Town so that it is received within ten (10) days, not including Saturdays, Sundays and legal holidays, after the bidder has received the Notice of Award. Failure to do so shall be just cause for forfeiture of the proposal guaranty. The executed contract documents shall be delivered to the following address: Town of Los Gatos, Department of Parks and Public Works, 41 Miles Avenue, Los Gatos, CA 95030.

Pre-Construction Conference

A pre-construction conference will be held shortly after the contract award and prior to each yearly phase of work in accordance with "Meetings" subparagraph found in Section 8-1.07, "Pre-Construction Conference," of the Town Standard Specifications and Section 10-1, "General Construction Requirements," of these Special Provisions. The Contractor shall prepare and submit all required documents five (5) working days in advance of the pre-construction conference.

SECTION 4. BEGINNING OF WORK, TIME OF COMPLETION, AND LIQUIDATED DAMAGES

General

Attention is directed to the provisions in Section 8-1.03 "Beginning of Work" and Section 8-1.06 "Time of Completion" of the Standard Specifications, and these Special Provisions.

Time of Completion

The Contractor shall begin work as stipulated in the Notice to Proceed.

The Contractor shall diligently prosecute the work to completion within the number of days and times listed below:

- May 1, 2017 to October 1, 2017 (total of 107 working days)
- May 1, 2018 to October 1, 2018 (total of 107 working days)
- May 1, 2019 to October 1, 2019 (total of 107 working days)

During each time period the Contractor must complete two (2) to three (3) streets per year, in place and complete. The Contractor may be allowed to start earlier in 2018 and 2019, weather permitting, and as agreed upon by the Town. The number of working days will remain the same.

The time of completion shall include all allowances for mobilization and total completion of all work including final punch list work and final clean up. Working days shall be as shown on the "Caltrans Working Day Calendars" contained in Appendix B.

Quantities for each yearly work phase will be broken out at the start of the project. Individualized pay sheets, traffic control plans, pre-paving conferences, construction paving plans, project schedules, storm water pollution prevention plans, submittals and record drawings will be provided for each yearly phase of work as needed. The Town will issue a separate Notice to Proceed for each yearly phase of work.

Liquidated Damages

Time is of the essence for completion of this project. The Contractor shall pay to the Town of Los Gatos the sum of Three Thousand Five Hundred Dollars (\$3,500.00) per day for each and every calendar day's delay in the finishing of the work in excess of working days prescribed above for each individual time period. Liquidated damages shall also be assessed for non-compliance with the requirements stated in "Hours of Work" under Section 10-1, "General Construction Requirements," of these Special Provisions, and Section 10-4, "Traffic Control Requirements."

SECTION 5. GENERAL REQUIREMENTS

Licenses

The Contractor shall possess a valid Class "A" General Engineering Contractor License at the time the Contract is awarded. Failure to possess the specified license shall render the bid as non-responsive and shall act as a bar to award the Contract to any bidder not possessing said license at the time of bid and forfeiture of the bid will result. All contractors and subcontractors shall have and maintain a current and valid contractor license of the required classification from the State of California throughout the course of this project. In addition, all contractors and subcontractors working in the Town of Los Gatos must have a valid Town of Los Gatos Business License.

Worker's Compensation

Attention is directed to Section 7-1.01A(6), "Workers' Compensation," of the Standard Specifications and the following:

Before commencing work in the Town of Los Gatos the Contractor must provide the Town with a copy of one of the following:

1. Certificate of Worker's Compensation Insurance; or
2. Certificate of consent to self-insure issued by the Director of Industrial Relations; or
3. Certificate of exemption from the Workers' Compensation Laws.

Insurance Requirements

Attention is directed to Section 7-1.09, "Insurance Requirements," of the Town Standard Specifications. The Contractor agrees that they will assume sole and complete responsibility for job site conditions during the course of the work, including safety of all persons and property; that this requirement shall apply continuously and not be limited to normal working hours.

In addition to any other indemnity obligation incorporated herein, the Contractor shall indemnify, defend and hold harmless Town, its agents, officers, attorneys. Employees, officials and volunteers, to the fullest extent permitted by law from any and all claims, causes of action, injuries, losses, liabilities, cost (including reasonable defense costs and attorneys' fees) or damages arising out of or related to, or alleged to arise out of or relate to the performance of this contract or any acts or omissions of Contractor, its agents, officers, employees, or anyone rendering services on their behalf, except for any claims, causes of

action, injuries, losses, liabilities or damages proximately caused by the active negligence, sole negligence or willful misconduct of Town.

Notwithstanding any other indemnity provisions imposed under this contract, with respect to any design professional services provided by the Contractor, the Contractor agrees to indemnify, defend and hold harmless the Town, its officers, agents and employees from any and all claims, actions, causes of action, losses, damages, costs and liabilities of every nature, including all costs of defending any claim, caused by, pertaining or relating to, or arising out of, or alleged to have been caused by or arise out of, pertain to, or relate to the negligence, recklessness, or willful misconduct of the Contractor, except for any claims, actions, causes of action, losses, damages or liabilities proximately caused by the sole negligence or willful misconduct of Town. The Town shall not be liable for acts of the Contractor in performing services described herein.

The foregoing indemnity provisions are intended to fully allocate all risk of liability to third-parties. No other rights of indemnity or contribution shall exist between the parties in law or in equity. The provisions set forth in this section shall survive the termination of this Agreement.

Public Safety

The following paragraphs are hereby added to Section 7-1.09 "Public Safety," of the Standard Specifications.

The Contractor shall maintain a safe workplace throughout the job including, but not limited to, maintenance of barricades, maintenance of safe pedestrian walkways and handicap access throughout or around the project site, and maintenance of pavement within the limits of the roadway and driveways with a suitable traffic-bearing surface. The Contractor shall fulfill the requirements of this Section 24 hours per day, seven days a week, including holidays, from the time of the Notice to Proceed is issued until the project is formally accepted.

Labor Nondiscrimination

Attention is directed to Section 1735 of the Labor Code, which reads as follows:

"No discrimination shall be made in the employment of persons upon public works because of the race, religious creed, color, national origin, ancestry, physical handicap, medical condition, marital status, or sex of such persons, except as provided in Section 12940 of the Government Code, and every Contractor for public works violating this section is subject to all the penalties imposed for a violation of this chapter."

Attention is directed to the following "Nondiscrimination Clause" that is required by Chapter 5 of Division 4 of Title 2, California Code of Regulations.

NONDISCRIMINATION CLAUSE

1. During the performance of this contract, the Contractor and its subcontractors shall not unlawfully discriminate against any employee or applicant for employment because of race, religion, color, national origin, ancestry, physical handicap, medical condition, marital status, age (over 40) or sex. The Contractors and subcontractors shall ensure that the evaluation and treatment of their employees and applicants for employment are free of such discrimination. The contractors and subcontractors shall comply with the provisions of the Fair Employment and Housing Act (Gov. Code, Section 12990 et seq.) and the applicable regulations promulgated thereunder (California Code of Regulations, Title 2, Section 7285.0 et seq.). The applicable regulations of the Fair Employment and Housing Commission implementing

Government Code, Section 12990, set forth in Chapter 5 of Division 4 of Title 2 of the California Code of Regulations are incorporated into this contract by reference and made a part hereof as if set forth in full. The Contractor and its subcontractors shall give written notice of their obligations under this clause to labor organizations with which they have a collective bargaining or other agreement.

2. This Contractor shall include the nondiscrimination and compliance provisions of this clause in all subcontracts to perform work under the contract.

**STANDARD CALIFORNIA NONDISCRIMINATION CONSTRUCTION
CONTRACT SPECIFICATIONS (GOV. CODE, SECTION 12990)**

These specifications are applicable to all state Contractors and subcontractors having a construction contract or subcontract of \$5,000 or more.

1. As used in the specifications:
 - a. Administrator” means Administrator, Office of Compliance Programs, California Department of Fair Employment and Housing or any person to whom the Administrator delegates authority;
 - b. “Minority” includes:
 - (i) Black (all persons having primary origins in any of the black racial groups of Africa, but not of Hispanic origin);
 - (ii) Hispanic (all persons of primary culture or origin in Mexico, Puerto Rico, Cuba, Central or South America or other Spanish derived culture or origin regardless of race);
 - (iii) Asian/Pacific Islander (all persons having primary origins in any of the original peoples of the Far East, Southeast Asia, the Indian Subcontinent or the Pacific Islands); and
 - (iv) American Indian/Alaskan Native (all persons having primary origins in any of the original peoples of North America and who maintain culture identification through tribal affiliation or community recognition).
2. Whenever the Contractor or any subcontractor subcontracts a portion of the work, it shall physically include in each subcontract of \$5,000 or more the nondiscrimination clause in this contract directly or through incorporation by reference. Any subcontract for work involving a construction trade shall also include the Standard California Construction Contract Specifications, either directly or through incorporation by reference.
3. The Contractor shall implement the specific nondiscrimination standards provided in paragraph 6(a) through (e) of these specifications.
4. Neither the provisions of any collective bargaining agreement, nor the failure by a union with whom the Contractor has a collective bargaining agreement, to refer either minorities or women, shall excuse the Contractor's obligations under these specifications, Government Code, Section 12990, or the regulations promulgated pursuant thereto.
5. In order for the non-working training hours of apprentices and trainees to be counted, such apprentices and trainees must be employed by the Contractor during the training period, and the Contractor must have made a commitment to employ the apprentices and trainees at the completion of their training, subject to the availability of employment opportunities. Trainees must be trained pursuant to training programs approved by the U.S. Department of Labor or the California Department of Industrial Relations.
6. The Contractor shall take specific actions to implement its nondiscrimination program. The evaluation of the Contractor's compliance with these specifications shall be based upon its effort to achieve maximum results from its actions. The Contractor must be able to demonstrate fully its efforts under Steps (a) through (e) below:

- a) Ensure and maintain a working environment free of harassment, intimidation, and coercion at all sites, and at all facilities at which the Contractor's employees are assigned to work. The Contractor shall specifically ensure that all foremen, superintendents, and other on-site supervisory personnel are aware of and carry out the Contractor's obligations to maintain such a working environment.
 - b) Disseminate the Contractor's equal employment opportunity policy by providing notice of the policy to unions and training, recruitment and outreach programs and requesting their cooperation in assisting the Contractor to meet its obligations; and by posting the company policy on bulletin boards accessible to all employees at each location where construction work is performed.
 - c) Ensure all personnel making management and employment decisions regarding hiring, assignment, layoff, termination, conditions of work, training, rates of pay or other employment decisions, including all supervisory personnel, superintendents, general foremen, on-site foremen, etc., are aware of the Contractor's equal employment opportunity policy and obligations, and discharge their responsibilities accordingly.
 - d) Ensure that seniority practices, job classifications, work assignments and other personnel practices, do not have a discriminatory effect by continually monitoring all personnel and employment related activities to ensure that the equal employment opportunity policy and the Contractor's obligations under these specifications are being carried out.
7. The Contractors are encouraged to participate in voluntary associations, which assist in fulfilling their equal employment opportunity obligations. The efforts of a contractor association, joint contractor-union, contractor-community, or other similar groups of which the Contractor is a member and participant, may be asserted as fulfilling any one or more of its obligations under these specifications provided that the Contractor actively participates in the group, and can provide access to documentation which demonstrates the effectiveness of actions taken on behalf of the Contractor. The obligation to comply, however, is the Contractor's.
 8. The Contractor is required to provide equal employment opportunity for all minority groups, both male and female, and all women, both minority and non-minority.
 9. The Contractor shall not use the nondiscrimination standards to discriminate against any person because of race, color, religion, sex, national origin, ancestry, physical handicap, medical condition, marital status or age over 40.
 10. The Contractor shall not enter into any subcontract with any person or firm decertified from state contracts pursuant to Government Code Section 12990.
 11. The Contractor shall carry out such sanctions and penalties for violation of these specifications and the nondiscrimination clause, including suspension, termination and cancellation of existing subcontracts as may be imposed or ordered pursuant to Government Code Section 12990 and its implementing regulations by the awarding agency. Any Contractor who fails to carry out such sanctions and penalties shall be in violation of these specifications and Government Code Section 12990.

12. The Contractor shall designate a responsible official to monitor all employment related activity to ensure that the company equal employment opportunity policy is being carried out, to submit reports relating to the provisions hereof as may be required by OCP and to keep records. Records shall at least include for each employee the name, address, telephone numbers, construction trade, union affiliation if any, employee identification number when assigned, social security number, race, sex, status, (e.g., mechanic, apprentice trainee, helper, or laborer), dates of changes in status, hours worked per week in the indicated trade, rate of pay, and locations at which the work was performed. Records shall be maintained in any easily understandable and retrievable form; however, to the degree that existing records satisfy this requirement, Contractors shall not be required to maintain separate records.

NOTE: Authority cited: Sections 12935(a) and 12990(d), Government Code. References: Section 12990, Government Code.

Prevailing Wage

Attention is directed to Section 7-1.01A(2) of the Standard Specifications entitled “Prevailing Wage,” and as determined/published by the Department of Industrial Relations for the State of California – as indicated in the following website: <http://www.dir.ca.gov/dlsr/pwd/index.htm>.

If the published wage rate does not refer to a predetermined wage rate to be paid after the expiration date, said published rate of wage shall be in effect for the life of this contract. If the published wage rate refers to a predetermined wage rate to become effective upon expiration of the published wage rate and the predetermined wage rate is on file with the Department of Industrial Relations, such predetermined wage rate shall become effective on the date following the expiration date and shall apply to this contract in the same manner as if it had been published in said publication. If the predetermined wage rate refers to one or more additional expiration dates with additional predetermined wage rates, which expiration dates occur during the life of the contract, each successive predetermined wage rate shall apply to this contract on the date following the expiration date of the previous wage rate. If the last of such predetermined wage rate expires during the life of this contract, such wage rate shall apply to the balance of the contract.

Payroll Records

The Contractor shall comply with Section 7-1.01A(3) “Payroll Records” of the Standard Specifications. Section 7.101A(3) “Payroll Records,” Subdivision (b), Sub-section (2) shall be amended to read as follows:

A certified copy of all payroll records enumerated in subdivision (a) shall be made available for inspection or furnished upon request to the Division of Labor Standards Enforcement and the Division of Apprenticeship Standards of the Department of Industrial Relations. Certified payroll records shall be submitted weekly for the life of the project to a representative of the body awarding the contract.

SECTION 6. CONTROL OF WORK

Record Drawings

The Contractor shall mark all project conditions, locations, configurations, and any other changes or deviations, which may vary from the plans represented on the Original Contract Documents including buried or concealed construction and utility features which are installed or revealed during the course of construction. The Contractor shall keep and maintain the said records and upon request, submit a monthly updated set of Record Drawings to the Engineer. Progress payments may be withheld until the Contractor submits the monthly updated Record Drawing to the Engineer. No final payment will be made until the record drawings are delivered. The Contractor shall provide AutoCAD drafted finalized record drawings.

Materials Testing

Materials testing shall be done in accordance with the project plans and specifications. Attention is also directed to the State of California, Department of Transportation, Standard Specifications dated May 2006, portions of which are incorporated into the Town Standard Specifications by reference.

The Contractor shall perform all quality control testing for the project and as necessary to ensure control and compliance with the specifications. Any testing results shall be made available to the Engineer upon request. Specific quality control testing requirements including but not limited to materials, compaction for subgrade, aggregate base, and HMA, compressive strength for concrete pavement or other tests as necessary, sidewalk, driveway, and curb & gutter are included in the Technical Specifications.

Should the Contractor's test results be in conflict with the Town's testing results during the QC/QA process, the Town's results will prevail and the Contractor, at their own expense, shall provide additional tests as necessary to resolve any discrepancies between test results. The Town reserves the right to ask for additional information/tests at any time should there be a question regarding the quality of the materials or construction process. Contractor shall provide a monthly record of all tests completed and results obtained. Tests should be submitted with requests for progress payments.

The Contractor shall allow sufficient time for test to be conducted and results reviewed prior to continuing with the work, which may be affected by any test results.

Payment for compliance with Section 6, "Control of Work," shall be deemed included in the various other items of work and no additional compensation shall be allowed therefore.

SECTION 7. CLAIMS

General

The Contractor shall not be entitled to the payment of any additional compensation for any act, or failure to act, by the Engineer, including failure or refusal to issue a change order, or for the happening of any event, thing, occurrence, or other cause, unless the Contractor shall have given the Engineer due written notice of potential claim as specified in the Standard Specifications and these Special Provisions.

The written notice of potential claim shall set forth the reasons for which the Contractor believes additional compensation will or may be due, the nature of the costs involved, and insofar as possible, the amount of the potential claim. The notice as above required must have been given to the Engineer prior to the time that the Contractor shall have performed the work giving rise to the potential claim for additional compensation, if based on an act or failure to act by the Engineer, or in all other cases within 10 days after the happening of the event, thing, occurrence, or other cause, giving rise to the potential claim. Town may request additional information from Contractor regarding the Contractor's claim which shall be provided to the Town within 10 days of the request. If the Contractor fails to provide notice as stipulated in this section, the Claim will be considered invalid, and no compensation will be allowed therefore.

It is the intention of this Section that differences between parties arising under and by virtue of the contract be brought to the attention of the Engineer at the earliest possible time in order that such matters may be settled, if possible, or other appropriate action promptly taken. The Contractor hereby agrees that they shall have no right to additional compensation for any claim that may be based on any such act, failure to act, event, thing or occurrence for which no written notice of potential claim as herein required was filed.

In addition to the written Notice of Potential Claim, the Contractor shall submit written statement of all claims arising under or by virtue of the contract so that the Engineer receives the written approval or

statement of claims no later than close of business of the thirtieth (30th) day after receiving the proposed final estimate. If the thirtieth (30th) day falls on a Saturday, Sunday, or legal holiday, then receipt of the written approval or statement of claims by the Engineer shall not be later than close of business of the next business day. No claim will be considered that was not included in the written statement or claims, nor will any claim be allowed as to which a notice or protest is required under these provisions in Section 4-1.03, "Changes" and "Time of Completion," Section 4, "Liquidated Damages," Section 5-1.116, "Differing Site Conditions," Section 8-1.10, "Utilities and Non-Highway Facilities," and Section 9-1.04, "Notice of Potential Claim," of the Standard Specifications unless the Contractor has complied with the notice or protest requirements in those sections.

Claims filed by the Contractor shall be in sufficient detail to enable the Engineer to ascertain the basis and amount of said claims. If additional information or details are required by the Engineer to determine the basis and amount of the claims, the Contractor shall furnish additional information or details so that the additional information or details are received by the Engineer no later than the fifteenth (15th) day after receipt of the written request from the Engineer. If the fifteenth (15th) calendar day falls on a Saturday, Sunday or legal holiday, then receipt of the information or details by the Engineer shall not be later than close of business of the next business day. Failure to submit the information and details to the Engineer within the time specified will be sufficient cause for denying the claim.

The Contractor shall keep full and complete records of the costs and additional time incurred for any work for which a claim for additional compensation is made. The Engineer or any designated claim investigator or auditor shall have access to those records and any other records as may be required by the Engineer to determine the facts or contentions involved in the claims. Failure to permit access to those records shall be sufficient cause for denying the claims.

Claims submitted by the Contractor shall be accompanied by a notarized certificate containing the following language:

Under the penalty of law for perjury or falsification and with specific reference to the California False Claims Act, Government Code Section 12650 et. seq., the undersigned,

(Name)

(Title)

(Company)

hereby certifies that the claim for the additional compensation and time, if any, made herein for the work on this contract is a true statement of the actual costs incurred and time sought, and is fully documented and supported under the contract between parties.

Dated _____

/s/ _____

State of California)
) ss.

County of _____)

Subscribed and sworn to (or affirmed) before me this _____ day of _____, 20____.

Signature of Notary Public

(Notary Seal)

Failure to submit the notarized certificate will be sufficient cause for denying the claim.

Any claim for overhead type expenses or costs, in addition to being certified as stated above, shall be supported by an audit report of an independent Certified Public Accountant. Any claim for overhead shall also be subject to audit by the Town at its discretion.

Any costs or expenses incurred by the Town in reviewing or auditing any claims that are not supported by the Contractor's cost accounting or other records shall be deemed to be damages incurred by the Town within the meaning of the California False Claims Act.

The Engineer will make the final determination of any claim which remains in dispute after completion of the claim review. The Contractor may be allowed to make a presentation in support of those claims.

Upon final determination of the claims, the Engineer will then make and issue the Engineer's final estimate in writing and within 30 days thereafter the Town will pay the entire sum, if any, found due thereon. That final estimate shall be conclusive and binding against both parties to the contract on all questions relating to the amount of work done and the compensation payable therefore, except as otherwise provided in Sections 9-1.03C, "Records," and 9-1.09, "Clerical Errors" of the Standard Specifications.

SECTION 8. MATERIALS

Town Furnished Materials

Temporary "No Parking" signs shall be provided by the Town for the Contractor's use on this project and resident mailing lists.

Submittals

The Contractor shall submit to the Engineer the following at least five (5) working days before the pre-construction conference:

1. Progress Schedule
2. Traffic Control Plan
3. Storm Water Pollution Prevention Plan (SWPPP). Include all working days and end date of construction.
4. Concrete Pavement Quality Control Plan – allow 30 days for Town review
5. Materials Submittals Binder with all required submittals from materials submittal list (including PCC mix designs per Section 10-12 and any proposed substitutions)
6. Construction Paving Plans
7. Draft of the Two Week Advanced Notice – general construction activity
8. Video Survey

All submittals listed above must be received by the Engineer prior to the issuance of the Notice to

Proceed for each yearly phase of work. Any submittal rejected by the Engineer or requiring resubmittal is to be remedied and resubmitted by the Contractor for the Engineer's review within 10 calendar days. In all cases, materials proposed to be used by the Contractor in this contract shall be submitted, reviewed, and found acceptable by the Engineer a minimum of 10 working days prior to the intended use of the material, unless otherwise approved by the Engineer.

The Contractor will not be allowed to submit untimely requests for substitutions. Requests for substitutions due solely to the Contractor's failure to order materials in time for installation will not be allowed and the Contractor will be responsible for providing an acceptable temporary material that will be removed and replaced with the required material (when available), at the sole expense of the Contractor..

Materials Submittal List

The materials proposed by the Contractor to be used on this contract shall be submitted five (5) days prior to the pre-construction conference for each yearly phase, and must obtain final approval by the Engineer ten (10) working days before the start of work in which the material is to be used. Submittals shall be as outlined below.

The Contractor shall submit **one (1)** set of original submittals to the Engineer for approval in a three-ring binder, at least three (3") inches in thickness, and include numbered index tabs separating each submittal. Submittal index tabs shall follow the numbering system identified in the list below. Subsequent re-submittals, including the original and all copies shall be submitted in loose-leaf form or via PDF. The Contractor shall submit the original binder of the submittals to the Engineer no later than five (5) working days in advance of the pre-construction conference meeting.

Submittals and support information shall be separated and clearly labeled when submitted to the Engineer for approval. The submittal list supplied is intended to be comprehensive, but no claim for its completeness is implied and submittal of the complete list will not relieve the Contractor of supplying all the information needed or of complying with any of the other requirements of the plans or specifications. Revised lists may be issued and items may be added to the list supplied.

Manufacturer's specifications shall be supplied along with submittal list for all applicable products on the list.

Certificates of Compliance shall be submitted in accordance with Section 6-1.07, "Certificates of Compliance," of the Standard Specifications including the individual material specification of these Special Provisions.

Submittals shall contain:

1. The date of submission and the dates of any previous submissions, including identification of revision or re-submittals.
2. The Project title and number.
3. Contractor identification, names of subcontractors, suppliers and manufacturers.
4. Specification Section number(s) and Bid Item(s) which pertain.
5. Applicable standards, such as ASTM, Federal, or State Specification numbers. Certified test results indicating performance of materials/products with regard to Specification requirements.
6. A 5"x 3" blank space for Engineer's stamp.
7. The Contractor is required to initial or sign the submittal, certifying the review of submittals and verification of products, field construction criteria, and coordination of the information within the submittal and the project plans and specifications.

The General Contractor shall be required to review and approve all submittals and provide them signed as evidence thereof, prior to submitting to the Engineer for review. Submittals that are not signed by the General Contractor will be rejected. Submittals shall be numbered consecutively.

The preparation of plans, drawings, and necessary documents, as required by the following submittal lists, shall be considered as part of the requirements of other items of work and no additional compensation shall be allowed therefore.

The Engineer reserves the right to reject any item that does not fulfill the requirements of these plans, the Standard Specifications, and the Special Provisions.

The Engineer reserves the right to require additional submittals from the Contractor that are not specifically identified in the Materials Submittal List Table below. If so requested, the Contractor shall provide the Engineer with two (2) copies of any additional submittal.

Payment for compliance with Section 8, "Materials," shall be deemed included in the various other items of work and no additional compensation shall be allowed therefore.

TOWN OF LOS GATOS
Submittal List
Project #13-31 Almond Grove Street Reconstruction Phase II

General Submittals List:

DESCRIPTION
1. Progress schedule
2. Traffic control plan
3. Storm Water Pollution Prevention Plan and BMP's
4. PCC Pavement Quality Control Plan
5. Materials Submittals Binder
6. Construction Paving Plan
7. Advance construction notices for residents, property owners, businesses and schools
8. Video survey

Materials Submittals List:

DESCRIPTION	REQUIRED SUBMITTAL		
	DESCRIPTION/MIX DESIGN/PRODUCT CUT-SHEETS	MANUFACTURER/PRODUCER INSTALLATION INFORMATION	CERTIFICATE OF COMPLIANCE
1. Class 2 aggregate base	X		X
2. Minor concrete mix design – site work (sidewalk, curb & gutter, ramps)	X		X
3. Concrete mix design – driveways	X		X
4. Concrete mix design – pavement	X		X
5. Concrete cure – site work	X	X	X
6. Concrete cure – driveways	X	X	X
7. Concrete cure – pavement	X	X	X
8. Hydraulic cement grout	X	X	X
9. Diamond plate dowels	X	X	
10. PCC bond breaker	X	X	X
11. Joint filler material	X	X	X
12. Dowel bars			X
13. Hot mix asphalt – Type A, ½ Max	X		X
14. Asphalt binder	X		X

15. Tack coat	X		X
16. Cobblestones	X		
17. Cobblestone mortar mix	X	X	X
18. Trees	X		X
19. Top soil mix	X		X
20. Detectable warning surface	X	X	X
21. Centerline monument frame and cover	X		X
22. Storm drain inlet frame and cover	X		X
23. HPDE conduit	X		X
24. PVC conduit	X		X
25. Thermoplastic markings	X	X	X
26. Paint and glass beads	X	X	X
27. Pavement markers	X		X
28. Villa Hermosa Brick	X		
29. Crack fill epoxy	X	X	X
30. Spall repair epoxy	X	X	X

SECTION 9. DESCRIPTION OF WORK

Description of Work

The project includes Portland cement concrete (PCC) and asphalt concrete (AC) pavement demolition, demolition of PCC curb and gutter, sidewalk, ADA curb ramps, and driveways, subgrade preparation and grading, construction of PCC curb and gutter, sidewalk and driveways, PCC pavement, installing aggregate base, ADA curb ramps, construction of storm drain components, adjusting utility covers and boxes, tree removal and tree planting, landscaping, striping and signage, setting of centerline monuments, traffic control and environmental protection in the Almond Grove District in the Town of Los Gatos.

Locations of Work

The work that is to be performed is at the following locations within the Town of Los Gatos:

	Name	Begin Location	End Location
1.	Almendra Ave.	Massol Ave.	N. Santa Cruz Ave.
2.	Bayview Ave.	W. Main St.	Bean Ave.
3.	Bean Ave.	End	N. Santa Cruz Ave.
4.	Glen Ridge Ave.	Pennsylvania Ave.	Bachman Ave.
5.	Massol Ave.	Bean Ave.	Los Gatos-Saratoga Rd. (Hwy. 9)
6.	Nicholson Ave.	Glen Ridge Ave.	N. Santa Cruz Ave.
7.	Tait Ave.	W. Main St.	Los Gatos-Saratoga Rd. (Hwy. 9)
8.	Wilder Ave.	Bean Ave.	Bachman Ave.



TOWN OF LOS GATOS

TECHNICAL SPECIFICATIONS Part IV

SECTION 10 TECHNICAL PROVISIONS

SECTION 10-1 GENERAL CONSTRUCTION REQUIREMENTS

Order of Work/Project Phasing

Order of Work shall conform to the provisions in Section 5-1.05, "Order of Work," of the Standard Specifications and these Special Provisions.

At least twenty one (21) working days before any work is started, the Contractor shall furnish to the Engineer a written progress schedule for the work, listing the dates on which individual areas are to be subject to project related work and the extent of impact caused by the work. Additionally, the Contractor shall submit any request for approval for special traffic consideration including but not limited to lane closures, etc. The Contractor shall thenceforth adhere diligently to said written schedule in the prosecution of the work.

The Contractor will be required to submit a proposed street reconstruction phasing schedule that must be approved by the Town prior to commencement of work. The phasing schedule must take into consideration the following parameters:

- The Contractor must complete two (2) to three (3) streets each calendar year pursuant to the following yearly schedule, with all work completed by October 1, 2019:
 - o May 1, 2017 to October 1, 2017 (107 working days)
 - o May 1, 2018 to October 1, 2018 (107 working days)
 - o May 1, 2019 to October 1, 2019 (107 working days)
 - o Contractor may start earlier in years 2018 and 2019 weather permitting and upon receiving Town approval. Total number of working days will remain the same.
- The Contractor must first complete work on streets where no utility replacement work is proposed. No utility replacement work is proposed for Tait, Bayview and Glen Ridge.
- The Contractor will coordinate and cooperatively work with utility companies actively working to complete utility upgrades on the remaining five concrete streets. Remaining upgrades are to be complete by the winter of 2018.

The Contractor shall reconstruct the roadway one half roadway section at a time, unless otherwise allowed by the Engineer. The Contractor shall allow for one-way travel for local traffic on the roadway section not under construction and provide for parking on this section for residents who cannot access their driveways.

The Contractor shall ensure that construction does not interfere with the annual Cat's Hill Classic Bike Race. The race course includes the streets of Tait Ave., Bean Ave., Massol Ave., Nicholson Ave. and Bachman Ave. These streets must provide a continuous, safe paved surface for this bike race. This year's date is anticipated to be April 29, 2017. The Contractor shall verify future race dates with Barry Gordon from Cat's Hill Classic Bike Race at (408) 821-6014.

Attention is directed to Section 10-4, "Traffic Control Requirements," of these Technical Specifications.

All improvements shall meet current Americans with Disabilities Act Accessibility Guidelines (ADAAG) standards.

Each work season shall be treated as a separate project. All work scheduled for one work season must be completed prior to the work beginning in the next work season. Quantities for each yearly work season will be broken out at the start of the project. Individualized pay sheets, traffic control plans, pre-paving

conferences, construction paving plans, project schedules, submittals and record drawings will be provided for each yearly phase of work as needed. The Town will issue a separate Notice to Proceed for each yearly phase of work.

Cooperation

Attention is directed to Section 7-1.14, "Cooperation," and 8-1.10, "Utility and Non-Highway Facilities," of the Standard Specifications.

The Contractor shall coordinate with San Jose Water Company in relocation of their facilities as needed which may include, but is not limited to, installation of new water mains and water meter relocations. In addition, the Contractor shall allow for time for West Valley Sanitation District to TV all sewer laterals prior to placement of final street pavement section to verify no damage has occurred to the existing laterals. WVSD requires a minimum of five (5) working day advance notice prior to placement of the final roadway surface. Allow a minimum of one (1) working day for WVSD to complete their work.

It is the Contractor's responsibility to work with utility companies to coordinate the removal, relocation, raising to grade, installation of new facilities, or any other utility work as shown on the plans or indicated in the specifications with the appropriate utility company or as noted by the Engineer. The Contractor shall provide advance notification and shall allow sufficient time and work space for the utility company to complete the work necessary.

Adjustment of utility facilities to grade, and the installation of water meters, sanitary sewer cleanouts, and other utility work by others may be completed at the same time or subsequent to the Contractor's work on various portions of the project.

The Contractor shall cooperate and coordinate with others doing work near or at the site of work and shall be prepared to adjust his/her construction schedule in order to allow such work by others to be performed in a timely manner. It shall be understood that the nature of the work is such that the presence and activities of others in or near the site work cannot be precisely anticipated and it shall be understood also that the Contractor must have flexibility in the schedule to accommodate unexpected activities of others at the site of work. The Contractor will establish with each utility the lead time necessary for the utility work to occur and act as the lead to coordinate and help facilitate said work. In addition, the contractor shall determine their construction phasing of the project streets that best accommodates the utility companies' schedules.

If in the opinion of the Engineer, the Contractor's operations are delayed by reason of utility facilities not being removed or relocated, the Contractor will be entitled to an extension of time only. The Contractor shall be entitled to no other compensation for such delay.

Progress Schedule

The Contractor shall submit a project progress schedule for approval by the Engineer as noted in Section 8, "Materials, of the Special Provisions. Failure to submit an acceptable progress schedule is grounds for the Town's rejection of the Contractor's proposal. The progress schedule shall be in the form specified below unless otherwise specified in the Special Provisions or approved by the Engineer. Updated progress schedules shall be provided to the Engineer monthly with the estimates of work required in Section 9-1.16, "Progress Payments," of the Standard Specifications. Payments may be withheld until an updated schedule has been submitted and approved by the Engineer. Updated schedules shall incorporate all current schedule information, including actual progress, approved time adjustments, and proposed changes in sequence and logic.

Progress schedule shall show a minimum completion of two streets and maximum completion of three streets per year as outlined under the “Order of Work/Project Phasing section of these Special Provisions. Work must be complete each year on streets selected from end to end. Streets with no future utility work shall be completed first (Tait, Bayview, Glen Ridge). Additionally, the Contractor shall contact San Jose Water Company, West Valley Sanitation District, and Pacific Gas and Electric and include completion dates of utility work for other streets on the schedule (anticipated completion of all work is winter of 2018). The Contractor must maintain at least one east-west and one north-south route through the project area that is clear of construction activity. Construction sequencing shall occur in a manner that causes the least amount of inconvenience to residents.

The Contractor must furnish a computerized schedule prepared by the critical path method (CPM) which shows the order in which the Contractor proposes to carry out the work; the sequence and interdependence of construction activities; all salient features of the work (including procurement of materials and equipment); the dates on which the Contractor will start the salient features of the work; and the scheduled dates for completing the said salient features. The construction schedule shall include:

- a. Time for submittals and reviews;
- b. Time for fabrication and delivery of manufactured products for the work; and
- c. The interdependence of procurement and construction activities.

The construction schedule shall:

- a. Be a timescaled network diagram referenced to specific calendar dates;
- b. Include time for the Engineer to review submittals or inspect the work; and
- c. Identify the activities which constitute the controlling operations or critical path.

The construction schedule shall not contain multiple critical paths.

Scheduling of change order work is the responsibility of the Contractor. The Contractor shall revise the schedule to incorporate all activities involved in completing the change order work, and submit a new schedule to the Engineer for review.

Delays or changes to non-critical activities will not be considered for a contract time extension. Non-critical activities are those activities which when delayed, do not affect the contract completion time.

The project schedules submitted shall be consistent in all respects with the time and order of work requirements of the contract. The Engineer, at his or her sole discretion, retains the right to reject any and all construction schedules submitted by the Contractor, including when the Engineer determines that the Contractor has too many items on the Critical Path, or the logic of the schedule is in error, or if the Engineer determines salient items of work are missing from the schedule.

Subject to the above provisions, nothing herein shall preclude the Contractor from early completion of the contract.

The Contractor shall submit updated progress schedules to the Engineer as a condition of approval for the monthly progress payments and final acceptance. Schedule should show work contemplated that can be accomplished based on current weather reports. If there is a need to postpone work due to upcoming rain events, the Contractor will be allowed additional time but not additional compensation.

Record Drawings

The Contractor shall keep and maintain on the job site, one record set of drawings. On these, the Contractor shall mark all project conditions, locations, configurations, and any other changes or deviations which may vary from the details represented on the original contract documents, including buried or concealed construction and utility features which are installed or revealed during the course of construction. Final payment will not be approved until the Contractor prepared record drawings have been delivered to the Engineer.

General Measurement and Payment Requirements

The Contractor shall submit all field quantities completed to date for payment with each monthly pay estimate. The Contractor shall provide, in writing, which member from their team will be responsible for field measuring quantities with the Town's representative. Upon completion of a contract bid item for each yearly work season, the Contractor's representative shall field measure the final quantities with the Town's representative. This agreed upon amount will be considered final and no re-measuring of these field quantities will be allowed without the approval of the Engineer. All supporting documentation required for payment of an item, shall be submitted by the Contractor within two pay periods following the work. Documentation submitted more than two pay periods after the work was completed will not be paid and the cost of this work shall be borne by the Contractor.

Hours of Work

Unless otherwise approved in writing by the Engineer or specified in these Special Provisions, the hours of work for this project are Monday through Friday, 8:00 AM to 5:00 PM. Pavement joint sawing operations shall be scheduled and coordinated with the Engineer on a daily basis prior to start of paving operations. Joint sawing may occur outside the specified work hours and shall be performed when the concrete reaches the strength to allow joint sawing. Residents shall be informed in advance when joint sawing is likely to occur.

The work hours will be strictly enforced. The Engineer has full authority to implement the working hours and completely shut down the construction operations outside the hours of work specified. Should the provisions of this section not be met, liquidated damages of Five Hundred Dollars (\$500.00) for every 60 minute time period (or portion thereof) beyond the hours of work allowable shall be withheld from moneys due to the Contractor.

24 Hour Contact Number/Supervision

The Contractor shall assign a qualified project superintendent who has the complete authority to make decisions on behalf of the Contractor. The project superintendent shall be on the job at all times during construction (until all work crews have left the job) and shall be available and on call 24 hours a day for the duration of the project. The superintendent job duties shall be assigned to one individual. Assigning more than one superintendent to the project shall not be allowed. The Contractor shall provide to the Engineer and to the Los Gatos-Monte Sereno Police Department a 24-hour contact number for the project superintendent. This number shall not direct calls to a recorder or other message taking service.

Advance Public Notification and Outreach

Contractor shall give advance notice to residents a minimum of two weeks prior to beginning any work on any given street. All adjacent property owners, tenants, businesses, as well as any residents or businesses on side streets whose access is directly off of the street to be reconstructed shall be notified by mail by the Contractor. Notices shall be both mailed and hand delivered by the Contractor to those properties on the streets to be reconstructed. The Town will provide resident mailing addresses for the Contractor. Individual or separate advance notices shall also be given for construction activity in an area which will, in any way, inconvenience any resident/property owner/tenant or affect their operations or access to their properties. All notices shall include the expected date for start of construction, a general description of the construction activity to take place, expected duration of the activity, and the name,

address, and contact number of the Contractor's superintendent and the Town of Los Gatos Parks and Public Works Department. The Contractor shall provide accurate information regarding the construction schedule and activities to be incorporated into the two week notification. The Contractor shall make every effort to coordinate work with individual residents and businesses whose access will be disrupted in order to minimize the disruption and impacts on the resident or business.

The Contractor shall also provide and hand-deliver a two day "follow-up" notice. The follow-up notice shall be distributed two days before the start of work. The "follow-up" notice shall be delivered to all adjoining residents and businesses, tenants, and other applicable parties listed below and any other properties whose sole ingress/egress is through the project's work area.

The Contractor shall provide a special notification, as needed, five working days before October 31, of each year to provide information about any possible access issues for the public visiting the neighborhood for the Almond Grove Halloween event. The Contractor shall, to the satisfaction of the Engineer, provide suitable walking surfacing for the visiting public during this event which allows for ADA access to the fullest extent possible.

Copies of all notices shall be provided to the Engineer for approval five (5) working days prior to the desired distribution date.

Should the Contractor's schedule change and/or differ in any capacity from the schedule initially mentioned in the notification to the resident/property owner/tenant or from the updates to the Town website, the Contractor shall re-notify all applicable parties (residents/property owner/tenant and/or businesses mentioned below) five (5) working days prior to the beginning of any work on that street.

The Contractor shall contact and coordinate the work with the following parties throughout the project. The two week and two day notification shall also be given to the following parties prior to beginning any work:

Santa Clara Valley Transportation Agency – Steve Newgren – (408) 952-4106
West Valley Collection and Recycling, LLC. – (408) 283-8500
U.S. Postal Service – Post Master – (408) 395-7526
Los Gatos/Monte Sereno Police Department – (408) 354-8600
Santa Clara County Fire Department – (408) 378-4010
AT&T – Laura Wendover – (408) 635-8835
PG&E – Esteban Macias – (408) 725-3326
SJWC – Charles Kemp – (408) 279-7864
WVSD – Alan Kam – (408) 385-3030

The Contractor shall also give written notice to residents/ businesses for any driveway and walkway closures or anticipated service disruptions. The Contractor shall coordinate all disruptions with the appropriate utility, property owner, resident, business and the Town. Notice shall be given in advance and specify the duration of the disruption of any utility, and the temporary closure of access to any driveway. Such notice will comply with the requirements for closure of driveway access as specified under Special Provision Section 10-4, "Traffic Control Requirements."

Lack of proper advance notification and coordination may result in the work being shut down. All costs associated with the stoppage of work shall be borne by the Contractor.

The Contractor shall conduct a public outreach meeting for the residents of each street within the project, before the start of construction. A total of eight meetings shall be conducted. These meetings shall

provide information on construction schedule and staging, construction impacts, property access and impacts, and traffic circulation. The project superintendent and foreman shall be in attendance at these meetings. These outreach meetings will be held in the Town Council Chambers.

The Contractor shall reach out to individual residents to verify which residents will need special accommodations during the project due to disabilities or other special circumstances, and shall provide accommodations as necessary during construction. The Contractor shall ensure appropriate ADA access at all times to their homes and work with the residents to provide other suitable accommodations as needed.

Line and Grade

The Contractor shall layout the project by providing all stakes and marks needed to establish the lines and grades required for completion of the work specified on the Plans and in these Special Provisions to the satisfaction of the Engineer. Town shall provide design survey files to the Contractor's surveyor. Contractor shall provide station and off-sets matching the plan set a minimum of five (5) calendar days before beginning work on a roadway section.

Meetings

Prior to commencement of any work on each yearly work season for the project, a pre-construction conference will be scheduled by the Town and held at the Town for the purpose of review and discussion of the project schedule and construction procedures. The conference shall be held three weeks before the start of work. The Contractor's project manager and project superintendent and representatives from all listed subcontractors shall be required to attend the pre-construction conference. The Contractor shall prepare and submit prior to the pre-construction meeting the proposed project schedule, water pollution control plan, traffic control plan, public notification letter, and other submittals as specified under Section 8, "Materials," of the Special Provisions.

The Town will schedule and conduct weekly field meetings at locations to be determined by the Town. The Contractor and all subcontractors working on the project shall attend each weekly meeting. The meetings will include discussions of scheduled work on the project during the week of the meeting. The Town shall notify the Contractor of the time, date, and location of these meetings.. At the weekly meeting, the Contractor shall provide a detailed explanation of the work to take place during the current week and provide a two week look ahead schedule at each weekly meeting, outlining work planned for the following two weeks suitable for posting on the Town's website.

Waste Haulers and Recycling Operations

The Contractor shall not impair or impede waste hauler and recycling operations scheduled to be conducted within the project area. It is the Contractor's responsibility to determine which waste hauler and recycling operators are scheduled to operate within the project area, and to develop a project schedule that will not impair or impede the waste hauler or recycling operations.

Contractor will discuss each paving plan with the collection companies and determine how the collection company will collect from residents when the street is torn up and traffic is one-way or blocked prior to the pre-paving meeting held with the Town. Contractor will present the plan at each pre-paving meeting outlining what specific actions will be implemented by the Contractor to provide access for the collection company.

Project Appearance and Street Sweeping

The Contractor shall maintain a neat appearance to the work site. Debris developed during construction shall be disposed concurrently with its generation. Stockpiling of debris or construction materials shall not be allowed unless otherwise approved by the Engineer.

The Town prohibits the use of any public property or public rights of way locations as construction staging points, unless specifically approved by the Engineer.

Right-of-Way

The Contractor shall operate within public right-of-way only, with the exception of driveway conforms that extend beyond the public right of way as shown on the plans.

Tree Trimming

If existing trees or shrubs, including median island planting, and private trees, encroach into the public right-of-way and threaten to obstruct the Contractor's operation, the Contractor shall request permission to trim existing trees or shrubs, at least five (5) working days prior to the date of scheduled tree trimming. All tree and shrub trimming must have prior approval of the Engineer and shall be performed by a Contractor possessing a C-27 or a D-49 license. All costs for tree or shrub trimming and proper disposal shall be paid for as provided in Section 10-3, "Clearing, Grubbing and Environmental Protection."

A special notice pertaining to the tree trimming shall be delivered to the adjacent home or business at least two (2) working days before the tree is trimmed. The notice shall be reviewed and approved by the Engineer before delivery.

Tree trimming shall meet the Town's Tree Protection requirements, Division 2 Tree Protection of Town Code Chapter 29 Zoning Requirements, <http://www.losgatosca.gov/DocumentCenter/View/148>.

Landscaping Obstruction

In the event that there are landscaping obstructions such as ivy, lawn, juniper branches, grass, or other encroaching vegetation, the Contractor shall trim or prune such obstruction only to the extent necessary to conduct the installation of improvements in the public right-of-way. Landscaping or other improvements outside the limits of work shall be protected by the Contractor and shall be replaced in kind if the Contractor's operations damage the existing improvements. If the Contractor fails to comply in providing the necessary replacement as defined, the Engineer may elect to have the Town or contract forces perform all these duties deducting all the expenses incurred from any moneys that are due, or to become due, to the Contractor. By exercising this option, the Contractor is in no way relieved of the responsibilities to perform these duties.

Staging/Disposal Areas

The Contractor shall survey the area for construction staging. Staging areas shall not be located in a residential area.

The following requirements shall apply to the contractor's staging area:

- No stockpiles or staging area will be allowed in the right-of-way or on undeveloped lots unless specifically approved by the Engineer
- The staging area will be included in the Contractor's SWPPP
- The staging area will not be located in an environmentally or culturally sensitive area and/or impact water resources (rivers, streams, bays, inlets, lakes, drainage sloughs).
- The staging area will not be located in a regulatory floodway or within the base floodplain (100-year).
- The staging area will not affect access to properties or roadways.

The Contractor shall obtain the approval of the Engineer before staging equipment or storing materials in the public right-of-way or on Town property. In addition, the Contractor shall provide proof of an agreement when using private property for staging, if requested by the Engineer.

All debris shall be hauled off and disposed of the same working day in which the material was generated.

Personal vehicles of the Contractor's employees shall not be parked in the neighborhood or on the traveled way. When entering or leaving roadways carrying public traffic, the Contractor's equipment, whether empty or loaded, shall in all cases yield to public traffic and shall travel in the normal direction of travel.

Dust Control

The following requirements shall be applicable to this contract in lieu of the requirements of Section 10, "Dust Control," of the Standard Specifications.

- A. The Contractor shall provide an acceptable plan for preventing the generation of dust due to the Contractor's operations in the construction zones, along the haul routes, or equipment parking areas. This plan may consist of water sprinkling sweepers or an equivalent service. No separate payment will be made for dust control and all costs in connection therewith shall be included in the payment items to which the work is incidental.
- B. In the event the control of dust is not satisfactory to the Town, the Town shall take such measures as may be necessary to insure satisfactory dust control and deduct the cost of such measures from any payments due to the Contractor.

Water for Construction

The costs of water as required for the construction and post-construction on this project, including dust control, shall be considered as included in the costs of items bid for applicable item of work and no separate payment will be made therefor. The Contractor shall conform to the requirements of the water company from which water is purchased. In no case shall the Contractor violate the Town's Urgency Water Ordinance.

Sanitation

The Contractor shall provide for sanitary facilities for the use of the workers on the job. Such facilities shall be placed and maintained by the Contractor so as not to be aesthetically displeasing, annoying to the neighbors, nor offensive to the senses nor the community standards of decency. The Engineer shall be the sole judge of the adequacy of the facility, the placement, and the maintenance thereof. Upon notification by the Engineer of deficiencies in any of these areas, the Contractor shall make immediate corrections. Failure to take corrective action within 24 hours shall give the Engineer due cause to stop the work in the contract and to order the corrective work to be done on the sanitary facility and to charge all costs of such work against the monies due or to become due to the Contractor.

Electric Blowers

The use of gasoline leaf blowers is prohibited. The Contractor shall use electric leaf blowers that shall not exceed 65 decibels in all residential, commercial, and industrial zones or public space, measured 50 feet from the source. The Contractor shall comply with the requirements as set forth in the Town of Los Gatos Ordinance 2231.

Protect Existing Facilities to Remain

Existing Facilities shall conform to Section 15, "Existing Facilities," of the Standard Specifications, the plans and these Special Provisions and all other applicable project specifications.

The Contractor shall work around and protect all existing improvements to remain, including but not limited to existing utilities, monumentation, bench marks, storm drainage facilities, utility vaults, traffic detector loops, home runs and handholes, concrete and asphalt concrete pavement, pavement markings, landscaping, irrigation facilities, and appurtenances that are within or adjacent to the construction areas.

Not all existing utility lines are shown on plans. Contractor is responsible for verification of all existing utilities in the field prior to all construction activities. Call Underground Service Alert (USA) 800-227-2600 before starting any excavations. Notification shall be in full compliance with USA. It is the sole responsibility of the Contractor to verify existence of and protect all existing utilities during construction. Any damage to an existing utility will be repaired at the expense of the Contractor.

At the conclusion of the project, the Contractor must remove all USA markings from all paved and concrete surfaces throughout the job site without damaging said surfaces. The method of removing the USA markings is at the Contractor's discretion.

It is the responsibility of the Contractor to protect any existing utility boxes. Any cracked or broken boxes shall be brought to the attention of the Town inspector prior to any work. The Contractor shall protect existing electroliers when placing construction signs.

The Contractor shall immediately repair or remove and replace any item damaged or injured by his operations at his sole expense and to the satisfaction of the Engineer. The Contractor shall immediately notify the appropriate owner of the improvement or facility and the Engineer of any damage as a result of his operations to existing improvements or facilities. If the improvement belongs to a private residence and the property owner or occupant is not at home, such notification shall be attached to the front door of the property. All underground facilities that are damaged by the Contractor during construction shall be restored by the Contractor within two (2) hours after the damage is done.

All existing improvements, including but not limited to, irrigation systems, brick work, stone work, fences, mailboxes, turf and landscaping, on public right-of-way which are obstacles to forming operations may be removed as necessary for this type of work. The Contractor shall notify the adjacent property owner and the Engineer prior to removal of any existing improvements. After removing the forms, all the existing improvements shall be restored to their original condition at no additional cost to the Town except as noted in the Plans or as directed by the Engineer. Contractor will not be required to restore hardscape in the planter strips. If the Contractor fails to comply in providing the necessary restoration work as defined, the Engineer may elect to have the Town or other contract forces perform all these duties, deducting all the expenses incurred from any moneys that are due, or to become due, to the Contractor. By exercising this option, the Contractor is in no way relieved of the responsibilities to perform these duties.

Contractor shall document existing irrigation systems in the public right of way and any facilities immediately adjacent to the public right of way. All irrigation systems shall be restored to the documented pre-existing condition, unless otherwise approved by the Engineer.

Location of Existing Facilities

Contractor shall verify by potholing method the horizontal locations and depth of all existing utilities (mains and laterals) and conduit (traffic signal, interconnect, street lighting, fiber optic, etc.) to ensure that they do not interfere with the proposed improvements as shown on the plans and as mentioned in these Special Provisions. The Contractor shall pothole prior to the actual commencement of the construction activities. Any conflicts shall be immediately reported to the Engineer. The Contractor shall allow a minimum of 2-working days for the Town to respond to any conflicts discovered. The Contractor shall

coordinate any required utility relocation work directly with the appropriate utility company. Attention is also directed to the locations of shallow utilities on the Project Plans.

The Contractor is advised that utilities may have minimal cover and extreme care is to be used to verify the locations of these facilities prior to any work near such facility.

Video Survey

The Contractor shall submit a video of the job site to the Engineer, for review, immediately prior to the start of each yearly work season, for the purpose of providing a record of existing conditions. Only DVD format and new DVDs shall be used. Each DVD shall be labeled and dated appropriately. The DVD shall provide a view encompassing the entire project area, including all adjoining facilities to remain, sidewalks, driveways, walkways, street signs, trees, landscaping, irrigation systems, cabinetry and pull boxes, including all excavation areas prior to excavation, with sufficient clarity and scope to the satisfaction of the Engineer. The Contractor shall submit these DVDs with a written log noting any existing defects or irregularities in the existing improvements. The log shall also state the location (by station), date, and time the DVDs were made. Upon receipt by the Engineer, the DVDs shall become the property of the Town.

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work involved in compliance with the Plans, Specifications and Special Provisions of Section 10-1, "General Construction Requirements," shall be deemed included in the price paid for other contract items and no additional compensation shall be allowed therefor.

SECTION 10-2 MOBILIZATION

General

Mobilization shall consist of preparatory work and operations, including, but not limited to those necessary for the movement of personnel, equipment, supplies, and incidentals to the project site; for the establishment of all offices, buildings and other facilities necessary for work on the project; and for all other work and operations which must be performed or costs incurred prior to beginning work on the various contract items on the project site; and for obtaining permits, insurance, and bonds as required for the proper performance and completion of the work.

This item includes any de-mobilization and re-mobilization that may be required for completing various stages of work or for the suspension of work.

Measurement and Payment

Full compensation for furnishing all labor and materials, including tools, equipment, and incidentals, and for performing all of the work involved in placing, removing, storing, maintaining, moving to new locations, replacing and disposing of equipment and materials as specified in the Town Standard Specifications, the Standard Specifications, as directed by the Engineer and Section 10-2, "Mobilization," shall be included in the lump sum (L.S.) price paid for:

**MOBILIZATION (L.S.)
(MAX. 4% OF THE CONTRACT PRICE)**

BID ITEM #1

The contract lump sum price for Mobilization shall not exceed 4% of the total contract amount. Payment will be based on a percentage of the job complete as noted in the Standard Specifications for each yearly phase of work, as approved in the project progress schedule.

SECTION 10-3 CLEARING, GRUBBING AND ENVIRONMENTAL PROTECTION

General

The work shall conform to the requirements of Section 16, "Clearing and Grubbing," of the 2010 State of California Standard Specifications and the following. In case of conflict, this provision or the decision of the Engineer shall prevail.

Clearing and grubbing shall consist of removal and disposal of existing planter softscape, shrubs, trees with a diameter smaller than 6 inches, and other unsuitable material within the project area. The limits of clearing and grubbing shall be of sufficient area and depth to complete the work as shown on the plans or described in the Special Provisions.

Unless otherwise specified, the Contractor shall protect trees as specified at his expense. Trees to be removed shall be removed in such a manner as to not injure standing trees, plants and improvements which are to be preserved.

Tree removals shall meet the Town's Tree Protection requirements, Division 2 Tree Protection of Town Code Chapter 29 Zoning Requirements, <http://www.losgatosca.gov/DocumentCenter/View/148>.

Improvements scheduled to remain that are damaged during the work shall be replaced at no cost to the Town.

Any existing materials that are designated to be salvaged shall be removed, cleaned and stored by the Contractor unless another location is specified.

Unless otherwise specified, all materials as shown on the drawings to be removed, or as field marked and as directed by the Engineer to be removed shall be disposed of outside the project limits in a legal manner. The contract work area shall be left with a neat and finished appearance.

Debris shall not be stored or permitted to accumulate on site. If Contractor fails to remove excess debris promptly, Town reserves right to cause same to be removed at Contractor's expense.

Residue from cutting operations shall not be permitted to flow into storm drains or across lanes occupied by traffic and shall be removed from the pavement surface, concurrent with the cutting operation.

Planter strips shall be graded to remove large dirt clods, roots and rocks to a diameter of 2.5". Clean fill will be added to planter strips as needed to meet adjacent grades.

Environmental Protection-Storm Water Pollution Control

Water pollution control work shall conform to the provisions in Section 13, "Water Pollution Control," of the 2010 Standard Specifications, and as described herein. The SWPPP shall be prepared in accordance with the California Construction General Permit (SWRCB Orders No. 2009-009-DWQ as amended by Order 2010-0014-DWQ and Order 2012-0006-DWQ)

Attention is directed to Section 13, "Water Pollution Control," of the 2010 State Standard Specifications, and these Special Provisions. A Storm Water Pollution Prevention Plan (SWPPP) must be submitted and approved by the Engineer prior to start of work. The SWPPP shall be prepared by a Qualified SWPPP Developer (QSD) and all work associated with implementing the SWPPP shall be carried out by a Qualified SWPPP Practitioner (QSP). The plan shall contain measures necessary to keep all substances used in or resulting from the work out of the gutters, storm drains and creeks, including but not limited to: employee and sub-contractor training and instruction, dry cleanup of spills, wet-vacuum of saw cutting

slurry, proper disposal of cement and paint, proper handling of hazardous materials and hazardous waste, blocking of storm drains, shoveling dirt and debris from gutters, covering materials stored outside, sweeping pavements and approach streets, and erosion controls (straw bales, silt fences, detention basins, etc.) at grading sites. It shall be the Contractor's responsibility to monitor and maintain all such measures on a daily or more frequent basis, including on non-work days and during storms. In addition, all catch basins at the project site, and which are determined by the Engineer to have been affected by the construction, shall be cleaned out by the Contractor at the end of the project. The Contractor shall supply the QSP and all other work related to the development and implementation of the SWPPP. The Contractor shall provide copies of all reports required by the SWPPP to the Town. End date of SWPPP document must coincide with end date of the project based on the working days allowed, not an early completion date anticipated by the Contractor.

All fueling and maintenance of vehicles and other equipment shall occur at least 60 feet from any riparian habitat or water body.

Erosion control measures (BMP's) shall be installed at the cut and fill slopes resulting from the excavation and grading operations. The Contractor shall install erosion control blankets, wattles, silt fences, construction entrances, and other measures as required according to the Caltrans Construction Site Best Management Practices (BMPs) Manual and as outlined in the SWPPP. Erosion control materials shall not include plastic monofilament mesh or other features that might lead to entrapment, injury, or death of protected species.

The Contractor shall be responsible for ensuring that all work conforms to the "Best Management Practices for the Construction Industry" found in the Santa Clara Valley Urban Runoff Pollution Prevention Program, Storm Water Pollution Prevention Plan (SWPPP), the "Blueprint for a Clean Bay" handout, and the Town Code.

The Contractor shall comply with the requirements of the State Water Resource Control Board (SWRCB) National Pollutant Discharge Elimination System (NPDES) General Permit for Storm Water Discharge Associated with Construction and Land Disturbance Activities.

The Contractor shall not violate any discharge prohibition contained in the California Regional Water Quality Control Board San Francisco Bay Basin Water Quality Control Plan ("Basin Plan").

A storm water information handout, "Blueprint for a Clean Bay," has been prepared for this contract and is available in Appendix C.

The notice of intent (NOI) will be prepared by the Contractor's QSD/QSP to be filed by the Town. The notice of termination (NOT) including but not limited to the annual report shall be submitted by the Contractor

Measurement and Payment

Full compensation for furnishing all labor and materials, including tools, equipment, and incidentals, and for performing all of the work involved in clearing and grubbing as specified in the Town Standard Specifications, the Standard Specifications, as directed by the Engineer and Section 10-3, "Clearing, Grubbing and Environmental Protection," of the Technical Specifications including and not limited to planter strip work, shall be included in the lump sum (L.S.) price paid for:

CLEARING AND GRUBBING (L.S.)

BID ITEM #2

The basis for payment for Bid Item: Clearing and Grubbing will be based on the percentage of this item complete in each progress payment.

Full compensation for furnishing all labor and materials, including tools, equipment, and incidentals, and for performing all of the work involved in environmental protection, preparation and any revisions required of the SWPPP, sampling and testing if required, installing and maintaining BMPs for the duration of the project, monitoring, and reporting (SMARTS) as required by the SWPPP and as specified in the Town Standard Specifications, the Standard Specifications, as directed by the Engineer and Section 10-3, "Clearing, Grubbing and Environmental Protection," of the Technical Specifications shall be included in the Lump Sum (L.S.) price paid for:

**ENVIRONMENTAL PROTECTION – STORM WATER
POLLUTION PREVENTION PLAN (L.S.)**

BID ITEM #3

The basis for payment for Bid Item: Environmental Protection will be based on the percentage of job completed in each progress payment.

SECTION 10-4 TRAFFIC CONTROL REQUIREMENTS

General

Traffic control shall conform to the provisions of Section 12, "Temporary Traffic Control," of the 2010 Standard Specifications, the California Manual on Uniform Traffic Control Devices (MUTCD) latest edition and these Special Provisions. Nothing in these Special Provisions shall be construed as relieving the Contractor from the responsibilities specified in Section 7-1.04, "Public Safety," of the 2010 Standard Specifications and of these Special Provisions.

The Contractor shall maintain a safe workplace throughout the job including, but not limited to, providing all flaggers, safety equipment, flashing arrow boards, four changeable message signs with power source, traffic control devices; maintenance of barricades, safe pedestrian passages along sidewalks, maintenance of handicap access throughout the project site where applicable and maintenance of pavement within the limits of the roadway and driveways with a suitable traffic bearing surface.

Pedestrian and vehicular access shall be maintained at all times except as described elsewhere in these Technical Specifications and as authorized by the Engineer. The Contractor shall provide and maintain all necessary traffic control devices to ensure safe pedestrian and vehicular access through and around the job site. Warning signs shall be installed at locations in accordance with the "MUTCD for Streets and Highways – Part 6: Temporary Traffic Control 2014, Revision 1." The Contractor shall fulfill the requirements of this section, 24 hours per day, seven days a week, including holidays, from the time the Notice to Proceed is issued until the project is formally accepted.

Should the Contractor fail to perform these duties, the Engineer, at the Engineer's sole discretion, may elect to have Town, or contract forces, perform the duties, deducting the expenses incurred from any moneys that are due, or to become due, to the Contractor. By exercising this option, the Contractor is in no way relieved of the responsibility to perform these duties.

The Contractor shall provide a minimum of two competent and qualified flaggers dedicated solely to directing traffic if traffic lanes have been reduced to only one lane for two way traffic, in and out of driveways and cross-streets and/or across the construction area as deemed to ensure safe traffic control during construction operations. Flaggers shall be equipped with all necessary tools to properly control the traffic.

Traffic Control/Management Plan

A detailed traffic control plan shall be submitted by the Contractor to the Engineer in advance of the pre-construction meetings. The traffic control plan must be prepared by a Professional Traffic Operations Engineer (PTOE) or a Traffic Control Supervisor (TCS) certified by the American Traffic Safety Services Association (ATSSA). The traffic control plan shall be reviewed and accepted by the Engineer prior to any work commencing on the project. All traffic plans shall be prepared in accordance with the State of California Department of Transportation "California Manual on Uniform Traffic Control Devices for Streets and Highways – Part 6: Temporary Traffic Control 2014," Section 12 "Temporary Traffic Control," of the Standard Specifications and these Special Provisions.

No Parking Signs

Prior to the start of work which requires parking restriction, the Contractor shall request approval to post and maintain temporary "No Parking" signs on each street where the operations will take place. It shall be the Contractor's responsibility to post "No Parking" signs in the areas where the Contractor's work will require restricted parking. The Town will provide signs for the Contractor's use. To be enforceable, the signs must be posted not less than 72 hours prior to the start of the work at a maximum spacing of 60 feet. The signs must clearly show the date(s) and hours of the parking prohibition, as well as the date and time the signs were posted and the project name and contractor's phone number. If the work is not performed during the timeframe indicated on the "No Parking" signs, the work will be rescheduled with at least five (5) working days advance notice. The Contractor shall perform all re-posting of "No Parking" signs and re-notification of businesses, tenants, and residents as a result of his failure to meet the posted schedule. Any delays caused by failure of the Contractor to adhere to the approved schedule will be at the Contractor's sole expense. No additional compensation will be allowed for costs resulting from said delays.

The Contractor shall remove the "No Parking" signs immediately when they are no longer needed for use in the respective area of the project. The Contractor shall notify the Los Gatos/Monte Sereno Police Department directly after posting, and immediately upon removal of the said signs at (408) 354-8600.

During the morning of each scheduled work day, the Contractor shall be responsible for calling the Los Gatos/Monte Sereno Police Department Police Dispatch to tow cars, if necessary. The Contractor shall have available for the police responding to the call photo documentation of the "No Parking" signs being posted – if the signs were removed or vandalized the previous night.

Detours, Temporary Striping, and Barriers

Any approved detours or barriers, signing and striping necessary to complete the construction of the project shall be provided, installed, maintained, and removed by the Contractor at his expense. Temporary striping shall be self-sticking traffic marking tape, vinyl or otherwise, developed for such use, and shall be used for temporary striping as required, unless shown otherwise on the plans or specified in the special provisions. No painted temporary striping or markings will be allowed unless the temporary markings will be entirely covered by the permanent markings.

Notify the Los Gatos/Monte Sereno Police Department daily at (408) 354-8600 of street or lane closures or detours within the roadway prior to setting up and upon removal of traffic control devices.

Additional Construction Area Signs and Controls

In addition to the requirements of Part 6, "Temporary Traffic Control of the California MUTCD 2014 Edition, Revision 1," the following traffic controls will be required as specified by the Engineer. These additional requirements in no way relieve the Contractor from his obligation to comply with the standards set forth in that manual.

- "Road Work Ahead" C23 (CA) signs shall be posted in advance of the first major cross street before the start of the work zone to allow traffic to avoid the work zone prior to entering the zone. The signs shall also be posted at the approaches to the project site.
- "End Road Work" G20-2 signs shall be placed at all public road exits from the project site.
- The Contractor shall provide, install and maintain clean and stable lighted barricades for each individual construction site for improvements (i.e. for pavement, sidewalk, curb and gutter removal & replacement and for accessibility ramp installation). Barricades that are damaged shall be removed from the job site immediately and replaced with undamaged barricades. Lights on barricades shall be checked weekly and replaced if necessary.
- Changeable message board signs will be used starting a minimum of one (1) week prior to construction beginning and will be maintained in place until construction impacts to the public no longer exist as determined by the Engineer. A minimum of two changeable message boards per street under construction shall be provided by the contractor for use for the duration of the project. Actual use of the message boards shall be as indicated on the traffic control plans or as otherwise approved by the Engineer.

The Contractor shall be responsible for locating existing poles on which to mount signs, or shall provide temporary stands or poles on which to place the required signs. The Engineer shall approve the method of attachment to existing poles prior to sign installation. No sign shall be mounted on decorative street light poles unless the Contractor can clearly show that the mounting method will not damage the finish on the poles.

Upon completion of the work, the construction area signs and controls, including any temporary stands or poles, shall be removed and disposed of in conformance with the provisions in Section 7-1.13 of the Standard Specifications.

The Contractor shall provide, install, and maintain two metal construction signs at the ends of each street being reconstructed, including temporary sign posts that read as follows:

*ALMOND GROVE STREET RECONSTRUCTION PROJECT
(STREET NAME) OPEN TO LOCAL TRAFFIC ONLY
PARKING BY PERMIT ONLY
CONSTRUCTION FROM _____ 201X TO _____ 201X
YOUR COOPERATION IS APPRECIATED
FOR INFORMATION CALL
TOWN OF LOS GATOS (408) 399-5770*

Sign base shall be durable, relocatable and able to withstand significant winds and weathering. The Engineer shall approve final sign before fabrication. Lettering shall be a minimum of four inches (4") tall and shall be black lettering on an orange background as specified by the Engineer. The sign shall be placed at the project limits as directed by the Engineer. Signs and posts shall be maintained throughout the construction of the project. Dates shall be updated immediately should they change. The Contractor shall remove all signs and posts upon completion of the project and the area shall be returned to pre-construction condition.

Maintenance of Pedestrian Access and Circulation

Safe pedestrian access and circulation shall be maintained by the Contractor through or around the project area. For all walkways, pedestrian crossings, ramps and other pedestrian facilities removed or blocked by the Contractor's operations temporary facilities shall be provided unless otherwise approved by the Engineer. Drop offs greater than 1" in walking areas shall be ramped.

Drop off from existing improvements to excavated areas at crossings shall be temporarily ramped as soon as excavation work in this area is complete and passage is safe. Ramps shall be maintained at 12:1 or flatter with compacted sub-grade or base rock material until final improvements are installed.

Allowable Road Closures

The Contractor shall be allowed to close streets in the area of construction except for local traffic only, during roadway concrete pavement placement, upon approval of a traffic control plan showing how detours for traffic will be implemented and maintained and how local traffic access will be handled. The Contractor must maintain access at all times for emergency vehicles and local residents. All detours must be maintained by the Contractor. The Contractor shall notify the Los Gatos/Monte Sereno Police Department at (408) 354-8600 prior to implementation of any and all road detours and road closures and again immediately following the removal of the road detour or road closure.

The Contractor must maintain at least one east-west and one north-south route through the project area that is clear of construction activity. Construction sequencing shall occur in a manner that causes the least amount of inconvenience to residents.

Lane Closures

Requests for lane closures shall be made a minimum of five working days prior to the proposed closure. Once the lane closure has been approved by the Town, the Contractor shall post a minimum of five (5) working days in advance of the proposed lane closure changeable message board signs at the limits of each closure or as specified by the Engineer. These changeable message board signs shall also be used on the day of the actual closure. The changeable message board signs shall indicate the days and hours of the proposed lane closure and the type of work being done during that lane closure.

Flashing arrow signs shall be used for all lane closures. The Contractor shall check with the Engineer to confirm any lane closure restrictions that may be in effect before closing any lanes.

The Contractor shall leave the streets open to traffic until just prior to starting the work, and will provide all barricades, signs and traffic control measures necessary to protect the work.

No work that interferes with public traffic shall be performed prior to 8:00 AM or after 5:00 PM, except as otherwise approved by the Engineer.

The Contractor shall reconstruct the roadway one half roadway section at a time, unless otherwise allowed by the Engineer. The contractor shall allow for one-way travel for local traffic on the roadway section not under construction and provide for parking on this section for residents who cannot access their driveways.

A minimum of one paved traffic lane and one paved parking lane, not less than seventeen (17) feet wide (10 foot wide for the traveled vehicle lane and 7 feet wide for the parking lane), shall be open for use by public traffic in one direction of travel. Traffic may not be routed over unpaved roadways unless authorized by the Engineer.

Deviations from the requirements of this section concerning hours of work, which do not change the cost of the work, may be permitted upon the written request of the Contractor, if in the opinion of the Engineer, the general public will be better served and the work expedited. Such deviations shall not be implemented until the Engineer has provided the Contractor with written approval to do so. All other modifications will be made by contract change order.

The Contractor shall pay the Town liquidated damages in the amount of \$500.00 per hour (or part of an hour) for traffic control that is set-up before the designated and approved hours of work. Liquidated damages for failure to open streets by the required time shall be \$500.00 per hour.

Traffic Control System for Lane Closure

A traffic control system shall consist of closing traffic lanes in accordance with the details shown on Caltrans Standard Plans T-11, T-12, and T-13 as shown in Appendix A, the provisions of Section 12, “Temporary Traffic Control,” of the Standard Specifications, and under these Special Provisions.

The provisions in this section will not relieve the Contractor from the responsibility to provide additional devices or take measures as may be necessary to comply with the provisions of Section 7-1.04, “Public Safety,” of the Standard Specifications.

Each vehicle used to place, maintain and remove components of a traffic control system on multilane roads shall be equipped with a Type II flashing arrow sign which shall be in operation when the vehicle is being used for placing, maintaining, or removing the components. Vehicles equipped with a Type II flashing arrow sign not involved in placing, maintaining, or removing the components when operated within a stationary type lane closure shall only display the caution display mode. The sign shall be controllable by the operator of the vehicle while the vehicle is in motion.

If any component of the traffic control system is displaced or ceases to operate or function as specified from any cause during the progress of the work, the Contractor shall repair the component to its original condition or replace the component within two (2) hours of notification.

When lane closures are made for work periods only, at the end of each work period, all components of the traffic control system, except portable delineators placed along open trenches or excavations adjacent to the traveled way, shall be removed from the traveled way and shoulder. If the Contractor so elects, the components may be stored at selected central locations, approved by the Engineer.

All traffic control devices and lighted barricades shall be in good condition. Any damaged traffic control devices shall be removed from the job. Following a 24 hour notice to replace any damaged traffic control devices, the Town shall replace the devices and bill the Contractor for labor, material and equipment costs.

Temporary Pavement Delineation

Temporary pavement delineation shall be furnished, placed, maintained and removed in accordance with the provisions in Section 12-3.01, “General,” of the Standard Specifications, the California MUTCD and these Special Provisions. Nothing in these Special Provisions shall be construed as to reduce the minimum standards specified in the California MUTCD or as relieving the Contractor from his responsibility as provided in Section 7-1.04, “Public Safety,” of the Standard Specifications and as indicated in these Special Provisions.

Whenever existing traffic striping or markings have been removed, paved over, or otherwise obliterated, temporary striping or markings shall be provided as follows: Slurry tabs of the appropriate color as approved by the Engineer shall be installed and placed on twenty-four (24) foot intervals to delineate all four (4) inch traffic stripes. All channelization lines (solid eight (8) inch or twelve (12) inch line markings) shall be temporarily restored with a double row of slurry tabs as approved by the Engineer. All crosswalks shall be restored with a double row of slurry tabs as approved by the Engineer. All pavement markers separating multiple turning lanes shall be replaced with slurry tabs on a ten (10) foot spacing.

Temporary traffic striping and marking shall be removed and replaced with permanent striping and markings as soon as the final pavement surface has cured sufficiently to receive the permanent traffic paint or thermoplastic. Permanent pavement markers shall be installed on the same day that the permanent traffic striping and markings are installed, however, the installation of pavement markers shall be done only after all traffic striping and markings are installed. The Contractor shall maintain the temporary striping until their permanent traffic striping and markings are placed.

When no longer required for the direction of public traffic, as determined by the Engineer, the temporary traffic stripe and pavement marking tape and temporary pavement markers, applied to existing pavement, the top layer of new pavements or any other paved surface where the previously placed pavement delineation conflicts with the new traffic pattern, shall be removed and disposed of in accordance with the provisions of Section 7-1.13, "Disposal of Materials Outside the Highway Right-of-Way," of the Standard Specifications and all lines and marks used to establish the alignment for the temporary traffic stripes, pavement markings and temporary pavement markers shall be removed from the pavement.

Property Access Requirements

Driveway access at each individual property site may be diverted as noted under "Driveway Closures" with approved traffic control plan. Pedestrian access to each individual property must be provided during the driveway closure.

The Contractor shall maintain vehicular and pedestrian property access to all businesses at all times unless otherwise approved by the Engineer and as described in "Driveway Closures" below. Upon approval by the Engineer, access to certain properties may be temporarily closed if all of the following conditions can be met:

- a) No options exist to maintain property access and complete the project.
- b) The Contractor has discussed the closure with the owner in person.
- c) Owner has been notified, in writing, at least two (2) weeks in advance of the time and length of closure
- d) Owner has been reminded of the closure, in writing, at least two (2) working days prior to the actual closure.
- e) The Contractor has provided the business/resident with a contractor's superintendent's name and number to call with questions regarding the closure.
- f) Closure will last no longer than three (3) working days

Driveway Closures

Access to all residential properties must be maintained at all times, except for necessary closure of driveways for installation or replacement of sidewalk, aprons and roadway. Upon removal of a driveway approach, the Contractor shall provide a temporary driveway approach to allow for property access which shall be maintained until the time the Contractor needs to form and pour the improvements. Full driveway closures shall only be implemented for compacting, forming, pouring and PCC curing activities. Forming and pouring closures shall be limited to three days. Closures for PCC curing shall be limited to three days (5 days if the pour is on a Wednesday or Thursday with resident notification). Driveway closures will also be allowed during removal and replacement of the PCC pavement, until required pavement strengths are reached.

The Contractor shall provide a driveway closure plan, as required by the Engineer, to show how access to each residence will be maintained. During driveway closure, the Contractor shall provide affected residents with on street parking adjacent to their property on the opposite side of the street.

Prior to the closure of any driveway, the Contractor shall notify the resident three times of such closure. Written closure notices shall be given to the resident two weeks in advance of scheduled work. Another written closure notice shall be given 48 hours in advance of the scheduled work. A final verbal notice and confirmation of the driveway closure dates shall be given to the resident a minimum of one hour prior to the scheduled closure. Dated pdf copies of all hand delivered notices for each property shall be provided to the Engineer. The Contractor shall exercise all reasonable care and make every effort to ensure access to the property as specified herein. Only two closures per driveway (one for driveway approach and one for pavement replacement) shall be allowed, unless otherwise approved by the engineer in writing.

Measurement and Payment

Full compensation for preparing traffic control plans, temporary pavement delineation plans, providing construction and detour signs, and for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work involved in compliance with the Plans, Specifications and Technical Specification Section 10-4, "Traffic Control Requirements," shall be included and paid for in the lump sum (L.S.) price paid for:

TRAFFIC CONTROL (L.S.)

BID ITEM #4

The basis for payment for Bid Item: Traffic Control will be based on the percentage of job completed in each progress payment.

SECTION 10-5 CONSTRUCTION STAKING AND LAYOUT

General

The Contractor shall layout the project by providing all stakes and marks needed to establish the lines and grades required for completion of the work specified on the Plans and in these Special Provisions to the satisfaction of the Engineer. All the stakes and marks shall be set and cut sheets provided by an individual licensed in the State of California to provide such stakes, marks, and cut sheets. The cut sheets shall be subject to review and approval by the Engineer and shall be provided to the Engineer at least three working days prior to the planned start of work. Approval by the Engineer shall not relieve the Contractor of responsibility for errors.

Horizontal and vertical control at the project site for the construction centerline is shown on the project plans. The Engineer may conduct independent survey checks of the Contractor's construction staking. The Contractor shall allow access and provide three working days for the Engineer to conduct survey checks if needed after staking is complete. Contractor shall notify Engineer ten working days prior to anticipated completion of construction staking.

If, in the opinion of the Engineer, stakes and marks are not adequate for successful completion of the work, the Engineer may order, at the Engineer's sole discretion, additional stakes and marks to be placed by the Contractor at no additional expense to the Town. At a minimum, the survey shall provide grade and line of the new centerline, edge of pavement, (or top back of curb), back of sidewalk, top, bottom and landings of ADA ramps, driveway conforms, ROW, manhole and storm drain inlet location and inverts, high/low points and conform cuts/fills at a min of 50 foot intervals as measured from the new centerline and at curve locations (beginning of curve, end of curve) along centerline, sidewalk, and curb line. Staking shall also show the top and toe of all slopes. Stakes and marks shall be carefully preserved by the Contractor. In case such stakes or marks are destroyed or damaged, they shall be replaced immediately by the Contractor at the Contractor's expense.

Finished grades shown on the plans are given in feet and decimals of feet and are to the top of all finish graded or paved surfaces. Slope uniformly between given spot elevations unless otherwise indicated.

Transition between changes in vertical gradient of curb and gutter, walks and paving shall be smooth and gradual with no abrupt or sharp changes.

Town will provide the Contractor with the design survey files.

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work involved in compliance with the Plans, Specifications and Section 10-5, "Construction Staking and Layout," of the Technical Specifications shall be included in the Lump Sum (L.S.) price paid for:

CONSTRUCTION STAKING AND LAYOUT (L.S.)

BID ITEM #5

The basis for payment for Bid Item: Construction Staking and Layout will be based on the percentage of job completed in each progress payment.

SECTION 10-6 TREE REMOVAL

General

Trees to be removed as part of the tree removal work will be marked in the field. Trees with a diameter smaller than 6 inches (measured at 4.5 feet DBH) shall be removed and disposed of as part of bid item "Clearing and Grubbing." Trees shall be removed and stumps and root ball shall be removed or ground to 24" below existing grade. Care shall be taken to protect existing improvements to remain. Improvements scheduled to remain that are damaged during the work shall be replaced at no cost to the Town. All tree diameters shall be measured at 4.5' DBH.

Tree removals shall meet the Town's Tree Protection requirements, Division 2 Tree Protection of Town Code Chapter 29 Zoning Requirements, <http://www.losgatosca.gov/DocumentCenter/View/148>. This includes the requirements for posting each tree in advance of any tree removals.

Residue from cutting operations shall not be permitted to flow into storm drains or across lanes occupied by traffic and shall be removed from the pavement surface, concurrent with the cutting operation.

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work involved in compliance with the plans, specifications and Section 10-6, "Tree Removal," of the Technical Specifications shall be included in the per each (EA.) price paid for:

6"-12" TREE REMOVAL (EA.)

BID ITEM #6

12"-18" TREE REMOVAL (EA.)

BID ITEM #7

18" OR GREATER TREE REMOVAL (EA.)

BID ITEM #8

SECTION 10-7 ROOT PRUNING

General

The work includes the root pruning of existing trees at various locations throughout the project as required for installation of improvements and as directed by the Engineer. Root pruning shall be done following the removal of all existing improvements and prior to placing the new improvements.

All roots within the structural section and subgrade processing layer or down to a depth of sixteen inches (16") below the finished grade shall be exposed by the Contractor. The Contractor shall notify the Town and allow the Town 24 hours to obtain the opinion of a specialist as to the exact extent of root pruning necessary. After the 24 hour period, the Contractor shall prune the roots to the limits directed by the Engineer.

Root pruning shall be by Vermeer saw. Following approval by the Town, roots shall be completely cut to a depth of not less than sixteen inches (16") below the finished grade. Roots shall not be torn or ripped. The width of the cut shall be three inches (3") wide. All severed roots shall be removed and disposed of accordingly. The cut shall be made parallel with, and along the outside of the sidewalk, driveway, or curb adjacent to the tree.

In the event that there are loose obstructions to the root pruning operations, such as cobblestones, boulders, bricks, decorative blocks, rock, gravel, or other similar obstructions outside the Town right-of-way, the Contractor shall remove the said obstructions from the work area and neatly pile and/or stack the materials around the tree. The Contractor shall reset these to these location from which they were originally removed upon completion of the new improvements.

In the event that there are landscaping obstructions such as ivy, lawn, juniper branches, grass, or other encroaching vegetation outside the Town right of way, the Contractor shall trim or prune such obstructions only to the extent necessary to conduct the root pruning. Landscaping or other improvements outside the limits of root pruning shall be protected by the Contractor and shall be replaced in kind if the Contractor's operations damage the existing improvements. If the Contractor fails to comply in providing the necessary replacement as defined, the Engineer may elect to have the Town or contract forces perform all these duties, deducting all the expenses incurred from any moneys that are due, or to become due, the Contractor. By exercising this option, the Contractor is in no way relieved of the responsibilities to perform these duties.

Design may need to be revised if root pruning is not feasible. In these cases, the Contractor will be allowed additional days for any delay and no additional compensation for delays shall be allowed.

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work involved in compliance with the plans, specifications and Section 10-7, "Root Pruning," of the Technical Specifications shall be deemed included in the price paid for other contract items and no additional compensation shall be allowed therefor.

SECTION 10-8 HARDSCAPE REMOVAL

General

Hardscape shall be removed within existing planter areas as shown on the plans and coordinated with the Engineer and property owners as necessary to install the new improvements. Any existing materials that are requested to be salvaged during coordination with Engineer and property owner shall be removed and salvaged by the Contractor. The Contractor shall coordinate with the property owner on the storage location and relocate all salvaged material to this location on the resident's property.

Materials that are not to be salvaged shall be disposed of outside the project limits. If the Contractor is directed to remove only a portion of the existing hardscape, the area to be removed shall be saw cut to a clean line.

Care shall be taken to protect existing improvements to remain. Improvements scheduled to remain that are damaged during the work shall be replaced at no cost to the Town. Square foot payment for this item of work shall be as noted on the plans.

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work involved in compliance with the plans, specifications and Section 10-8, "Hardscape Removal," of the Technical Specifications shall be included in the per square foot (S.F.) price paid for:

REMOVE EXISTING HARDSCAPE (S.F.)

BID ITEM #9

Standard Specification Section 4-1.03B shall not apply to this bid item.

SECTION 10-9 PAVEMENT, SIDEWALK, RAMPS, DRIVEWAY APPROACH, AND CURB AND GUTTER DEMOLITION

General

This work shall cover the removal of the existing Portland cement concrete (PCC) pavement or asphalt concrete (AC) pavement and portions of the base section and subgrade to allow for roadway reconstruction (i.e. full depth pavement) to the lines and grades as indicated on the plans as well as sidewalk, driveway approach and curb and gutter removal. Sidewalk and curb and gutter and ramps shall be removed to the nearest concrete joint and sawcut to a neat edge. Conforms shall be constructed and maintained at all vertical drop-offs greater than 1.5" (i.e. driveways, curb ramps, exposed gutters and conform limits) through the installation of a temporary taper (maximum slope 1" V in 12" H), steel plate, or other means approved by the Engineer.

Contractor shall plan removal of pavement in conjunction with upcoming rain events. Contractor shall not remove existing improvements if there is a large rain event in the forecast.

Removal of surfacing and base shall conform to the provisions in Section 19, "Earthwork," of the Standard Specifications and the following special provisions:

1. All materials shall be excavated as shown on the plan and according to these Special Provisions.
2. Ten (10) working days prior to the anticipated removal of any existing PCC pavement, a Construction Paving Plan, as described in Section 10-12, shall be submitted to the Engineer for review. Existing PCC pavement shall not be removed until the Construction Paving Plan has been reviewed and accepted by the Engineer.
3. Existing PCC pavement shall be sawcut into manageable pieces and removed by the lift-out method or other method approved by the Engineer.
4. The accumulation of water in excavated areas shall be prevented by means of pumping or other approved methods. At no time will ground water or storm water be allowed to flow down sanitary sewer lines
5. The existing pavement surface that is to remain in place shall be cut or trimmed to a neat edge after backfilling and prior to paving. The pavement surfacing shall be cut accurately and on neat lines parallel to the excavation. Any pavement damage outside these lines shall be re-cut and restored at the expense of the contractor.
6. The Contractor shall field verify locations, elevations, etc. of existing underground utilities and immediately notify the Engineer of any field conflicts. The Contractor shall conduct potholing of utilities that might potentially pose a conflict with the excavation work.
7. Subgrade preparation following the removal of surfacing and base will be measured and paid

- separately and shall be as specified in the bid item, "Earthwork,"
8. All demolition material shall be removed offsite the same day the demolition occurs.

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work involved in compliance with the plans, specifications and Section 10-9, "Pavement, Sidewalk, Driveway Approach, and Curb and Gutter Demolition," of the Technical Specifications shall be included in the per square foot (S.F.) price paid for:

**REMOVE EXISTING PAVEMENT, SIDEWALK, RAMPS, BID ITEM #10
DRIVEWAY APPROACH, AND CURB &
GUTTER (S.F.) (FPQ)**

The quantity shown on the bid schedule for this work is a Final Pay Quantity (FPQ). This quantity shall not be measured separately except in the case of a specific addition/deletion by the Engineer.

SECTION 10-10 EARTHWORK

General

Earthwork shall conform to Section 19, "Earthwork," of the 2010 Standard Specifications. Subgrade preparation associated with the installation of full depth pavement sections or surface reconstruction, sidewalk, driveway approach, and curb and gutter shall follow removal of existing pavement to the depth required and shall include all grading, excavation and fill as necessary to grade the subgrade to the lines and grades required to achieve pavement finish grades as indicated on the plans, moisture conditioning of subgrade materials (in-situ or fill), compaction to the maximum dry density including quality control testing, and/or backfill of low spots. Subgrade preparation shall be completed after removal of existing pavement as required for full depth pavement, sidewalk, driveway approach, and curb and gutter as described elsewhere in these specifications. Excess material excavated from the site shall be disposed of and included in this work.

Excavation and removal of various existing items which are in conflict with the work (including all materials and obstructions not included in other items of work) shall be considered as included under various applicable sections of these Special Provisions.

Materials and obstructions including, but not limited to areas outside of Section 10-9 as needed, pavement fabric, tree roots, subgrade, or base material which are removed from the worksite to accommodate the installation of new facilities shall become the property of the Contractor, and those that are not recycled shall be disposed of outside the road right-of-way at a legal dumpsite. Hauling from the project site shall be performed on the same day that inert waste material is generated. The Contractor is responsible for testing and profiling the excavated base and subgrade material to be off-hauled and disposed of for soil contamination (i.e. lead) as required for disposal purposes at a licensed disposal facility.

The subgrade for the full depth pavement sections shall be prepared to achieve a cross slope as shown on the plans of the finish grade of the full depth pavement. The Contractor shall identify the required lines, levels, and contours and flag locations of known utilities. Grading shall be done to the required lines and grades to achieve the specified cross slope as shown on the plans and to tie the new pavement to the existing items to remain.

Residents along Glen Ridge require a replacement PVC irrigation pipe and an HDPE irrigation sleeve under the street to allow them to continue to extend their irrigation system to the opposite side of the street, the Contractor shall install a schedule 40 HDPE conduit sleeve of a minimum 1 1/2" in inside

diameter and a PVC replacement pipe within the subbase and across the street in the location requested by the residents. The Contractor shall disconnect, remove, and dispose of the old irrigation system that crosses the street and reconnect the new pipe within the sleeve. Contractor shall test new irrigation lines to verify working and leak free condition. The Contractor shall coordinate these locations with the resident and shall mark each final location on the record drawings.

Onsite subgrade material including subgrade material from other locations within the limits of the project may be used. The Contractor shall moisture condition the subgrade material to approximately 2% above the optimum moisture content as obtained by ASTM D1557 and compact to 95% maximum dry density to 0.67 feet in areas to receive roadway pavement and 0.5 feet in areas to receive curb, gutter, sidewalk, or driveway approach as determined by ASTM D6938. Special care must be taken during the compaction and testing to prevent damages to the utility lines. Quality control monitoring of subgrade backfill and embankment materials and construction shall be by a geotechnical firm approved by the Town and secured and paid for by the Contractor. The Contractor shall provide laboratory compaction curve results and compaction testing results to Engineer. Subgrade areas that do not meet the compaction requirements shall be reworked and retested or over-excavated as described below.

If there are not sufficient onsite materials available to build the subgrade to the necessary lines and grades for construction of the street section, the contractor shall import and install Class 2 aggregate base.

Contractor shall protect any exposed subgrade from rain and runoff using tarps, cutback, etc., should the weather forecast call for significant rain events.

When encountered during roadway excavation for the construction of the full depth pavement, areas of pumping, areas yielding under rubber-tired construction equipment (or a loaded water truck), or other unsuitable material as determined by the Engineer shall be over-excavated and replaced with a stabilized subbase by one of two methods, upon the approval of the Engineer, which includes:

- 1) Over-excavation of the subbase to a depth of 1 to 2 feet, and then lining the bottom of the excavation with a geo-grid material (Tensar TX 130 or equivalent at bottom of excavation) and backfilling with aggregate base to achieve 95% compaction. Or;
- 2) Cement treatment of the upper 10" of subbase soil to create a firm, unyielding working platform for the roadway section. The cement treatment will be sufficient to achieve 400 psi unconfined compressive strength of the subbase. Prior to filling the excavation with aggregate base, the contractor shall moisture condition and compact the new sub-grade to 95% relative compaction (ASTM D1557).

The contractor shall apply a bond breaker to the top of the finished compacted subgrade soil to minimize the bonding between concrete and subgrade soil.

Over-excavation of unsuitable material will be measured and paid for under the appropriate bid item. The contract unit price paid for over-excavation of unsuitable material shall include soils sampling (all testing and analysis required for disposal at a licensed disposal facility) and testing to determine the relative compaction of the subgrade soil, excavation and disposal of unsuitable material, furnishing, transportation and placement of all required materials including aggregate base, geogrid placement, cement treatment, moisture conditioning and compaction, and shall include full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and doing all work involved to construct the subgrade over-excavation as specified in these Special Provisions and as directed by the Engineer. In lieu of paying the contract price for Over-Excavation, the Town reserves the right to negotiate a lump sum price for large quantities of over-excavated material or pay for the work on a force account basis.

Slopes to receive fills shall be stripped prior to receiving fills. All fills shall be constructed in loose lifts (8-10") and compacted to 90% relative compaction, unless otherwise directed by the Engineer.

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work involved in compliance with the plans, specifications and Section 10-10, "Earthwork," of the Technical Specifications including but not limited to subbase, shall be included in the per cubic yard (C.Y.) price paid for:

ROADWAY EXCAVATION & OFF-HAUL (C.Y.) (FPQ)

BID ITEM #11

And the cubic yard (C.Y) price paid for:

OVER-EXCAVATION (C.Y.) (REVOCABLE)

BID ITEM #12

And the per linear foot (L.F.) price paid for:

HDPE IRRIGATION SLEEVE AND PVC PIPE (L.F.)

BID ITEM #13

Where the quantity shown on the bid schedule is shown as a Final Pay Quantity (FPQ), this quantity shall not be measured separately except in the case of a specific addition/deletion by the Engineer.

SECTION 10-11 AGGREGATE BASE COURSE

General

Aggregate base shall be Class 2 and shall conform to the provisions in Section 26, "Aggregate Bases." Compaction of the aggregate base shall conform to Section 26-1.03D of the 2010 Standard Specifications and these Contract Specifications. The grading of the material shall conform to the 3/4-inch maximum, specified in Section 26-1.02B, "Class 2 Aggregate Base," of the 2010 Standard Specifications. Submit current quarry test results for Engineer approval.

Aggregate base exceeding a workable moisture content will be rejected by the Engineer and shall be immediately removed from the project site by the Contractor at his expense. At least 0.33 feet of aggregate base shall be placed under concrete curb, gutter, sidewalk and other minor repairs unless specified otherwise on the plans or elsewhere in these Contract Specifications and shall be paid for under that related item of work.

Aggregate base shall be spread in accordance with the provisions of Section 26-1.03C, "Spreading" and Section 26-1.03D, "Compaction," of the 2010 Standard Specifications. Spreading and compacting shall be performed by methods that will produce a uniform base, firmly compacted and free from pockets of coarse or fine material. No spreading operation shall begin until the physical characteristics of aggregate base have been approved by the Engineer.

Aggregate base, regardless of its use, shall be compacted to 95% (ninety-five percent) relative compaction based on ASTM D1557. The aggregate base shall be graded to the desired finished grade and shall be moisture conditioned and compacted to 95% relative compaction.

Quality control monitoring of aggregate base materials shall be by a geotechnical firm approved by the Town and secured and paid for by the Contractor.. The Contractor's firm shall take samples and provide testing to determine maximum dry density and optimum moisture content of the aggregate base and shall

field test aggregate base compaction before placing subsequent materials over the aggregate base course. The Contractor shall provide laboratory compaction curve results and compaction testing results to Engineer.

Placement of aggregate base shall be as shown on the plans and these Special Provisions.

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work involved in compliance with the plans, specifications and Section 10-11, "Aggregate Base Course" of the Special Provisions shall be included in the price paid for other contract items of work and no additional compensation will be allowed therefor.

SECTION 10-12 PORTLAND CEMENT CONCRETE PAVEMENT

General

- A. **Summary.** Caltrans 2010 Standard Specifications shall be used for this section. Section 40-1, "Concrete Pavement," of the 2010 Standard Specifications includes general specifications for constructing concrete pavement.

B. **Definitions.**

Concrete raveling: Progressive disintegration of the pavement surface resulting from dislodged aggregate.

Full depth crack: Crack that runs from one edge of the slab to the opposite or adjacent side of the slab, except a crack parallel to and within 0.5 foot of either side of a planned contraction joint

Working crack: Crack that extends through the full depth of the slab and is parallel to and within 0.5 foot of either side of a planned contraction joint.

Action limit: Value at which corrective actions must be made while production may continue.

Suspension limit: Value at which production must be suspended while corrections are made.

C. **Submittals.**

1. **General.** Provide submittals as noted in Section 8, "Materials", of these Special Provisions. Submit manufacturer's recommendations and instructions for storage and installation of joint filler. Submit updated quality control charts for each paving day.
2. **Certificates of Compliance.** Submit a certificate of compliance for materials as noted in Section 8, "Materials" of these Special Provisions and the following materials, as applicable to the project:
 1. Tie bars
 2. Threaded tie bar splice couplers
 3. Dowel bars
 4. Tie bar baskets
 5. Dowel bar baskets
 6. Chemical adhesive for drilling and bonding tie bars and dowel bars

7. Silicone joint sealant
8. Asphalt rubber joint sealant
9. Preformed compression seal
10. Backer rods, including the manufacturer's statement of compatibility with the sealant to be used.
11. Joint filler material
12. Epoxy powder coating

3. **Mix Design for Portland Cement Concrete.** At least 15 days before testing for mix proportions, submit a copy of the AASHTO accreditation for your laboratory determining the mix proportions.

Use a laboratory that complies with ASTM C 1077 to determine the mix proportions for concrete pavement. The laboratory must have a current AASHTO accreditation for:

1. AASHTO T 97 or ASTM C 78
2. ASTM C 192/C 192M

As noted in Section 8, "Materials, of these Special Provisions, submit the proposed concrete mix proportions, submit under California Test 559 the proposed concrete mix proportions, the corresponding mix identifications, and laboratory test reports including the modulus of rupture, flexural strengths and compressive strengths for each trial conventional mixture at 10, 21, 28, and 42 days and for each moderate high-early strength mixture at 1, 3, 7, 28, and 42 days.

The proposed trial mixtures shall be no more than 12 months before field qualification.

Submitted mix design data should include:

1. Mixing date
2. Type and source of ingredients used
3. Slump of the concrete
4. Air content of the plastic concrete
5. Unit weight of concrete
6. Age and strength at time of concrete flexural and compressive strength testing
7. Correlation between concrete flexural and compressive strength

4. **Quality Control Plan.** Submit a concrete pavement QC plan. The plan must detail the methods used to ensure the quality of the work. A certified Quality Control Manager must be designated by the Contractor. The QC manager shall be responsible for ensuring all aspects of the Quality Control Plan are followed. Allow 30 days for the Town's review. Attention is also directed to Section 8 of these Special Provisions for additional requirements.

At the time of QC plan submission, the Town qualifies the QC samplers and testers through the Independent Assurance Program (IAP) for the sampling and testing they perform.

5. **Concrete Field Qualifications.** Submit field qualification data and test reports including:

1. Mixing date
2. Mixing equipment and procedures used
3. Batch volume in cubic yards
4. Type and source of ingredients used
5. Penetration of the concrete
6. Air content of the plastic concrete
7. Age and strength at time of concrete flexural and compressive strength testing

Field qualification test reports must be certified with a signature by a representative in responsible charge of the laboratory performing the tests.

6. **Quality Control Charts.** Maintain updated quality control charts each paving day. Provide copies to Town upon request.
7. **Construction Paving Plan.** Ten (10) working days prior to the removal of any existing PCC pavement, the Contractor shall submit a final Construction Paving Plan to the Engineer for review and acceptance. The Construction Paving Plan shall outline the limits of each anticipated paving pour and shall include the following:

- Anticipated number of individual pours to be completed and limits of each
- Traffic control planned for each pour
- Method, timeframe, and limits of removal of existing pavement for each pour
- Method of layout for sawcuts in advance of concrete pour
- Method, timeframe, and limits of subgrade preparation for each individual pavement pour and testing to be completed for each segment
- Method, timeframe, and limits of formwork to be completed for each individual pavement pour
- Method, timeframe, and limits of each individual pavement pour, including testing to be completed for each segment
- Finishing method – direction of finishing
- Curing method to be used – waterproof membrane method or curing compound
- Estimated sawcutting timeframe
- Draft of advanced notice to be distributed to residents prior to driveway access closures
- Methods of keeping traffic off of pavement until cleared for use

Should the plan change during construction, the Contractor shall revise and resubmit the plan for review and acceptance by the Engineer. The Contractor shall be responsible for re-noticing the public should the plan change.

D. Quality Control and Assurance.

1. **General.** Core pavement as described for thickness (if required by the Engineer)

For the Town's compressive and flexural strength testing, assist the Engineer in fabricating test cylinders and beams by providing materials and labor.

2. **Prepaving Conference.** Schedule a prepaving conference at a mutually agreed upon time and place to meet with the Engineer. Discuss QC plan and methods of performing each item of the work.

Prepaving conference attendees must sign an attendance sheet provided by the Engineer. The prepaving conference must be attended by the Contractor's::

1. Project Superintendent
2. QC Manager
3. Paving Construction Foreman
4. Workers and your subcontractor's workers, including:
 - 4.1. Foremen including subcontractor's Foremen
 - 4.2. Concrete plant manager, operator and inspectors
 - 4.3. Personnel performing saw cutting and joint sealing
 - 4.4. Paving machine operators
 - 4.5. Quality Control inspectors, samplers and testers

Contractor shall not start paving activities including test strips until the listed personnel have attended a prepaving conference.

The purpose of the prepaving conference is to familiarize personnel with the project's requirements. Contractor shall be prepared to discuss the Contractor's processes for:

1. Production
2. Transportation
3. Placement
4. Replacing pavement
5. Contingency plan
6. Sampling
7. Testing
8. Safety

3. **Quality Control Plan.** Contractor shall establish, implement, and maintain a QC plan for pavement. The QC plan must describe the organization and procedures used to:

1. Control the production process
2. Determine if a change to the production process is needed
3. Implement a change

The QC plan must include details of corrective actions to be taken if any process is out of control, including action and suspension limits. Suspension limits must not exceed specified acceptance criteria.

As a minimum, a process is out of control if any of the following occurs:

1. For fine and coarse aggregate gradation, 2 consecutive running averages of 4 tests are outside the specification limits

2. For fine and coarse aggregates, the moisture content of either aggregate changes by more than 0.5 percentage point from any reading
3. For individual penetration or air content measurements:
 - 3.1. One point falls outside the suspension limit line
 - 3.2. Two points in a row fall outside the action limit line

Contractor shall stop production and take corrective action for out of control processes or the Engineer may reject the subsequent material. Contractor may continue production when fine and coarse aggregate moisture content is out of control, but take corrective action.

The QC plan must address the elements affecting concrete pavement quality including (as applicable):

1. Mix proportions
 2. Aggregate gradation
 3. Materials quality
 4. Stockpile management
 5. Line and grade control
 6. Proportioning
 7. Mixing and transportation
 8. Placing and consolidation
 9. Contraction and construction joints
 10. Bar reinforcement placement, alignment, and anchorage
 11. Dowel bar placement, alignment, and anchorage
 12. Tie bar placement
 13. Compressive strength and modulus of rupture
 14. Finishing and curing
 15. Protecting pavement
 16. Surface smoothness
 17. Joint sealant and compression seal installation
4. **Mix Design.** The Contractor shall use a laboratory that complies with ASTM C1077 to determine the mix proportions for concrete pavement. The laboratory must have a current AASHTO accreditation for:
1. AASHTO T 22 or ASTM C39
 2. AASHTO T 97 or ASTM C78
 2. ASTM C192/C192M

Proposed trial mixtures shall be no more than 12 months old before field work begins.

Using the trial mixtures, determine the minimum cementitious materials content. Use your value for minimum cementitious material content for *MC* in equation 1 and equation 2 of Caltrans Standard Specifications section 90-1.02B(3).

To determine the minimum cementitious materials content or maximum water to cementitious materials ratio, use flexural strength modulus of rupture values of at least 600 psi for 28 days age and at least 650 psi for 42 days age.

The Contractor's laboratory must determine an increase in the cementitious materials content or a decrease in the water to cementitious materials ratio from the trial mixtures to ensure compliance with the specifications.

If changing an aggregate supply source or the mix proportions, produce a trial batch and field-qualify the new concrete. The Engineer does not adjust contract time for performing sampling, testing, and qualifying new mix proportions or changing an aggregate supply source.

5. **Field Qualification.** Before placing concrete pavement, proposed mix proportions must be field qualified. Contractor shall use an ACI Certified "Concrete Laboratory Technician, Grade I" to perform field qualification tests and calculations.

Contractor shall test for modulus of rupture under California Test 523 and compressive strength under California Test 521 at 3, 10, 21, 28, and 42 days of age.

6. **Quality Control Testing.** Contractor shall meet the following requirements:

- a. **General.** Testing laboratories and testing equipment must comply with the Caltrans's Independent Assurance Program. Perform sampling under California Test 125.
- b. **Concrete Mix.** Before placing pavement, the mix design must be field qualified. Use an ACI certified "Concrete Laboratory Technician, Grade I" to perform field qualification tests and calculations.

When placing pavement, the quality control must include testing properties at the frequencies shown in the following table:

QC Testing Frequency (or as specified by the Engineer)

Property	Test method	Minimum frequency
Cleanness value	California Test 227	2 per day
Sand equivalent	California Test 217	2 per day
Aggregate gradation	California Test 202	2 per day
Air content (air entrainment not specified)	California Test 504	1 per 4 hours
Unit Weight	California Test 518	1 per 4 hours
Penetration	California Test 533	1 per 4 hours
Aggregate moisture meter calibration ^a	California Test 223 or California Test 226	1 per day

^a Check calibration of the plant moisture meter by comparing moisture meter readings with California Test 223 or California Test 226 test results.

Maintain control charts to identify potential problems and assignable causes. Post a copy of each control chart at a location determined by the Engineer.

Individual measurement control charts must use the target values in the mix proportions as indicators of central tendency.

Develop linear control charts for:

1. Cleanness value
2. Sand equivalent
3. Fine and coarse aggregate gradation
4. Air content
5. Penetration

Control charts must include:

1. Contract number
2. Mix proportions
3. Test number
4. Each test parameter
5. Action and suspension limits
6. Specification limits
7. Quality control test results

For fine and coarse aggregate gradation control charts, record the running average of the previous 4 consecutive gradation tests for each sieve and superimpose the specification limits.

For air content control charts, the action limit is ± 1.0 percent of the value used for your approved mix design.

As a minimum, a process is out of control if any of the following occurs:

1. For fine and coarse aggregate gradation, 2 consecutive running averages of 4 tests are outside the specification limits
2. For individual penetration or air content measurements:
 - 2.1. One point falls outside the suspension limit line
 - 2.2. Two points in a row fall outside the action limit line

Stop production and take corrective action for out of control processes or the Engineer rejects subsequent material.

c. **Pavement Smoothness.**

- i. **General.** Notify the Engineer 2 business days before performing smoothness testing including IP calibration and verification testing. The notification must include start time and locations by station.

Before testing the pavement smoothness, remove foreign objects from the surface, and mark the beginning and ending station on the pavement shoulder.

Test pavement smoothness using a 12-foot straightedge.

- ii. **Straightedge Testing.** Identify locations of areas requiring correction by:
 1. Location Number
 2. Street
 3. Beginning station

4. For correction areas within a lane:
 - 4.1. Lane direction as NB, SB, EB, or WB
 - 4.2. Lane number from left to right in direction of travel
 - 4.3. Wheel path as "L" for left, "R" for right, or "B" for both
5. For correction areas not within a lane:
 - 5.1. Identify pavement area (e.g., shoulder, weight station, turnout)
 - 5.2. Direction and distance from centerline as "L" for left or "R" for right
6. Estimated size of correction area

6. Pavement Acceptance.

a. Acceptance Testing.

- i. **General.** All acceptance sampling and testing, with the exception of coring for thickness determination, necessary to determine conformance with the requirements specified in this section will be performed by the Engineer. The Engineer will determine if coring shall be used as a basis of acceptance testing for pavements. Concrete shall be accepted on a lot basis. A lot shall consist of one day's production or portion thereof if paving operations must cease prior to a full day's production. Each lot shall be divided into four equal sublots. Acceptance testing includes testing the pavement properties at the minimum frequencies shown in the following table:

Acceptance Testing

Property	Test Method	Frequency ^a
Thickness	California Test 531	Each subplot
Equivalent Modulus of Rupture (28 day) ^b	California Test 523	Each subplot
Air Content	California Test 504	Each subplot
Plate Dowel Placement	Visual Assessment	Each subplot
Pavement Smoothness	Straight Edge	Each subplot

^aA single test represents no more than the frequency specified.

^bAcceptance will be based on a compressive strength (California Test 521) correlated to the flexural strength modulus of rupture value of at least 600 psi at 28 days determined during the mix design process.

- ii. **Thickness.** Drill cores under section 10-9-1.03N for the Town's acceptance testing in the primary area, which is the subplot for each thickness. Core at locations determined by the Engineer and in the Engineer's presence, as requested by the Engineer

Do not core until any grinding has been completed.

The core specimen diameter must be 4 inches. To identify the limits of concrete pavement deficient in thickness by more than 0.05 foot, you may divide primary areas into secondary areas. The Engineer measures cores under California Test 531 to the nearest 0.01 foot. Core at least 1 foot from existing, contiguous, and parallel concrete pavement not constructed as part of this Contract.

You may request the Engineer make additional thickness measurements and use them to determine the average thickness variation. The Engineer determines the locations with random sampling methods.

If each thickness measurement in a primary area is less than 0.05 foot deficient, the Engineer calculates the average thickness deficiency in that primary area. The Engineer uses 0.02 foot for a thickness difference more than 0.02 foot over the specified thickness.

For each thickness measurement in a primary area deficient by more than 0.05 foot, the Engineer determines a secondary area where the thickness deficiency is more than 0.05 foot. The Engineer determines this secondary area by measuring the thickness of each concrete pavement slab adjacent to the measurement found to be more than 0.05 foot deficient. The Engineer continues to measure the thickness until an area that is bound by slabs with thickness deficient by 0.05 foot or less is determined.

Slabs with and without bar reinforcement are defined by the areas bound by longitudinal and transverse joints and concrete pavement edges. Secondary area thickness measurements in a slab determine that entire slab's thickness.

The Engineer measures the remaining primary area thickness after removing the secondary areas from consideration for determining the average thickness deficiency.

Concrete pavement thickness must not be deficient by more than 0.05 foot.

The minimum thickness is not reduced for specifications that may affect concrete pavement thickness such as allowable tolerances for subgrade construction.

The Engineer determines the areas of noncompliant pavement, the thickness deficiencies, and the limits where removal is required.

Pavement with an average thickness deficiency less than 0.01 foot is acceptable. If the thickness deficiency is 0.01 foot or more and less than 0.05 foot, you may request authorization to leave the pavement in place and accept a pay adjustment. If the deficiency is more than 0.05 foot the pavement must be removed and replaced.

- iii. **Equivalent Modulus of Rupture.** For field qualification, the equivalent modulus of rupture, based on the compressive strength correlation established during mixture design, at no later than 28 days must be at least:
 - 1. 570 psi flexural strength for each single beam
 - 2. 600 psi flexural strength for the average of 3 beams

For production, the equivalent modulus of rupture, based on the compressive strength correlation established during mixture design, for the average of the individual test results of 2 beams aged for 28 days must be at least 600 psi flexural strength.

- iv. **Air Content.** The air content must be within ± 1.5 percent of the value used for your approved mix design.
- v. **Plate Dowel Placement.** Dowel bar placement must comply with the tolerances shown in the following table:

Plate Dowel Tolerances

Dimension	Tolerance
Horizontal offset	± 1 inch
Longitudinal translation	± 2 inch
Horizontal skew	5/8 inch, max
Vertical skew	5/8 inch, max
Vertical depth	The minimum distance measured from concrete pavement surface to any point along the top of dowel bar must be: $DB + 1/2$ inch where: $DB =$ one third of pavement thickness in inches, or the saw cut depth, whichever is greater The maximum distance below the depth shown must be 5/8 inch.

NOTE: Tolerances are measured relative to the completed joint.

The Engineer determines the limits for removal and replacement.

- vi. **Pavement Smoothness.** Testing with a straightedge, the pavement surface must not vary from the lower edge of the straightedge by more than:
 1. 0.01 foot when the straightedge is laid parallel with the centerline
 2. 0.02 foot when the straightedge is laid perpendicular to the centerline and extends from edge to edge of a traffic lane
 3. 0.02 foot when the straightedge is laid within 24 feet of a pavement conform

Materials

A. **General.** Water for coring must comply with Caltrans Standard Specifications Section 90.

B. **Concrete.**

1. **General.** PCC for pavement must comply with Section 90-1 of the Standard Specifications except as otherwise specified. Concrete shall include one (1) pound of lamp black per cubic yard of concrete or equivalent.
2. **Cementitious Material.** Concrete must contain a minimum of 505 pounds cementitious material per cubic yard. The specifications for reducing cementitious material content in Section 90-1.02E(2) of the Standard Specifications do not apply.

3. **Aggregate.** Aggregate must comply with Section 90-1.02C of the Standard Specifications except the specifications for reduction in operating range and contract compliance for cleanness value and sand equivalent specified in Section 90-1.02C(2) of the Standard Specifications and Section 90-1.02C(3) of the Standard Specifications do not apply.

For combined aggregate gradings, the difference between the percent passing the 3/8-inch sieve and the percent passing the No. 8 sieve must not be less than 16 percent of the total aggregate.

C. Reinforcement, Bars, and Baskets.

1. **Bar Reinforcement.** Bar reinforcement must be deformed bars and must comply with Section 52 of the Standard Specifications.
2. **Diamond Shaped Plate Dowels for Construction Joints.** Acceptable product is PNA Diamond Dowel[®] System (PNA Construction Technologies, www.pna-inc.com; 800-542-0214).

Use diamond shaped load plate, saw cut from 1/4" hot rolled steel plate meeting ASTM A36.

The pocket former is a high density plastic with internal collapsible fins and spacer that hold diamond shaped load plate in correct position and creates a void to its vertical faces. This void, in addition to its tapered shape, shall allow for differential movement and shall prevent horizontal stress accumulation at joint, thus reducing likelihood of random cracking.

Dimensions of plate shall be 1/4" by 4-1/2" by 4-1/2".

- D. **Joint Filler.** Joint filler for isolation joint must be pre-formed expansion joint filler for concrete (bituminous type) under ASTM D994. An alternate is to place 1/4" thick commercial quality polyethylene flexible foam expansion joint filler across the original transverse and longitudinal joint faces.
- E. **Curing Compound.** Curing compound must be curing compound No. 1 or 2 in Section 90-1.03B(3)(b) of the Standard Specifications.

Construction

- A. **General.** Aggregate and bulk cementitious material must be proportioned by weight by means of automatic proportioning devices of approved types.
- B. **Water Supply.** Before placing concrete pavement, develop enough water supply.
- C. **Joints.**
 1. **General.** Do not bend tie bars or reinforcement in existing concrete pavement joints.

For contraction joints and isolation joints, saw cut a groove with a power-driven saw. After cutting, immediately wash slurry from the joint with water at less than 100 psi pressure.

Keep joints free from foreign material including soil, gravel, concrete, and asphalt. To keep foreign material out of the joint, you may use filler material. Filler material must not react adversely with the concrete or cause concrete pavement damage. After sawing and washing, install filler material that keeps moisture in the adjacent concrete during the 72 hours after paving. If you install filler material, the specifications for spraying the sawed joint with additional curing compound in Caltrans Standard Specifications section 40-1.03K does not apply. If using absorptive filler material, moisten the filler immediately before or after installation.

2. **Construction Joints.** Construction joints must be vertical.

Before placing fresh concrete against hardened concrete, existing concrete pavement, or structures, apply curing compound No. 1 or 2 in Section 90-1.03B(3)(b) of the Standard Specifications to the vertical surface of the hardened concrete, existing concrete pavement, or structures and allow it to dry.

At joints between concrete pavement and HMA, apply tack coat between the concrete pavement and HMA.

Use a metal or wooden bulkhead on formed construction joints with the PNA Diamond Dowel[®] System pocket former; install per manufacturer's instructions.

Contraction Joints. Saw contraction joints after the concrete is hard enough to saw without spalling, raveling, or tearing and before cracking occurs. Contraction joints shall not be allowed to fall within 6 inches of a diamond pocket dowel.

Contractor shall layout the sawcut joint pattern a minimum of one day before the sawcutting work is to be performed. The Engineer shall approve the joint pattern prior to the start of sawcutting work.

Saw cut using a power saw with a diamond blade. After cutting, immediately wash slurry from the joint with water at less than 100 psi pressure.

Except for longitudinal joints parallel to a curving centerline, transverse and longitudinal contraction joints must not deviate by more than 0.1 foot from either side of a 12-foot straight line.

Cut transverse contraction joints within 0.5 foot of the spacing described. Adjust spacing if needed such that slabs never have an aspect ratio (length to width) greater than 1.25 and are never longer than 10 feet.

Cut transverse contraction joints straight across the full concrete pavement width, between isolation joints and edges of pavement. In areas of converging and diverging pavements, space transverse contraction joints such that the joint is continuous across the maximum pavement width. Longitudinal contraction joints must be parallel with the concrete pavement centerline, except when lanes converge or diverge.

3. **Isolation Joints.** Before placing concrete at isolation joints, prepare the existing concrete face and secure joint filler. Prepare by saw cutting and making a clean flat vertical surface. Make the saw cut the same depth as the depth of the new pavement.

D. **Bar Reinforcement.** Place bar reinforcement under Section 52 of the Standard Specifications.

E. **Diamond Dowel Placement.** Install at formed construction joints including longitudinal construction joint between pavement and gutter pan.

Mark center point for spacing of each Diamond Dowel® pocket former on top of wood form along entire length. Set forms along construction joints. To ensure that the dowels do not fall within 6" of a transverse joint, identify and clearly mark all transverse joint locations on the formwork prior to installing the pocket former. Place Diamond Dowel® System up to (but not closer than) 6" of joint intersection per industry guidelines. Dowels are not to be hammered into place.

Use the installation template. The installation template will ensure that the minimum requirement of 2-1/4" of coverage of concrete over the dowel is maintained. Referring to the Diamond Dowel System Installation Guide, insert the correct tube into the installation template depending on the slab depth. Use the orange Diamond Dowel® pocket former with 1/4" by 4.5" by 4.5" Diamond Dowel®.

Insert Diamond Dowel® pocket former into installation template. Line up mark on top of wood form with center of template. Nail Diamond Dowel® pocket former and remove installation template. Repeat at specified spacing along entire length of form. Place and finish first slab, using internal vibration to consolidate concrete around diamond shaped load plate pocket former per industry guidelines. Strip forms and bend nails flush with joint face.

Insert Diamond Dowel® load plate into slot created by pocket former. Center corner of plate in middle of label and push straight through label into pocket former. Do not hammer or use excessive force to insert diamond shaped load plate. Insert diamond shaped load plate within two weeks of concrete placement.

Place and finish second slab. Use internal vibration to consolidate concrete around Diamond Dowel® plate per industry guidelines.

F. **Smooth Dowel Bar Placement.** Install dowel bars into existing concrete pavement as shown on plans by drilling and bonding bars in place complying with Section 41-10 of the Standard Specifications.

If dowel bars are noncompliant, stop paving activities, demonstrate your correction, and obtain verbal approval from the Engineer.

G. **Placing Concrete.**

1. **General.** Immediately prior to placing concrete, the surface to receive concrete must be:
 - a. In compliance with specified requirements, including compaction and elevation tolerances.
 - b. Free of loose and extraneous material.
 - c. Uniformly moist, but free of standing or flowing water.

Use a paving machine that meets all of the following:

- a. Is designed for the specific purpose of placing, consolidating, and finishing concrete pavement.
- b. Is self-propelled and equipped with a means for spreading the concrete to a uniform depth before it enters the throat.
- c. Vibrates the concrete to the full width and depth being placed in a single passage. Use vibrating tubes or arms working in the concrete or a vibrating pan operating on the surface of the concrete.
- d. Produces a surface reasonably free of voids and tears.
- e. When the paver is operated on previously placed concrete, prevent damage to the pavement surface.
- f. For slip form pavers, use a paver equipped with automatic horizontal and vertical grade controls.

Hand methods utilizing air screeds and vibrating screeds may be used for short pavement runs, cul de sacs, driveways, and some intersections. Hydraulic screeds may be used provided that the concrete has been consolidated by vibration prior to screeding.

Place consecutive concrete loads within 30 minutes of each other. Construct a transverse construction joint when concrete placement is interrupted by more than 30 minutes. The transverse construction joint must coincide with the next contraction joint location, or the fresh concrete pavement must be removed to the preceding transverse joint location.

Place concrete pavement in full slab widths separated by construction joints or monolithically in multiples of full lane widths with a longitudinal contraction joint at each traffic lane line as identified on the plans.

Do not re-temper concrete.

2. **Paving Adjacent to Existing Concrete Pavement.** Where pavement is placed adjacent to existing concrete pavement:
 - a. Grinding adjacent pavement must be completed before placing the pavement.
 - b. Use paving equipment with padded crawler tracks or rubber-tired wheels with enough offset to prevent damage.
 - c. Match pavement grade with the elevation of existing concrete pavement after grinding.
3. **Stationary Side Form Construction.** Stationary side forms must be straight and without defects including warps, bends, and indentations. Side forms must be wood, allowing for the attachment of the Diamond Dowel® pocket former.

The side form's base width must be at least 80 percent of the specified concrete pavement thickness.

Side forms including interlocking connections with adjoining forms must be rigid enough to prevent springing from subgrading and paving equipment and concrete pressure.

Construct subgrade to final grade before placing side forms. Side forms must bear fully on the foundation throughout their length and base width. Place side forms to the specified grade and alignment of the finished concrete pavement's edge. Support side forms during concrete placing, compacting, and finishing.

After subgrade work is complete and immediately before placing concrete, true side forms and set to line and grade for a distance that avoids delays due to form adjustment.

Clean and oil side forms before each use.

Side forms must remain in place for at least 1 day after placing concrete and until the concrete pavement edge no longer requires protection from the forms.

Spread, screed, shape, and consolidate concrete with 1 or more machines. The machines must uniformly distribute and consolidate the concrete. The machines must operate to place the concrete pavement to the specified cross section with minimal hand work.

Consolidate the concrete without segregation.

- a. Consolidate, with a single pass of the paving machine which uses approved internal or surface vibrator(s), the full width and depth of concrete requiring finishing. Operate internal vibrators within a frequency range of 4000 to 8000 vibrations per minute. The Engineer may authorize the minimum vibration frequency to be lowered to 3500 vibrations per minute for particular sections of paving, such as super-elevations. Operate surface vibrators within a frequency range of 3500 to 6000 vibrations per minute.
- b. Avoid operating vibrators in a manner to cause a separation of the mix ingredients, either a downward displacement of large aggregate particles or an accumulation of laitance on the surface of the concrete. When forward motion of the paver is reduced, vibrator frequency may need to be reduced to avoid separation of the mix.
- c. If a vibrator fails to operate within the specifications, repair or change the vibrator before the paving begins:
 - i. The following day, or
 - ii. The same day if the continuous paving that day is stopped at a header or at the end of a session.
- d. If two adjacent vibrators fail to operate within the specifications, stop the paving operation and repair or replace the vibrators.
- e. Stop vibrators whenever forward motion of the paver is stopped.
- f. Set the internal vibrator penetration depth into the concrete pavement to mid slab or as deep as possible while passing above reinforcing steel. Provide an operating position locking device so that no part of the vibrating unit can be lowered to the extent that it will come in contact with reinforcing steel or tie bars while paving.
- g. Do not exceed the manufacturer's recommendations for vibrator horizontal spacing. Do not exceed 16 inches from center to center.
- h. Mount the longitudinal axis of the vibrator body approximately parallel to the direction of paving. Tilt the trailing end of each vibrator downward to an approximate slope of 15 degrees below horizontal.
- i. Use vibrators that meet or exceed the following specifications at the manufacturer's design frequency of 10,000 vpm:

- i. Amplitude (peak to peak) 0.070 inches.
- ii. Centrifugal force 1200 pounds.

For vibrators used for hand placement, use a vibration rate between 3500 to 6000 vibrations per minute, and use an amplitude sufficient to be perceptible on the surface of the concrete more than 12 inches from the vibrating unit.

- 4. **Slip-Form Construction.** If slip-form construction is used, spread, screed, shape, and consolidate concrete to the specified cross section with slip-form machines and minimal hand work. Slip-form paving machines must be equipped with traveling side forms and must not segregate the concrete.

Do not deviate from the specified concrete pavement alignment by more than 0.1 foot.

Slip-form paving machines must use high frequency internal vibrators to consolidate concrete. You may mount vibrators with their axes parallel or normal to the concrete pavement alignment. If mounted with axes parallel to the concrete pavement alignment, space vibrators no more than 2.5 feet measured center to center. If mounted with axes normal to the concrete pavement alignment, space the vibrators with a maximum 0.5-foot lateral clearance between individual vibrators.

Each vibrator must have a vibration rate from 5,000 to 8,000 cycles per minute. The amplitude of vibration must cause perceptible concrete surface movement at least 1 foot from the vibrating element. Use a calibrated tachometer to measure frequency of vibration.

- 5. **Paving on Steep Grades.** The Contractor shall propose a method and procedure for placing concrete on steep grades. The procedures shall be submitted with the Construction Paving Plan to the Engineer for review and approval.

- H. **Edge Treatment.** Construct edge treatments as shown. Regrade when required for the preparation of safety edge areas.

Sections 40-1.03J(2) and 40-1.03J(3) of the Standard Specifications do not apply to safety edges.

For safety edges placed after the concrete pavement is complete, concrete may comply with the requirements for minor concrete.

For safety edges placed after the concrete pavement is complete, install connecting bar reinforcement under section 52.

Saw cutting or grinding may be used to construct safety edges.

For safety edges, the angle of the slope must not deviate by more than ± 5 degrees from the angle shown. Measure the angle from the plane of the adjacent finished pavement surface.

- I. **Finishing.**

1. **General.** Preliminary finishing must produce a smooth and true-to-grade finish.
2. **Grade and Crown.** Promptly after concrete has been placed and vibrated, strike off the surface to the true section by the screed. Finish the surface true to crown and grade.
3. **Watering the Surface.** The practice of lubricating the pavement surface by sprinkling water by spray, brush or other methods to afford greater ease in finishing operation is not allowed unless approved by the Engineer.
4. **Floats.** Finish surface with wood or magnesium floats; finish from both sides simultaneously if pavement is placed to full width with one pass of paving machine.
5. **Straightedging.** After the longitudinal floating has been completed and the excess water has been removed, and while the concrete is still plastic, test the pavement surface for trueness.

Immediately fill any depressions found with freshly mixed concrete, struck off, consolidated, and refinished.

Check surface longitudinally while concrete is still plastic; correct any surface deviations greater than 1/8 inch in 10 feet.

6. **Drag Surface Treatment.** Unless otherwise specified, texture the finished surface with an artificial turf, broom or burlap drag treatment as follows:
 - a. Pull the artificial turf, broom or burlap drag longitudinally over the finished surface to produce a tight, uniform, textured surface, and round the edges in a workmanlike manner.
 - b. Remove the artificial turf, broom or burlap drag from the pavement surface at regular intervals and clean with water to remove accumulated concrete from the fabric in order to maintain a consistent finished texture.
 - c. When the desired texture is not attained, the Engineer may require the final finish be a broom finish.
 - d. Contractor shall construct four test strips to evaluate the Contractors finishing technique (burlap, artificial turf, medium broom, heavy broom finishes). Test strips shall be completed a minimum of 10 working days prior to the intended placement of the first PCC pavement section. The selected finish test strip shall remain on the job site until completion of the project.
 7. **Grooving.** Groove concrete pavements as shown on the plans, or as directed by the Engineer. Pavement grooves shall be from 1/8 to 1/4 inch deep constructed according to Section 42 of the Standard Specifications, 2010.
- J. **Curing.** Cure the concrete pavement's exposed area under Section 90-1.03B of the Standard Specifications using the waterproof membrane method or curing compound method. If using the curing compound method use curing compound no. 1 or 2. When side forms are removed within 72 hours of the start of curing, also cure the concrete pavement edges.

Apply curing compound with mechanical sprayers. Reapply curing compound to saw cuts and disturbed areas.

- K. **Protecting Concrete Pavement.** Protect concrete pavement under Section 90-1.03C of the Standard Specifications.

Maintain the concrete pavement surface temperature at not less than 40 degrees F for the initial 72 hours.

Protect the concrete pavement surface from activities that cause damage and reduce texture. Do not allow soil, gravel, petroleum products, concrete, or asphalt mixes on the concrete pavement surface.

Construct crossings for traffic convenience. If authorized, you may use rapid setting concrete (RSC) for crossings.

The use of the Maturity Method (ASTM C1074) to facilitate opening to traffic is encouraged. Engineer approval is required prior to opening individual pavements utilizing maturity concepts.

Do not open any of the concrete to local traffic until the compressive strength (California Test 521) meets the requirements below:

Compressive strength requirements for opening pavements:

1. 2500 psi for sidewalk and residential driveways
2. 3000 psi for roadway carrying local traffic
3. 4000 psi for truck traffic and heavy construction equipment including concrete trucks

If concrete pavement damage is observed including visible cracking, stop operating paving equipment on the concrete pavement and repair the damage.

- L. **Early Use of Concrete Pavement.** If requesting early use of concrete pavement:

1. Furnish molds and machines for compressive strength testing
2. Sample concrete
3. Fabricate cylindrical specimens
4. Test for compressive strength under California Test 521

If you request early use, concrete roadway pavement must have a compressive strength equivalent to at least 4000 psi. Protect concrete pavement under Section 40-1.03L of the Standard Specifications.

- M. **Drilling Cores.** Drill concrete pavement cores under ASTM C42/C42M. Use diamond impregnated drill bits. Cores will be drilled only if required by the Engineer.

Clean, dry, and fill core holes with hydraulic cement grout (nonshrink) or pavement concrete. Coat the core hole walls with epoxy adhesive for bonding new concrete to old concrete under Section 95. Finish the backfill to match the adjacent surface elevation and texture.

- N. **Pavement Repair and Replacement.**

1. **General**

If surface raveling or full-depth cracks occur within one year of Contract acceptance, repair or replace the pavement under Section 6-3.06 of the Standard Specifications.

Repair and replace pavement in the following sequence:

- a. Replace pavement
- b. Repair spall, ravel, and working cracks

- c. Correct smoothness and coefficient of friction
- d. Treat partial depth cracks
- e. Replace damaged joint seals under Section 41-5 of the Standard Specifications

In addition to removing pavement for other noncompliance, remove and replace Jointed Plain Concrete Pavement (JPCP) slabs that:

- a. Have one or more full depth crack
- b. Have raveled surfaces such that either:
 - i. Combined raveled areas are more than 5 percent of the total slab area
 - ii. Single area is more than 4 sq ft

2. **Spall and Ravel Repair**

Repair spalled or raveled areas that are:

- a. Deeper than 0.05 foot
- b. Wider than 0.10 foot
- c. Longer than 0.3 foot

Repairs must comply with Section 41-4 of the Standard Specifications and be completed before opening pavement to traffic.

3. **Crack Repair.** Treat partial depth cracks for JPCP under Section 41-3 of the Standard Specifications.

Treat the contraction joint adjacent to the working crack by either:

- a. Epoxy resin under ASTM C881/C881M, Type IV, Grade 2
- b. Pressure injecting epoxy resin under ASTM C881/C881M, Type IV, Grade 1

4. **Smoothness.** Correct pavement that is noncompliant for:

- a. Smoothness by grinding under Section 42-3 of the Standard Specifications

Do not start corrective work until:

- a. Pavement has cured 10 days
- b. Pavement has at least a 550 psi modulus of rupture
- c. Your corrective method is authorized

Correct the entire lane width. Begin and end grinding at lines perpendicular to the roadway centerline. The corrected area must have a uniform texture and appearance.

Corrected areas will be tested with a 12-foot straightedge under Sections 40-1.01D(6)(c) and 40-1.01D(7)(b)(vii) of the Standard Specifications.

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work involved in compliance with the plans, specifications and Section 10-12, "Portland Cement Concrete Pavement," of the Technical Specifications, including but not limited to saw cut joints, reinforcement, plate dowels, joint filler, curing compound, temporary asphalt conforms, and testing shall be included in the per square yard (S.Y.) price paid for:

**INSTALL 6.5" JOINTED PLAIN CONCRETE
PAVEMENT (JPCP) (S.Y.)**

BID ITEM #14

The deduction for pavement thickness deficiency in each primary area is shown in the following table:

Deduction for Thickness Deficiency	
Average thickness deficiency (foot) ^a	Deduction (\$/sq. yd.)
0.01	0.90
0.02	2.30
0.03	4.10
0.04	6.40
0.05	9.11

^aValues greater than 0.01 are rounded to the nearest 0.01 foot.

SECTION 10-13 ASPHALT TRANSITIONS AND DRIVEWAY/WALKWAY CONFORMS

General

Asphalt concrete shall conform to Section 39, “Hot Mix Asphalt” of the 2010 Standard Specifications, the Plans, and these Special Provisions.

Hot mix asphalt shall be Type A and be produced at a central mixing plant. The aggregate shall conform to the 1/2-inch maximum grading as specified in Section 39-1.02E, “Aggregate,” of the Standard Specifications. The Contractor may use up to 15% reclaimed asphalt pavement (RAP) in the asphalt concrete mix design for transitions and conforms. Permanent asphalt transitions on adjacent asphalt streets will require a 20 foot grind unless otherwise directed by the Engineer. Temporary asphalt transitions will be required as directed by the Engineer while transitioning from reconstruction of one street to another street. These temporary AC transitions are considered as paid for under Section 10-12, Portland Cement Concrete Pavement and no additional compensation will be allowed under this section.

The asphalt binder to be mixed with the aggregate shall conform to the provisions of Section 39-1.02C, “Asphalt Binder,” of the Standard Specifications and shall be paving asphalt Grade PG 64-10, unless otherwise directed by the Engineer.

Asphalt shall meet surface tolerance requirements in accordance with Section 39-1.12 of the Standard Specifications.

A tack coat of undiluted SS-1h emulsified asphalt shall be applied at a minimum residual rate of 0.03 gallons per square yard to all paved surfaces on which any layer of asphalt concrete is to be placed on.

Not all driveway and walkway conforms are shown on the plans. Contractor must make appropriate conforms as necessary. Materials for conforms shall match adjacent driveway, walkway, and stairs. Materials for hardscape, in addition to asphalt concrete and concrete, may include pavers, bricks, specialized concrete and asphalt concrete, etc. Some driveways have a concrete valley gutter that will need to be replaced in addition to the other driveway hardscape materials. Valley gutters will be paid under the appropriate bid item for PCC conforms. Where conforms are required they shall have a nominal width of 3 feet depending on the hardscape material. This width may vary to complete the conform. Where no conforms are required the contractor shall sawcut in a neat line and remove the existing sidewalk, protect the walkway or driveway in place and pave to the existing feature in a neat line using a 1/4-inch thick premolded joint filler, if specified by the Engineer.

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals for asphalt transitions and for performing all of the work involved in compliance with the plans, specifications and Section 10-13, "Asphalt Transitions and Driveway/Walkway Conforms," of the Technical Specifications shall be included in the per ton (TON) price paid for:

INSTALL ASPHALT TRANSITION (TON)

BID ITEM #15

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals for driveway/walkway conforms of the various kinds, and for performing all of the work involved in compliance with the plans, specifications and Section 10-13, "Asphalt Transitions and Driveway/Walkway Conforms," of the Technical Specifications shall be included in the per square foot (S.F.) price paid for:

INSTALL DRIVEWAY/WALKWAY CONFORM – HARDSCAPE (S.F.)

BID ITEM #16

INSTALL DRIVEWAY/WALKWAY CONFORM – PCC (S.F.)

BID ITEM #17

INSTALL DRIVEWAY/WALKWAY CONFORM – ASPHALT PAVEMENT (S.F.)

BID ITEM #18

SECTION 10-14 CURB AND GUTTER

General

Concrete curb and gutter shall conform to Section 73, "Concrete Curbs and Sidewalks," of the Standard Specifications as shown on the plans, these Special Provisions and as directed by the Engineer.

Sawcut line on the pavement in front of curb or gutter lip extending beyond pavement limits shall be at least twenty-four (24) inches beyond the concrete edge to allow for construction of forms. Payment for restoration of this portion of pavement shall be included in bid items for construction of full depth pavement.

Existing subgrade surface shall be re-graded (if necessary) and re-compacted to conform to the grades shown on the plans.

Class 2 aggregate base placed under curb shall comply with Section 26, "Aggregate Bases," of the Standard Specifications and these Special Provisions.

Concrete shall conform to the requirements of Section 90-2, "Minor Concrete," of the Standard Specifications. No bagged mix is permitted. No admixtures shall be used without approval of the Engineer.

The slump of the mixture shall be consistent with the method of placement. Slump shall be determined by either ASTM C143 or California Test Method No. 520 at the Engineer's discretion.

All new concrete curb and gutter constructed adjacent to existing concrete curb or curb and gutter shall be doweled to the existing concrete with #4 rebar. There shall be two (2) dowels at each curb cut.

No concrete shall be placed until the Engineer has inspected and approved forms and subgrade.

Weakened plane joints at least 1-1/2 inches deep shall be placed/match at adjacent PCC pavement proposed joint locations.

Curbs shall have forms removed and be backfilled within three (3) days after placement.

Any concrete discolored, defaced, or otherwise damaged before official acceptance shall be cleaned, repaired or replaced at the Contractor's sole expense. All drop offs along the new gutter shall be ramped with cutback or rock to protect dowel pockets and the face of the new curb.

The Contractor shall make every effort to avoid damaging any Town owned property, including (roots, trunk and canopy of) Town maintained trees. Attention is directed to Section 10-7, "Root Pruning," of these Technical Specifications.

Contractor shall provide new curb drains in existing locations and connect these to the existing piping.

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work involved in compliance with the plans, specifications and Section 10-14, "Curb and Gutter," of the Technical Specifications, including but not limited to curb drains and aggregate base, shall be included in the per linear foot (L.F.) price paid for:

INSTALL CURB AND GUTTER (L.F.)

BID ITEM #19

INSTALL VERTICAL CURB (L.F.)

BID ITEM #20

SECTION 10-15 SIDEWALK

General

Concrete sidewalk shall conform to Section 73, "Concrete Curbs and Sidewalks," of the Standard Specifications, as shown on the Plans, these Special Provisions and as directed by the Engineer.

Existing subgrade surface shall be re-graded (if necessary) and re-compacted to conform to the grades shown on the plans.

Class 2 aggregate base placed under sidewalk shall comply with Section 26, "Aggregate Bases," of the Standard Specifications and these Special Provisions.

Concrete shall conform to the requirements of Section 90-2 "Minor Concrete," of the Standard Specifications. No bagged mix is permitted. No admixtures shall be used without approval of the Engineer.

The slump of the mixture shall be consistent with the method of placement. Slump shall be determined by either ASTM C143 or California Test Method No. 520 at the Engineer's discretion.

All new sidewalks constructed adjacent to existing concrete curb or sidewalk shall be doweled to the existing concrete with #4 rebar. There will be two (2) dowels at each sidewalk cut.

"Villa Hermosa" theme sidewalk shall be installed as indicated on the plans.

No concrete shall be placed until the Engineer has inspected and approved forms and subgrade.

Scoring pattern and weakened plane joints at least 1-1/2 inches deep (deep joints) shall be at the direction of the Engineer. Sidewalk shall be constructed with expansion joints at each beginning of curve (BC) and end of curve (EC).

Sidewalks shall have forms removed and be backfilled within three (3) days after placement.

New concrete shall be free of stamps, logos, names, graffiti, etc. Any concrete stamped, discolored, defaced, or otherwise damaged before official acceptance shall be cleaned, repaired or replaced at the Contractor's sole expense.

Irrigation sleeves shall be provided under sidewalks to each planter strip area as directed by the Engineer. Location of sleeve shall be marked on the sidewalk.

The Contractor shall make every effort to avoid damaging any Town owned property, including (roots, trunk and canopy of) Town maintained trees. Any tree well forming required by the Engineer when placing concrete sidewalk and/or saw cutting necessary to conform to adjacent sidewalk shall be included in this bid item. Attention is directed to Section 10-7, "Root Pruning," of these Special Provisions.

The Contractor shall work with the Engineer to help identify any areas of existing sidewalk that may be able to be salvaged and remain in place during the course of construction.

The Contractor shall be responsible for adjusting to new finish grades, all utility boxes, public or private. The Contractor shall notify affected agencies so that they may make approximate adjustments to their boxes, etc., in an expedient manner.

Restoration work of disturbed grounds or improvements including pavement around new concrete must be done as soon as practicable but no later than seven (7) days after concrete placement. The scoring pattern shall match existing sidewalk scoring pattern (approximately 2.5' x 2.5').

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work involved in compliance with the plans, specifications and Section 10-15, "Sidewalk," of the Technical Specifications, including but not limited to aggregate base, irrigation sleeves, and Villa Hermosa bricks shall be included in the per square foot (S.F.) price paid for:

INSTALL SIDEWALK (S.F.)

BID ITEM #21

INSTALL VILLA HERMOSA SIDEWALK (S.F.)

BID ITEM #22

SECTION 10-16 CURB RAMPS

General

Concrete curb ramps shall conform to Section 73, "Concrete Curbs and Sidewalks," of the Standard Specifications, as shown on the plans, these Special Provisions, and as directed by the Engineer.

Existing subgrade surface shall be re-graded (if necessary) and re-compacted to conform to the grades shown on the plans.

Class 2 aggregate base placed under curb ramp shall comply with Section 26, "Aggregate Bases," of the Standard Specifications and these Special Provisions.

Concrete shall conform to the requirements of Section 90-2, "Minor Concrete," of the Standard Specifications. No bagged mix is permitted. No admixtures shall be used without approval of the Engineer.

The slump of the mixture shall be consistent with the method of placement. Slump shall be determined by either ASTM C-143 or California Test Method No. 520 at the Engineer's discretion.

No concrete shall be placed until the Engineer has inspected and approved forms and subgrade.

Scoring pattern and weakened plane joints at least 1-1/2 inches deep (deep joints) shall be at the direction of the Engineer.

Curb ramp shall have forms removed and be backfilled within three (3) days after placement.

New concrete shall be free of stamps, logos, names, graffiti, etc. Any concrete discolored, defaced, or otherwise damaged before official acceptance shall be cleaned, repaired or replaced at the Contractor's sole expense.

The Contractor shall make every effort to avoid damaging any Town owned property, including (roots, trunk and canopy of) Town maintained trees. Attention is directed to Section 10-7, "Root Pruning," of these Special Provisions.

The Contractor shall be responsible for adjusting to new finish grades, all utility boxes, public or private. The Contractor shall notify affected agencies so that they may make approximate adjustments to their boxes, etc., in an expedient manner.

Restoration work of disturbed grounds or improvements including pavement around new concrete must be done as soon as practicable but no later than seven (7) days after concrete placement.

Detectable Warning Surface

Detectable warning surfaces shall consist of raised truncated domes constructed or installed on curb ramps, in conformance with the details shown on the plans, these Special Provisions, and all applicable ADA standards. The raised truncated dome panels shall be concrete, CASTinTACT manufactured by Masco, Telephone No. 573-878-2440, or approved equal. The detectable warning surface shall be prefabricated. The color of the detectable warning surface shall be black and meet the minimum contract requirements. Truncated dome panels must be cut and installed with symmetrical joints.

Prefabricated detectable warning surface shall be constructed of an epoxy polymer composite with an ultra violet stabilized coating employing aluminum oxide particles in the truncated domes, in conformance with the requirements established by the Department of General Services, Division of State Architect and be installed in conformance with the manufacturer's recommendations.

The finished surfaces of the detectable warning surface shall be free from blemishes.

The manufacturer shall provide a written five-year warranty for prefabricated detectable warning surfaces, guaranteeing replacement when there is defect in the dome shape, color fastness, sound-on-cane acoustic quality, resilience, or attachment. The warranty period shall begin upon acceptance of the contract.

Prefabricated detectable warning surface shall meet or exceed the following criteria:

1. Water Absorption: 0.35% maximum, when tested in accordance with ASTM D570.
2. Slip Resistance: 0.90 minimum combined wet/ dry static coefficient of friction on top of domes and field area, when tested in accordance with ASTM C1028.
3. Compressive Strength: 18,000 psi minimum, when tested in accordance with ASTM D695.
4. Tensile Strength: 10,000 psi minimum, when tested in accordance with ASTM D638.
5. Flexural Strength: 24,000 psi minimum, when tested in accordance with ASTM C293.
6. Gardner Impact: 450 inch-pounds per inch minimum, when tested in accordance with Geometry "GE" of ASTM D5420.
7. Chemical Stain Resistance: No reaction to 1% hydrochloric acid, urine, calcium chloride, stamp pad ink, gum and red aerosol paint, when tested in accordance with ASTM D543.
8. Wear Depth: 0.03" maximum, after 1000 abrasion cycles of 40 grit Norton Metallite sandpaper, when tested in accordance with ASTM D2486-Modified.
9. Flame Spread: 25 maximum, when tested in accordance with ASTM E84.
10. Accelerated Weathering: No deterioration, fading or chalking for 2000 hours, when tested in accordance with ASTM D2565.

In addition to the requirements above, prefabricated detectable warning surface adhered to concrete shall meet or exceed the following performance criteria:

1. Accelerated Aging and Freeze-Thaw of Adhesive System: No cracking, delamination, warping, checking, blistering, color change, loosening, etc. when tested in accordance with ASTM D1037.
2. Salt and Spray Performance: No deterioration after 100 hours of exposure, when tested in accordance with ASTM B117.

All protective plastic coverings shall be removed from the detectable warning surface prior to opening for pedestrian traffic.

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work involved in compliance with the plans, specifications and Section 10-16, "Curb Ramps," of the Technical Specifications, including but not limited to truncated domes and aggregate base, shall be included in the per each (EA.) price paid for:

INSTALL CURB RAMP (EA.)

BID ITEM #23

SECTION 10-17 DRIVEWAYS

General

Concrete driveways shall be constructed as shown on the contract plans and standard details. Driveways shall conform to details shown on the contract plans, except as modified to fit actual field conditions as directed by the Engineer.

Existing subgrade surface shall be re-graded (if necessary) and re-compacted to conform to the grades shown on the plans.

Class 2 aggregate base placed under driveway shall comply with Section 26, "Aggregate Bases," of the Standard Specifications and these Special Provisions.

Concrete shall conform to the requirements of Section 90-2 "Minor Concrete," of the Standard

Specifications. No bagged mix is permitted. Concrete for driveways and the portion of curb and gutter adjacent to the driveway shall have a minimum compressive strength of 4000 psi at 3 days (high early strength).

The slump of the mixture shall be consistent with the method of placement. Slump shall be determined by either ASTM C-143 or California Test Method No. 520 at the Engineer's discretion.

No concrete shall be placed until the Engineer has inspected and approved forms and subgrade.

Scoring pattern and weakened plane joints at least 1-1/2 inches deep (deep joints) shall be at the direction of the Engineer.

New concrete shall be free of stamps, logos, names, graffiti, etc. Any concrete discolored, defaced, or otherwise damaged before official acceptance shall be cleaned, repaired or replaced at the Contractor's sole expense.

The Contractor shall be responsible for adjusting to new finish grades, all utility boxes, public or private. The Contractor shall notify affected agencies so that they may make approximate adjustments to their boxes, etc., in an expedient manner.

Restoration work of disturbed grounds or improvements including pavement around new concrete must be done as soon as practicable but no later than seven (7) days after concrete placement.

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work involved in compliance with the plans, specifications and Section 10-17, "Driveways," of the Technical Specifications, including but not limited to aggregate base, shall be included in the per square foot (S.F.) price paid for:

INSTALL RESIDENTIAL DRIVEWAY (S.F.)

BID ITEM #24

INSTALL COMMERCIAL DRIVEWAY (S.F.)

BID ITEM #25

SECTION 10-18 TREE PLANTING

General

Trees to be used on the project shall be reviewed by the Town prior to delivery to the job site. Contractor shall provide photographs of trees tagged for delivery to the job site to the Town as part of the materials submittal process for review at the beginning of each work season.

Mark tree locations on site using stakes, gypsum or similar approved means and secure location approval by the Town Arborist before plant holes are dug. Adjust as necessary prior to planting. Trees shall be installed as indicated on the plans.

Break and loosen the sides and bottom of the pit to ensure root penetration. Fill holes with water; any retention of water in the plant pits for more than 24 hours shall be brought to the attention of the Town Arborist before planting proceeds.

Backfill plant holes with mix as specified, free from rocks, clods or lumpy material. Backfill native soil free of soil amendments under rootball and foot tamp to prevent settlement. Backfill remaining one-half

of the hole with soil mix and place plant tablets (Type B fertilizer) 3 inches below surface of rootball and 1/2-inch from roots at the following rates: 1 gallon can plant - 1 tablet; 5 gallon can plant - 3 tablets; 24-inch box plant - 8 tablets. Carefully remove and set plants without damaging the rootball. Superficially cut edge roots vertically on three sides using a knife. Remove bottom of plant boxes before planting. Remove sides of boxes after positioning the plant and partially backfilling.

Set plants in backfill with top of the rootball 2 inches above finished grade. Backfill remainder of hole and soak thoroughly by jetting with a hose and pipe section. Water backfill until saturated the full depth of the hole. Build 6" high watering basin berms around trees and shrubs to drain through rootball. Basins are not required around trees in tree grates. Stake and/or guy trees as detailed. Drive stake until solid and remove excess stake protruding above top tree tie to prevent rubbing against branches. Mulch watering basins with organic mulch to 3-inch depth and thoroughly water. Keep mulch away from base of plant.

Install root guard as detailed in accordance with manufacturer's recommendations. Install ten linear feet centered on tree trunk along face of paving or curb or as shown on drawings when a tree occurs within five feet of pavement or curb.

Mulch all planting areas with organic mulch to a 3-inch depth.

Apply pre-emergence weed killer in all areas to receive planting. Work shall be done by a pest control specialist, licensed by the State of California. Obtain approval of the finish grades prior to applying weed killer and coordinate planting and watering with the pest control specialist prior to planting.

Water all trees immediately after planting. Apply water to all plants as often and in sufficient amount as conditions may require to keep the plants in a healthy vigorous growing condition until completion of the Contract. Do supplemental hand watering of trees during the first 3 weeks of plant establishment.

Maintain plants from time of delivery to site until final acceptance of landscape installation.

The planting establishment maintenance period required shall be 120 calendar days after all planting is complete and installation approved. A longer period may be required if the plant material is not acceptably maintained during the maintenance period. The maintenance period may be suspended at any time upon written notice to the Contractor that the landscaping is not being acceptably maintained, and the day count suspended and reset to 120 days once the landscape is brought back to acceptable standards as determined by the Town Arborist.

Planting establishment maintenance immediately follows, coincides with, and is continuous with the planting operations, and continues through installation, and after all planting is complete and accepted; or longer where necessary to establish acceptable stands of thriving plants. Protect all areas against damage, including erosion and trespass, and provide proper safeguards. Maintain and keep all temporary barriers erected to prevent trespass.

Keep all walks and paved areas clean. Keep the site clear of debris resulting from landscape work or maintenance. Repair all damaged planted areas, and replace plants immediately upon discovery of damage or loss. Maintain adequate moisture depth in soil to ensure vigorous growth. Check rootball of trees independent of surrounding soils and hand water as required.

Tree Maintenance:

1. Maintain during the entire establishment period by regular watering, repair of stakes and ties, and spraying for insect pests. Prune when requested by the Town Arborist.
2. Keep watering basins in good condition at all times.

3. Replace all damaged, unhealthy or dead trees with new stock within (1) week of notification. Failure to do so will reset the 120 day maintenance period.

At the conclusion of the planting establishment period, schedule a final review. On such date, all project improvements and all corrective work shall have been completed. If all project improvements and corrective work are not completed, continue the planting establishment, at no additional cost to the Town, until all work has been completed. This condition will be waived by the Town under such circumstances wherein the Town has granted an extension of time to permit the completion of a particular portion of the work beyond the time of completion set forth in the Agreement. Submit written notice requesting review at least 10 days before the anticipated review. Prior to review, weed and rake all planted areas, repair plant basins, plumb tree takes, clear the site of all debris and present in a neat, orderly manner.

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work involved in compliance with the plans, specifications and Section 10-18, "Tree Planting," of the Technical Specifications including planting the trees and Plant Establishment Maintenance of the trees shall be included in the per each (EA.) price paid for:

INSTALL 15 GALLON TREE (EA.)

BID ITEM #26

INSTALL 24" BOX TREE (EA.)

BID ITEM #27

SECTION 10-19 MONUMENTS

General

Centerline monuments shall be installed at all centerline intersections of intersecting streets within the project area as indicated on the plans or directed by the Engineer and in accordance with Section 2.13, "Centerline Monuments" of the Town of Los Gatos Street Design Standards, including preparation and filing of a Record of Survey by a licensed land surveyor in accordance with all Federal, State, County, and Town laws, regulations and standards.

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work involved in the compliance with the plans, specifications and Section 10-19, "Monuments," of the Technical Specifications shall be included in the per each (EA.) price paid for:

INSTALL CENTERLINE MONUMENT (EA.)

BID ITEM #28

SECTION 10-20 ADJUST FACILITIES TO GRADE

General

Existing Facilities shall conform to Section 15, "Existing Facilities," of the Standard Specifications, the plans and these Special Provisions and all other applicable Project Specifications.

Frames and covers of existing street monuments, sanitary sewer manholes and utility valve shall be adjusted to new grade by the Contractor in accordance with the provisions in Section 7-1.04, "Public Safety," and Section 15-2.04, "Reconstruct," of the Standard Specifications. Utility owners may elect to adjust the structures with their own forces, which would remove those bid items from the contract.

Frames and covers of structures in the existing street shall be adjusted to grade by the Contractor. The respective utility owners in coordination with the Contractor; reserve the right to adjust utility structures

within the street right-of-way using their own forces. The Contractor is directed to coordinate with the respective utility owners listed in Part II, Section 3-1.06 of these specifications.

Due to the method of pavement reconstruction, frames and covers in the reconstruction areas would need to be protected to accommodate the demolition operation and adjusted to finished grade after the pavement surface is placed. The Contractor shall notify the utility companies prior to start of construction to coordinate this work. Covers shall be adjusted so there will not be any perceptible difference in elevation between the finished pavement surface and the cover. The Town of Los Gatos shall be the sole judge of the acceptable degree of smoothness of passage of a motor vehicle over the adjusted covers.

When adjustment work is undertaken which involves excavation or concrete removal, a traffic rated temporary cover shall be placed to prevent entry of material into the manhole or rodding inlet, pipe, and structure. The temporary cover shall be secured with cutback asphalt or an approved material so that the roadway is level and safe for vehicular traffic

If paint is used for referencing utility facilities, the Contractor shall use a removable paint. Reference paint shall be removed prior to end of working days for this project.

The Contractor shall encourage and accommodate the utilities adjusting their facilities immediately behind the paver whenever possible. It shall be the Contractor's responsibility to coordinate with the utilities for these adjustments to grade.

The Contractor will have a superintendent or project engineer on-site to coordinate work with utilities and sub-contractor. The "work" also includes the responsibility to coordinate traffic control between utilities and contractor and sub-contractor operations.

Utility companies reserve the right to perform the work using their own forces after the contract is awarded. All workmanship and materials for structure adjustments shall conform to the requirements of the associated utility company and these specifications.

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work involved in compliance with the plans, specifications and Section 10-20, "Adjust Facilities to Grade," of the Special Provisions shall be included in the per each (EA.) price paid for:

ADJUST SD MANHOLE TO GRADE (EA.)	BID ITEM #29
ADJUST SS MANHOLE TO GRADE (EA.) (REVOCABLE)	BID ITEM #30
ADJUST UTILITY VAULT TO GRADE (EA.) (REVOCABLE)	BID ITEM #31
ADJUST GAS VALVE BOX TO GRADE (EA.) (REVOCABLE)	BID ITEM #32
ADJUST WATER METER BOX TO GRADE (EA.) (REVOCABLE)	BID ITEM #33
ADJUST SANITARY SEWER CLEANOUT BOX TO	BID ITEM #34

**GRADE (EA.)
(REVOCABLE)**

**REPLACE VALVE BOX (EA.)
(REVOCABLE)**

BID ITEM #35

**REPLACE WATER METER BOX (EA.)
(REVOCABLE)**

BID ITEM #36

**REPLACE WATER VALVE BOX (EA.)
(REVOCABLE)**

BID ITEM #37

**REPLACE SANITARY SEWER CLEANOUT BOX (EA.)
(REVOCABLE)**

BID ITEM #38

SECTION 10-21 INSTALL COBBLE MEDIAN

General

Cobble Median shall be installed within the street in the curb-protected island as shown on the plans and as directed by the Engineer.

The cobbles shall be rounded river rock approximately 3" – 4" in diameter and shall have the appearance of the existing cobble in the island. The cobble material shall be approved in advance by the Engineer prior to importing the material to the site. If requested by the Engineer, a representative sample of the material shall be provided to the Engineer for approval. It is the sole discretion of the Town as to whether the cobble is suitable for use as the Median Island Cobble.

Prior to placement of the cobble, the median shall be compacted to 95% relative density. The cobbles shall be set in mortar within the limits of the 6" barrier curb (paid for separately). The mortar mix design shall be submitted to the engineer in advance for approval.

The cobbles shall be set in a bed of mortar with at least 2" or mortar under the cobble, and the mortar shall be filled in between the cobbles to provide a minimum of 50% embedment. The cobbles shall be cleaned of the wet mortar before the mortar dries to provide an acceptable appearance.

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work involved in compliance with the plans, specifications and Section 10-20, "Install Cobble Median," of the Technical Specifications, shall be included in the per square foot (S.F.) price paid for:

INSTALL COBBLE MEDIAN (S.F.)

BID ITEM #39

SECTION 10-22 DRAINAGE STRUCTURES

General

This work shall consist of furnishing and installing storm drain inlets and storm drain pipes, all with necessary fittings and connections to existing storm drain features, protection of existing storm drain related facilities to remain in place, and modifications to existing storm drain features as shown on the plans or as directed by the Town and as specified in these Technical Specifications and the Town of Los Gatos Standard Specifications (latest Edition).

Where a Storm Drain Inlet Frame and Cover is to be installed on an existing storm drain inlet, the work shall include removal and disposal of the existing frame and cover, modification of the inlet to accommodate the new frame and cover, and all tie-ins, rebar and formwork to attach the new frame and cover.

Trench excavation, backfill and shaped bedding shall conform to the provisions in Section 9,” Utility Trenching and Backfill,” of the Town of Los Gatos Engineering Design Standards.

The pipe shall be laid in a trench excavated to the lines and grades as shown on the plans. The bottom of the trench shall be graded and prepared to provide a firm and uniform bearing throughout the entire length of the pipe. Backfill shall be placed as described in The Town of Los Gatos design standards.

The Contractor shall locate existing utilities before any excavation to ensure that the proposed storm drain layout can be constructed. Minor adjustments of drain inlet locations are allowed but need to be brought to the Town’s attention in form of a red-lined plan sheet. Water or gas utility lines may be relocated after obtaining approval from the Town or utility owner.

Storm drain pipe shall be HDPE and shall conform to the ASTM specifications.

Drop inlets shall be 24”x24”x42” and 6” or 12” risers as required to set top of grate as shown on the plans manufactured by Jensen Precast or approved equivalent. The drop inlets shall have a galvanized grate and frame cast into the top of drop inlet.

Storm drain manhole shall have a cast-in-place base with pre-fabricated manhole sections, cone and grade rings.

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work involved in compliance with the plans, specifications and Section 10-22, “Drainage Structures,” of the Technical Specifications shall be included in the per each (EA.) price paid for:

INSTALL STORM DRAIN INLET (EA.)	BID ITEM #40
INSTALL STORM DRAIN INLET FRAME AND GRATE (EA.)	BID ITEM #41
INSTALL STORM DRAIN PIPE (L.F.)	BID ITEM #42
INSTALL STORM DRAIN MANHOLE (EA.)	BID ITEM #43

SECTION 10-23 TRAFFIC STRIPES, PAVEMENT MARKINGS, AND MARKERS

General

Contractor shall provide an inventory of existing traffic strips, pavement markings and markers. Painting traffic stripes (traffic lines) and pavement markings (legends) shall conform to the following: Provisions of Section 84-1 and 84-2 of the Standard Specifications, the California MUTCD, the Standard Plans, as shown on the plans, and these Special Provisions. Traffic stripes and pavement markings shall be installed as shown on the plans or as directed by the Engineer.

All traffic stripes and pavement markings shall be laid out in the field by the Contractor and reviewed and approved by the Engineer five (5) working days prior to any final installation. Any striping and/or marking installed by the Contractor that the Engineer has not pre-approved, and that the Engineer determines are installed improperly or in the wrong locations, shall be removed and replaced to the satisfaction of the Engineer at the Contractor's sole expense.

Thermoplastic Traffic Stripe and Pavement Marking

Thermoplastic traffic stripes (traffic lines) and pavement markings shall be applied in conformance with the provisions in Section 84, "Traffic Stripes and Pavement Markings," of the Standard Specifications, and these Special Provisions.

Thermoplastic material shall be free of lead and chromium, and shall conform to the requirements in State Specification PTH-02ALKYD.

Retroreflectivity of the thermoplastic traffic stripes and pavement markings shall conform to the requirements in ASTM D 6359-99. White thermoplastic traffic stripes and pavement markings shall have a minimum initial retroreflectivity of $250 \text{ mcd m}^{-2} \text{ lx}^{-1}$. Yellow thermoplastic traffic stripes and pavement markings shall have a minimum initial retroreflectivity of $150 \text{ mcd m}^{-2} \text{ lx}^{-1}$.

Thermoplastic traffic stripes and pavement markings shall be applied after the final pavement surface has cured sufficiently to receive the thermoplastic. Surfaces shall be cleaned of all dirt and loose material and shall be dry when the pavement delineation is applied.

Where striping joins existing striping, as shown on the plans, the Contractor shall begin and end the transition from the existing striping pattern into or from the new striping pattern a sufficient distance to ensure continuity of the striping pattern.

Thermoplastic traffic stripes and pavement markings shall be free of runs, bubbles, craters, drag marks, stretch marks, and debris. Thermoplastic shall be extruded and placed in one coat and shall be placed five days after the final surfacing. Sprayable thermoplastic is not allowed. Longitudinal limit line shall be white and 12" in width.

Concrete pavement will be sandblasted to remove concrete curing compound and painted with a primer before thermoplastic placement.

Striping Removal

Existing pavement striping, markings, and markers which are outside the work area are not to be removed unless directed by the Engineer and shall be protected by the Contractor. Any striping, markings, or markers which are to remain, which are damaged or rendered useless by the Contractor's operations, shall be restored by the Contractor to the Engineer's satisfaction and at the Contractor's sole expense.

Existing thermoplastic pavement markings and striping, and paint markings and striping shall be removed by sand blasting or grinding as directed by the Engineer. The grinder shall be specifically designed for the purpose of removing existing traffic stripes and markings and shall conform to the provisions of Section 15-2.02B of the Standard Specifications. Grinding or sand blasting operations shall be conducted to keep all removed pavement material from entering the storm drain system. The operation shall be controlled and contained so as not to impair the safe passage of traffic adjacent to the work site.

Costs associated with the striping removal shall be considered included in the associated item of work.

Curb Painting

Paint for curb painting shall be Rapid Dry Water Borne paint in accordance with requirements of Sections 84 and 85 of the Standard Specifications. Curbs shall be painted at locations shown on the plans and as directed by the Engineer. Application shall consist of two coats of traffic paint of the appropriate color applied to the face and top of the curb.

Paint shall be applied after the final pavement surface has cured sufficiently to receive the permanent traffic paint. Surfaces shall be cleaned of all dirt and loose material and shall be dry when the paint is applied.

Raised Pavement Markers

Pavement markers shall conform to Section 85, "Pavement Markers," of the Standard Specifications, the California MUTCD, and these Special Provisions. All non-reflective pavement markers shall be ceramic. Plastic pavement markers shall not be allowed.

A Certificate of Compliance shall be furnished as specified in Section 6-1.07, "Certificates of Compliance," of the Standard Specifications for reflective pavement markers. Said certificate shall also certify that the reflective pavement markers conform to the prequalified testing and approval of Caltrans, division of Traffic Operations, and were manufactured in accordance with the approved quality control program.

Adhesive shall be hot-melt bituminous adhesive conforming to Section 85, "Pavement Markers," of the Standard Specifications and of these Special Provisions.

Blue reflective fire hydrant pavement markers shall be installed conforming to the provisions of the California MUTCD Section 3B-11, "Raised Pavement Markers," and Figure 3B-102 (CA).

All pavement markers in place (outside the limits of the work) shall be protected from damage and shall be clean and undamaged after completion of the project. Any damage to the newly placed or existing markers due to the failure of the Contractor to protect the work, and correction of errors, shall be repaired by the Contractor at no additional cost.

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work in compliance with the plans, specifications and Section 10-23, "Traffic Stripes, Pavement Markings, and Markers," of the Standard Specifications shall be measured and included in the appropriate bid item as listed on the Bid Schedule and as outlined below:

INSTALL TRAFFIC STOP BAR (THERMO) (EA.)	BID ITEM #44
THERMOPLASTIC PAVEMENT MARKING (S.F.)	BID ITEM #45
PAVEMENT STRIPING (THERMO) (L.F.)	BID ITEM #46
PARKING STALL STRIPING (THERMO) (EA.)	BID ITEM #47
BLUE RETROREFLECTIVE RAISED PAVEMENT MARKER (EA.)	BID ITEM #48

SECTION 10-24 SIGNAGE

General

Work shall conform to Section 56 of the Standard Specifications, details in the Standard Plans, and California MUTCD except as noted herein.

The Contractor shall inventory existing sign locations prior to removal. Signs shall be removed, cleaned and stored by the Contractor. New signs shall be placed per the Town of Los Gatos Engineering Standard Drawings.

The Contractor, at the Contractor's sole expense, shall repair materials to be salvaged that are damaged as a result of the Contractor's operations per the Town of Los Gatos Engineering Standard Drawings to the satisfaction of the Engineer.

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work involved in compliance with the plans, specifications and Section 10-24, "Signage," of the Technical Specifications shall be included in the per each (EA.) price paid for:

REMOVE EXISTING AND PLACE NEW SIGN (EA.)

BID ITEM #49

SECTION 10-25 INSTALL SPEED HUMP

General

Speed Humps shall be installed within the street as shown on the plans and as directed by the Engineer.

Speed humps shall be constructed of Type A hot mix asphalt concrete, AR-4000, 1/2" maximum aggregate.

Prior to placing asphalt over existing pavement, sweep the pavement clean of loose dirt to the satisfaction of the Engineer. Apply tack coat to existing pavement prior to placing asphalt. Asphaltic paint binder shall be provided in sufficient quantity to produce a thin, uniform black, glossy coat of asphalt. Prime or tack coat materials shall not be applied unless the ambient temperature is above 50°F and has not been below 35°F during the twelve (12) hours immediately prior to application. Prime or tack coats shall not be applied when the surface to be coated is wet or contains an excess of moisture.

Spread asphalt by hand using a template/screed approved by the Engineer to the dimensions shown. Compact the hump using an 8-ton static roller. Multiple lifts may be required at the discretion of the Engineer in order to accomplish the design tolerances in which case multiple templates or screeds may be required.

The cross-section of the hump shall not vary by more than 0.25" from the design height.

Install 12 inch, white, thermoplastic marking as shown on plans and in conformance with Section 10-23 of the Technical Specifications.

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work involved in compliance with the plans, specifications and Section 10-25, "Install Speed Hump," of the Technical Specifications, shall be included in the per each (EA.) price paid for:

INSTALL SPEED HUMP (EA.)**BID ITEM #50****SECTION 10-26 ADDITIVE ALTERNATE WORK****General**

As shown on the project plans, there are three areas on the plans that are noted as additive alternate cost areas. There areas are currently asphalt. One area is at the southern end of Bayview Ave. between approximately station 1+00 to 2+80, the second area is on the northern end of Bean Ave. from approximately station 9+50 to station 11+20, and the third area is on Nicholson Ave. between Glen Ridge Ave. and Massol Ave. from approximately station 1+15 to station 3+40.

Measurement and Payment

Full compensation for furnishing all labor, materials, tools, equipment, and incidentals, and for performing all of the work involved in compliance with the plans, specifications and Section 10-25, "Additive Alternate Work," of the Technical Specifications, including but not limited to mobilization, traffic control, construction staking and layout, tree removal and replacement, removal of existing hardscape, removal of existing pavement, sidewalk, driveway and curb and gutter, roadway excavation and off-haul, installation of aggregate base, installation of jointed plain concrete pavement, asphalt transitions, private property conforms, installation of curb and gutter, sidewalk, curb ramps, driveways, new trees, utility adjustments, storm drain inlets, storm drain pipe, trench drain, irrigation sleeves, striping, markings, markers and signage, shall be included in the lump sum (L.S.) price paid for:

BAYVIEW AVE. FROM STA. 1+00 to STA. 2+80 (L.S.)**BID ITEM #A1****BEAN AVE. FROM STA. 9+50 to STA. 11+20 (L.S.)****BID ITEM #A2****NICHOLSON AVE. FROM STA. 1+15 to STA. 3+40 (L.S.)****BID ITEM #A3**

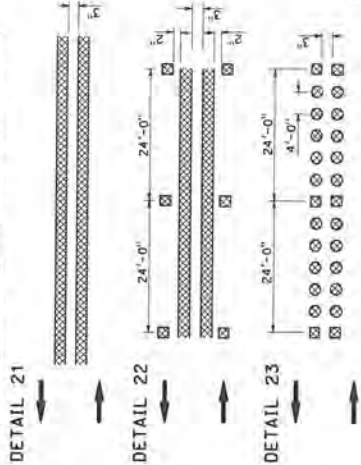
These bid items are additive alternates and may be awarded with the base bid if approved by the Town.

APPENDIX A
Standard Plans – Traffic

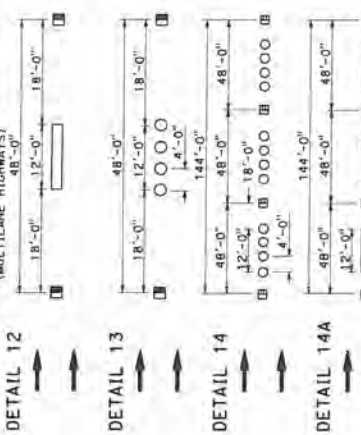
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PROJECT NO. 13-31
 ALMOND GROVE STREET RECONSTRUCTION
 PHASE II
 DATE: MAY 20, 2011
 BY: [Signature]
 CHECKED: [Signature]
 APPROVED: [Signature]
 TITLE: REGISTERED CIVIL ENGINEER
 NO. 13-31-13
 STATE OF CALIFORNIA
 DEPARTMENT OF TRANSPORTATION
 DIVISION OF HIGHWAYS
 DIVISION OF TRAVEL
 DIVISION OF PLANNING
 DIVISION OF DESIGN
 DIVISION OF CONSTRUCTION
 DIVISION OF MAINTENANCE
 DIVISION OF SAFETY
 DIVISION OF SPECIAL SERVICES
 DIVISION OF PUBLIC AFFAIRS
 DIVISION OF RESEARCH
 DIVISION OF TECHNOLOGY
 DIVISION OF TRAINING
 DIVISION OF OFFICE SUPPORT
 DIVISION OF INFORMATION SYSTEMS
 DIVISION OF LEGAL COUNSEL
 DIVISION OF FINANCE
 DIVISION OF PERSONNEL
 DIVISION OF GENERAL SERVICES
 DIVISION OF FACILITIES
 DIVISION OF SECURITY
 DIVISION OF COMPLIANCE
 DIVISION OF ENVIRONMENTAL SERVICES
 DIVISION OF HISTORIC PRESERVATION
 DIVISION OF LAND ACQUISITION
 DIVISION OF RIGHT-OF-WAY
 DIVISION OF UTILITY DIVISION
 DIVISION OF TRANSPORTATION PLANNING
 DIVISION OF TRANSPORTATION ENGINEERING
 DIVISION OF TRANSPORTATION DESIGN
 DIVISION OF TRANSPORTATION CONSTRUCTION
 DIVISION OF TRANSPORTATION MAINTENANCE
 DIVISION OF TRANSPORTATION SAFETY
 DIVISION OF TRANSPORTATION SPECIAL SERVICES
 DIVISION OF TRANSPORTATION PLANNING
 DIVISION OF TRANSPORTATION ENGINEERING
 DIVISION OF TRANSPORTATION DESIGN
 DIVISION OF TRANSPORTATION CONSTRUCTION
 DIVISION OF TRANSPORTATION MAINTENANCE
 DIVISION OF TRANSPORTATION SAFETY
 DIVISION OF TRANSPORTATION SPECIAL SERVICES

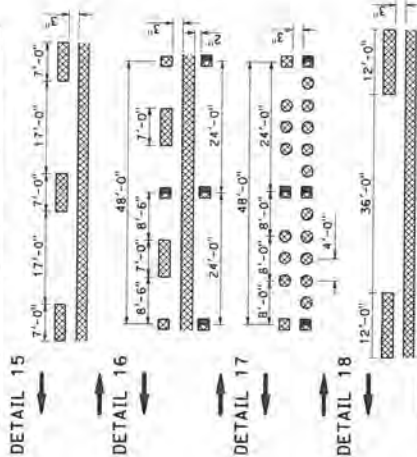
NO PASSING ZONES-TWO DIRECTION



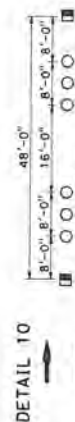
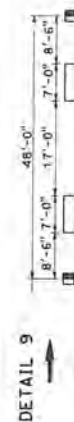
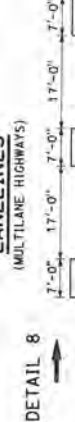
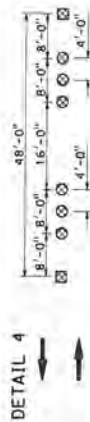
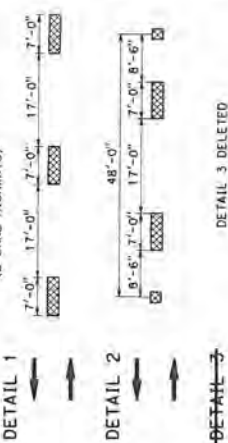
LANELINES (Cont)
(MULTILANE HIGHWAYS)



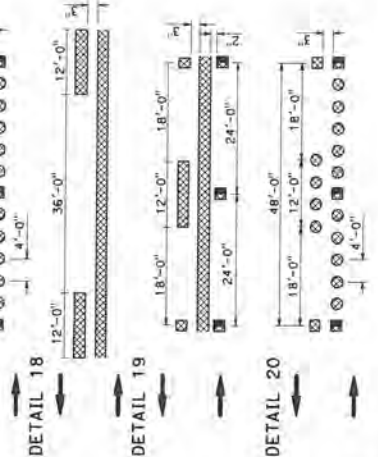
NO PASSING ZONES-ONE DIRECTION



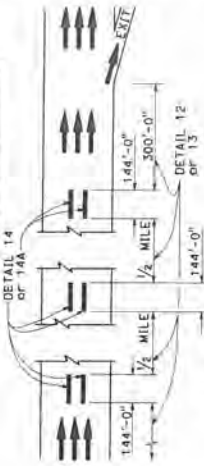
CENTERLINES
(2 LANE HIGHWAYS)



LANELINES
(MULTILANE HIGHWAYS)



**TYPICAL LANE LINE DELINEATION
IN ADVANCE OF EXIT RAMP**



LEGEND

- TYPE A WHITE NON-REFLECTIVE
- TYPE AY YELLOW NON-REFLECTIVE
- TYPE C RED-CLEAR RETROREFLECTIVE
- ▨ TYPE D TWO-WAY YELLOW RETROREFLECTIVE
- TYPE G ONE-WAY CLEAR RETROREFLECTIVE
- TYPE H ONE-WAY YELLOW RETROREFLECTIVE

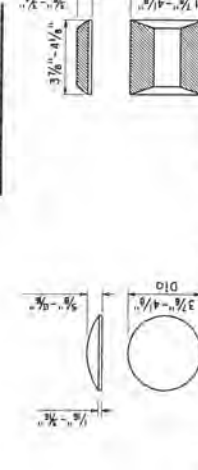
MARKERS

- 4" WHITE
- 4" YELLOW

LINE

- DIRECTION OF TRAVEL

MARKER DETAILS



TYPE A AND TYPE AY

TYPE C AND TYPE D

TYPE G AND TYPE H

RETROREFLECTIVE FACE

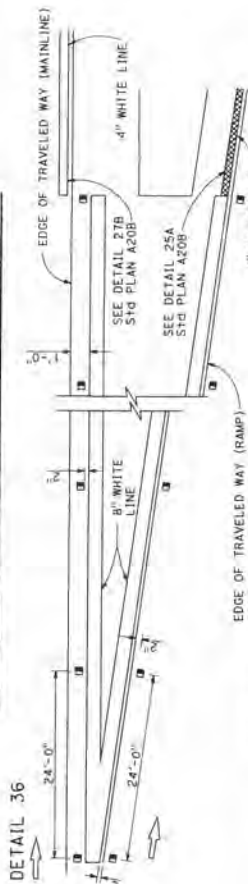
STATE OF CALIFORNIA
DEPARTMENT OF TRANSPORTATION
**PAVEMENT MARKERS
AND TRAFFIC LINES
TYPICAL DETAILS**

NO SCALE

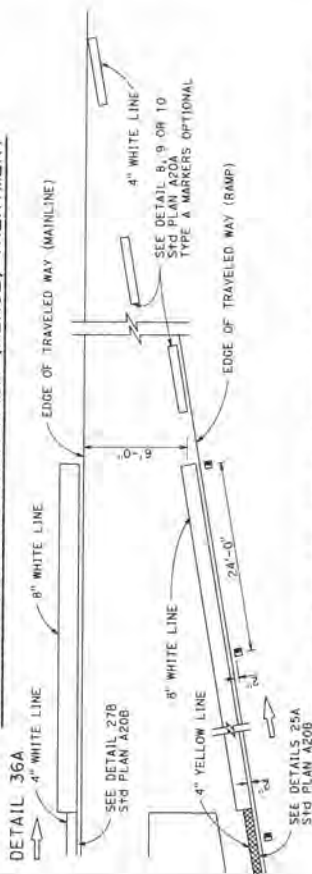
A20A



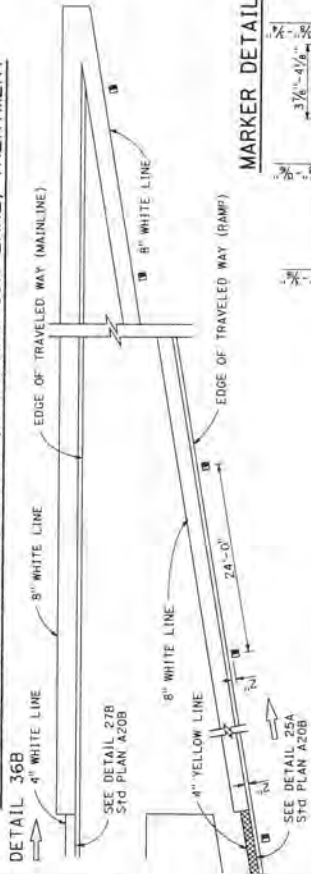
EXIT RAMP NEUTRAL AREA (GORE) TREATMENT



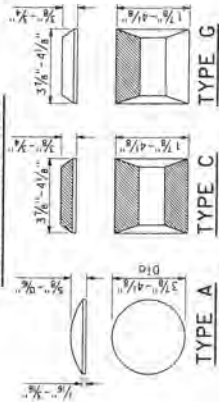
ENTRANCE RAMP NEUTRAL AREA (MERGE) TREATMENT



ENTRANCE RAMP NEUTRAL AREA (ACCELERATION LANE) TREATMENT



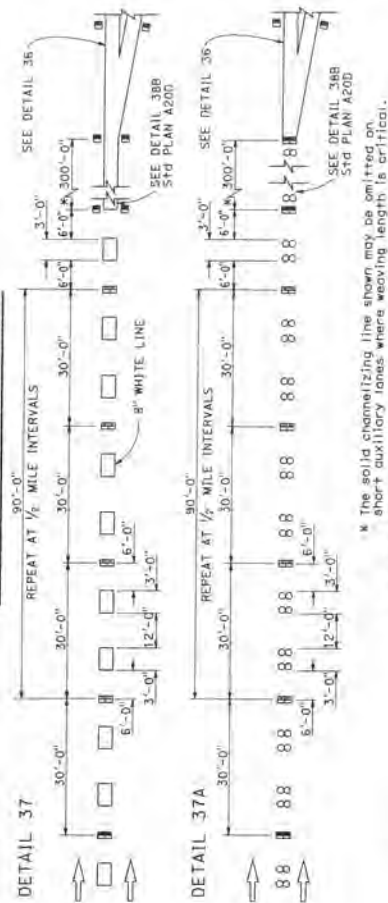
MARKER DETAILS



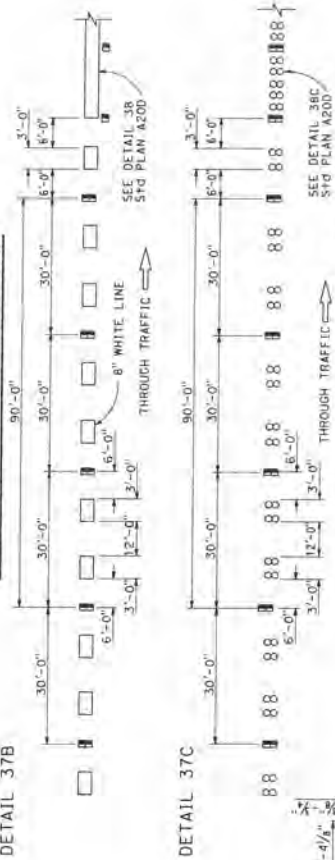
- LEGEND:
MARKERS:
○ TYPE A WHITE NON-REFLECTIVE
□ TYPE C RED-CLEAR RETROREFLECTIVE
■ TYPE G ONE-WAY CLEAR RETROREFLECTIVE

RETROREFLECTIVE FACE

LANE DROP AT EXIT RAMP



LANE DROP AT INTERSECTIONS



PAVEMENT MARKERS
AND TRAFFIC LINE
TYPICAL DETAILS

NO SCALE

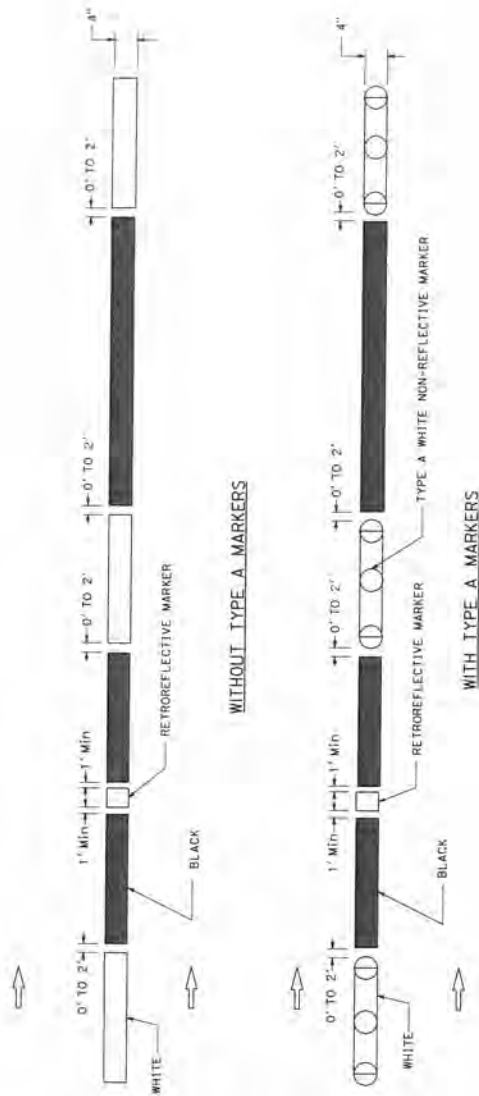
STATE OF CALIFORNIA
DEPARTMENT OF TRANSPORTATION
RSP A20C DATED JULY 19, 2013 SUPERSEDES STANDARD PLAN A20C
DATED MAY 20, 2011 - PAGE 11 OF THE STANDARD PLANS BOOK DATED 2010.

REVISED STANDARD PLAN RSP A20C

NO SCALE

NOTES:

1. See Standard Plans A20A, A20B, and Revised Standard Plan RSP A20E for pavement markers and traffic lines typical details.
2. Install 4" white stripe after installing Type A pavement markers.
3. Details 9 and 10 traffic stripes shown, see project plans for traffic stripe details.



OPTION 2

TYPICAL LANE LINE CONTRAST DETAIL

See Note 3

OPTION 1

TYPICAL LANE LINE OR RIGHT EDGE LINE CONTRAST DETAIL



STATE OF CALIFORNIA
DEPARTMENT OF TRANSPORTATION

**PAVEMENT MARKERS
AND TRAFFIC LINES**

TYPICAL DETAILS FOR CONTRAST STRIPING

NO SCALE

RSP A20E DATED JANUARY 20, 2017 SUPPLEMENTS THE STANDARD PLANS BOOK DATED 2010.

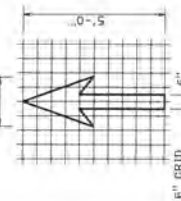
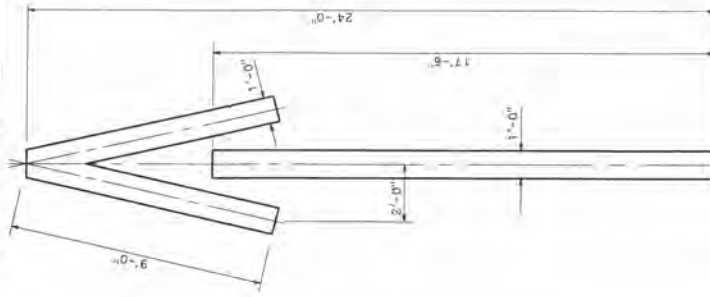
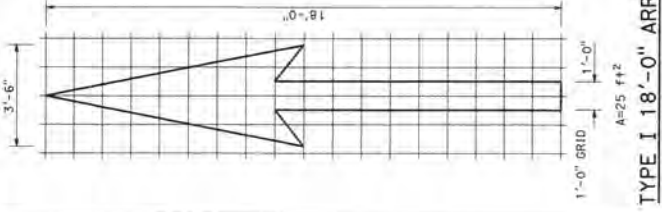
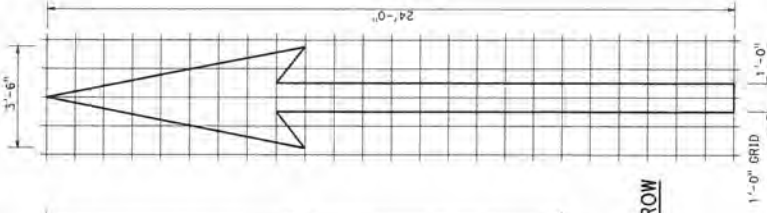
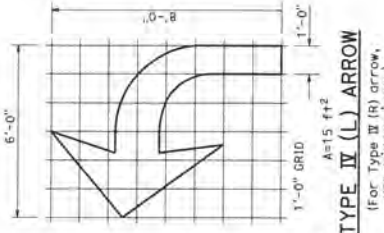
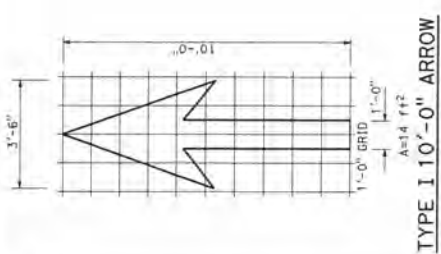
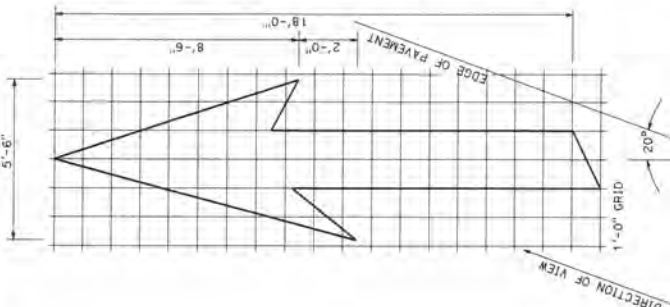
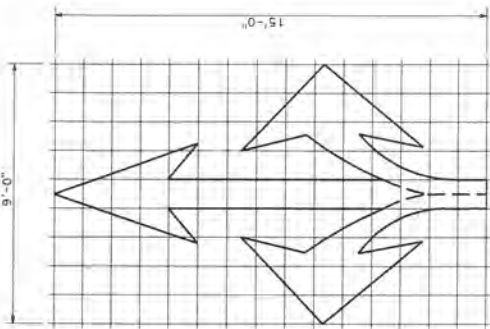
REVISED STANDARD PLAN RSP A20E

2010 REVISED STANDARD PLAN RSP A24A

SHEET NO.	PROJECT	DATE	TOTAL SHEETS
13-31	Almond Grove Street Reconstruction	April 20, 2012	13

REGISTERED CIVIL ENGINEER
Robert M. McLaughlin
 No. 10000
 State of California
 April 20, 2012
 PLANS APPROVAL DATE
 THE SEAL OF AN ENGINEER OR ITS EFFECTS
 ARE VOID OF ANY VALIDITY OR EFFECT
 UNLESS THE SEAL IS PLACED ON THE PLANS
 AND THE SEAL IS NOT REPRODUCED OR COPIED
 IN ANY MANNER.

TO ACCOMPANY PLANS DATED _____



NOTE:
 Minor variations in dimensions
 may be accepted by the Engineer.

STATE OF CALIFORNIA DEPARTMENT OF TRANSPORTATION **PAVEMENT MARKINGS ARROWS** NO SCALE

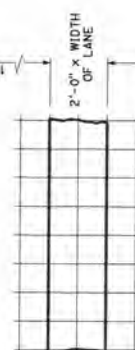
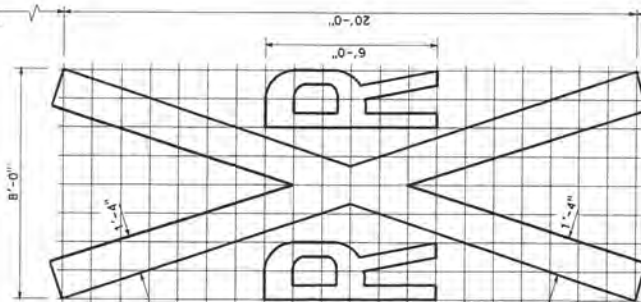
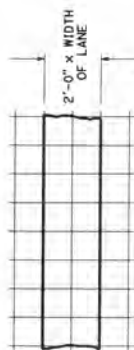
RSP A24A DATED APRIL 20, 2012 SUPERSEDES STANDARD PLAN A24A
 DATED MAY 20, 2011 - PAGE 13 OF THE STANDARD PLANS BOOK DATED 2010.

REVISED STANDARD PLAN RSP A24A

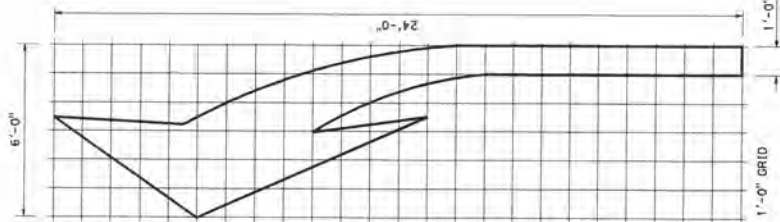
SHEET NO.	ROUTE	POST MILE	SHEET TOTAL
PROJECT			

REGISTERED CIVIL ENGINEER	PLANS APPROVAL DATE
<i>Robert McLaughlin</i>	MAY 20, 2011

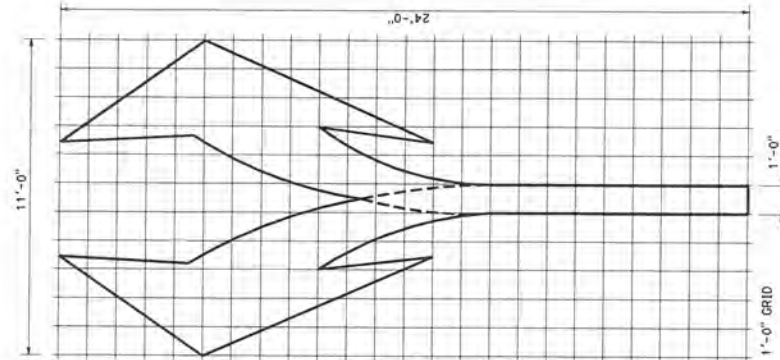
THE STATE OF CALIFORNIA OR ITS OFFICERS
DO NOT GUARANTEE THE ACCURACY OR COMPLETENESS OF THESE
COPIES OF THIS PLAN SHEET.



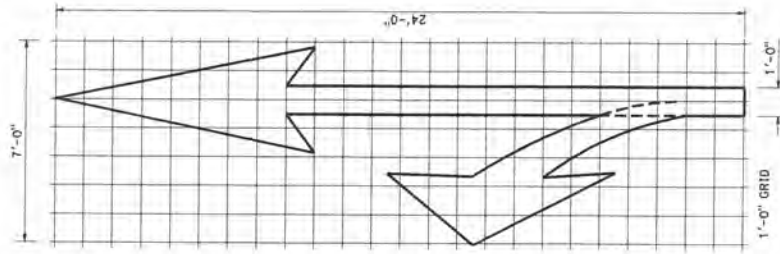
RAILROAD CROSSING SYMBOL
* 70 ft± does not include the 2'-0" x variable width transverse lines.



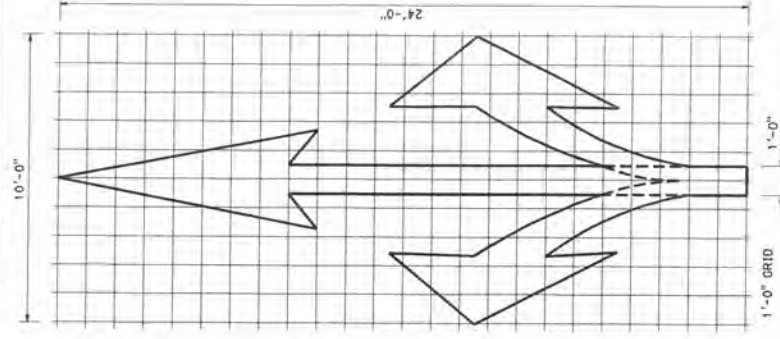
TYPE III (L) ARROW
A=42 ft±
(For Type III (R) use mirror image)



TYPE III (B) ARROW
A=73 ft±



TYPE II (L) ARROW
A=45 ft±
(For Type II (R) use mirror image)



TYPE II (B) ARROW
A=59 ft±

STATE OF CALIFORNIA
DEPARTMENT OF TRANSPORTATION

**PAVEMENT MARKINGS
ARROWS AND SYMBOLS**

NO SCALE

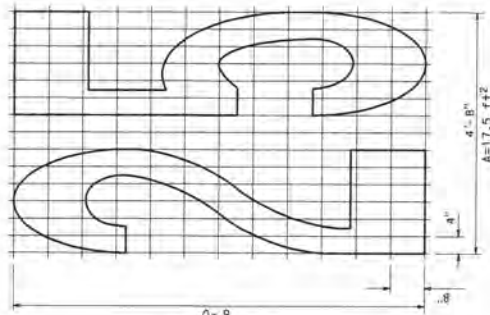
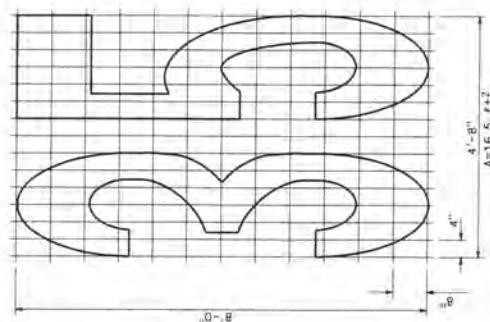
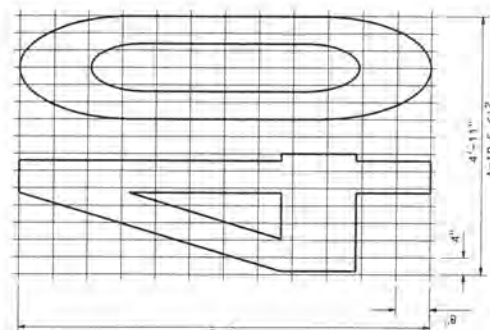
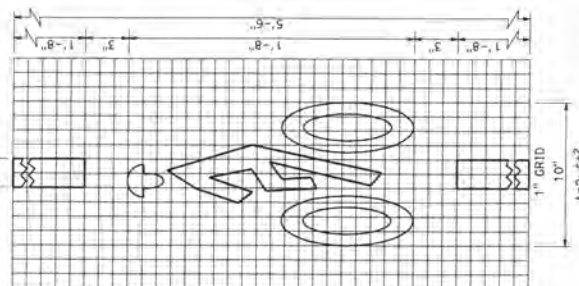
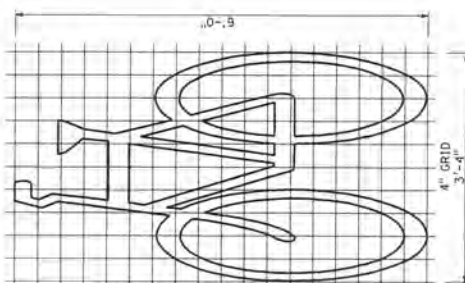
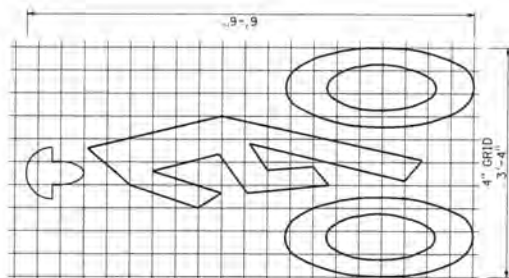
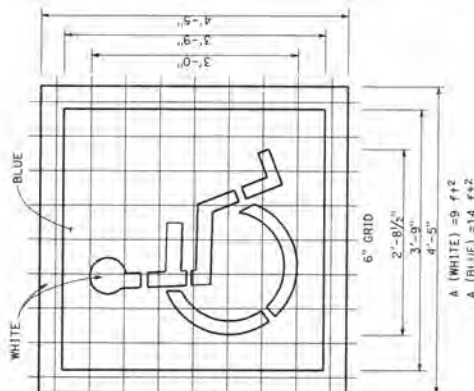
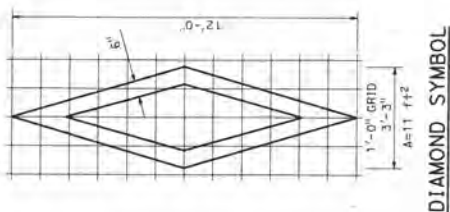
A24B

DATE	COUNTY	ROUTE	POST MILES	SHEET NO.	TOTAL SHEETS

REGISTERED CIVIL ENGINEER
Robert L. McLaughlin
 REGISTERED PROFESSIONAL ENGINEER
 No. 40075
 STATE OF CALIFORNIA
 EXPIRATION DATE 12/31/13
 THE STATE OF CALIFORNIA OR ITS OFFICES
 DOES NOT GUARANTEE THE ACCURACY OR COMPLETENESS OF ANY
 COPIES OF THIS PLAN SHEET.

October 19, 2012
 PLANS APPROVAL DATE

NOTE:
 TO ACCOMPANY PLANS DATED
 Minor variations in dimensions may be accepted
 by the Engineer.



SHARED ROADWAY BICYCLE MARKING

STATE OF CALIFORNIA
 DEPARTMENT OF TRANSPORTATION

**PAVEMENT MARKINGS
 SYMBOLS AND NUMERALS**

NO SCALE

RSP A24C DATED OCTOBER 19, 2012 SUPERSEDES STANDARD PLAN A24C
 DATED MAY 2011 - PAGE 15 OF THE STANDARD PLANS BOOK DATED 2010.

REVISED STANDARD PLAN RSP A24C

WORD MARKINGS							
ITEM	f+2	ITEM	f+2	ITEM	f+2	ITEM	f+2
XING	21	YIELD	24	BINE	5	PED	18
AHEAD	31	SCHOOL	35	SLOW	23	COMPACT	10
WAIT	19	SIGNAL	32	STOP	22	RUNWAY	43
LANE	6	TURN	24	LEFT	19	VEHICLES	42
RIGHT	26	HERE	26				

STATE OF CALIFORNIA
DEPARTMENT OF TRANSPORTATION
**PAVEMENT MARKINGS
WORDS**
NO SCALE

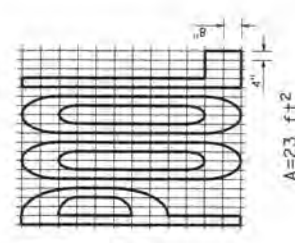
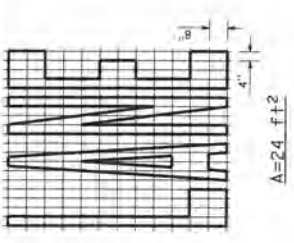
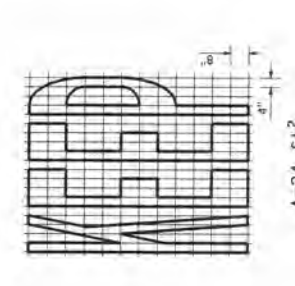
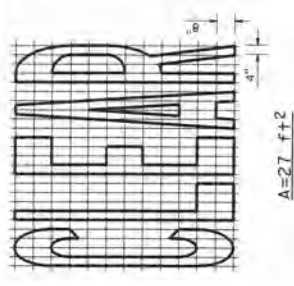
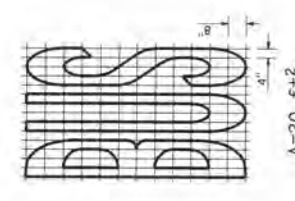
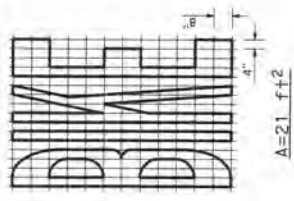
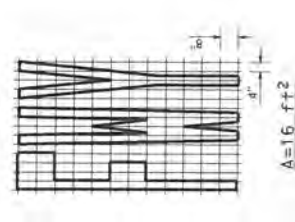
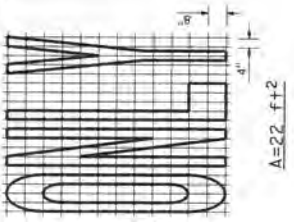
A 24D

NOTES:

1. If a message consists of more than one word, it should read "UP", i.e., the first word should be nearest the driver.
2. The space between words should be at least four times the height of the characters for low speed roads, but not more than ten times the height of the characters. The space may be reduced appropriately where there is limited space because of local conditions.
3. Minor variations in dimensions may be accepted by the Engineer.
4. Portions of a letter, number or symbol may be separated by connecting segments not to exceed 2" in width.

SHEET NO.	COUNT	ROUTE	POST MILES	SHEET TOTAL	SHEET TOTAL
JULY 20, 2012 PLANS APPROVAL DATE REGISTERED CIVIL ENGINEER THE STATE OF CALIFORNIA DEPARTMENT OF TRANSPORTATION THE ACCURACY OF THIS PLAN SHEET DEPENDS ON THE COMPLETION OF THE WORK					

TO ACCOMPANY PLANS DATED _____



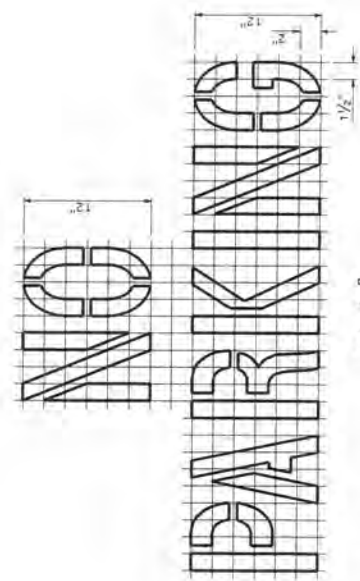
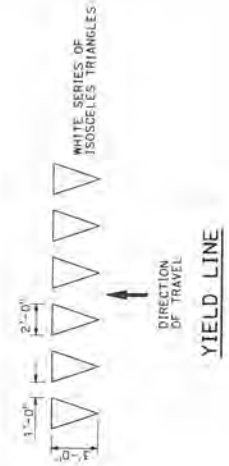
ITEM	f+2	ITEM	f+2
LANE	24	NO	14
POOL	23	BIKE	21
CAR	17	BUS	20
CLEAR	27	ONLY	22
KEEP	24	FWY	16

NOTES:

1. If a message consists of more than one word, it should read "yd", i.e., the first word should be nearest the driver.
2. The space between words should be at least four times the height of the characters for low speed roads, but not more than ten times the height of the characters for high speed roads. The space may be reduced appropriately where there is limited space because of local conditions.
3. Minor variations in dimensions may be accepted by the Engineer.
4. Portions of a letter, number or symbol may be separated by connecting segments not to exceed 2" in width.
5. The words "NO PARKING" pavement marking is to be used for parking restrictions. For typical locations of markings, see Standard Plans A30A and A30B.
6. The words "NO PARKING" shall be painted in white letters no less than 1/2" high on a contrasting background and located so that it is visible to traffic enforcement officials.



LIMIT LINE (STOP LINE)



STATE OF CALIFORNIA
DEPARTMENT OF TRANSPORTATION
**PAVEMENT MARKINGS
WORDS, LIMIT AND YIELD LINES**
NO SCALE

RSP A24E DATED JULY 20, 2012, SUPERSEDES STANDARD PLAN A24E
DATED MAY 20, 2011 - PAGE 11 OF THE STANDARD PLANS BOOK DATED 2010.

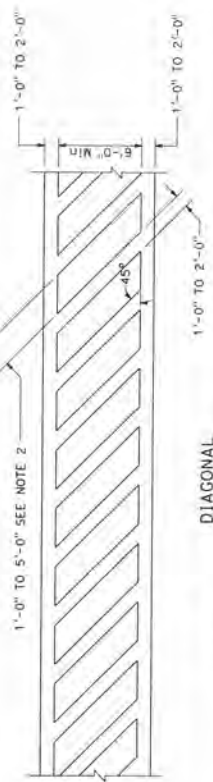
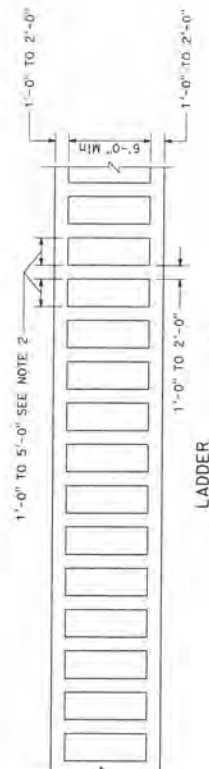
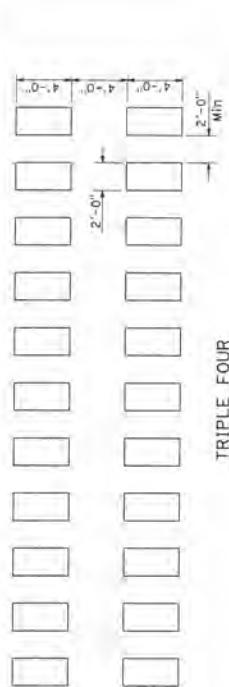
REVISED STANDARD PLAN RSP A24E

SHEET NO.	1	TOTAL SHEETS	1
COUNTY	ROUTE	POST MILES	TOTAL PROJECT
REGISTERED CIVIL ENGINEER JULY 20, 2012 PLANS APPROVAL DATE THE STATE OF CALIFORNIA DEPARTMENT OF TRANSPORTATION THE ACCURACY OF THIS PLAN SHEET THE ACCURACY OF COMPLETION OF PLANS CORRESPONDING TO THIS PLAN SHEET			

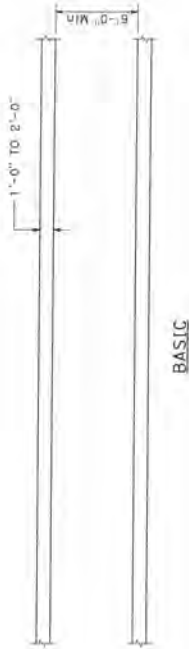
TO ACCOMPANY PLANS DATED _____

NOTES:

1. Spaces between markings should be placed in wheel tracks of each lane.
2. Spacings not to exceed 2.5 times width of longitudinal line.
3. All crosswalk markings must be white except for those near schools must be yellow.



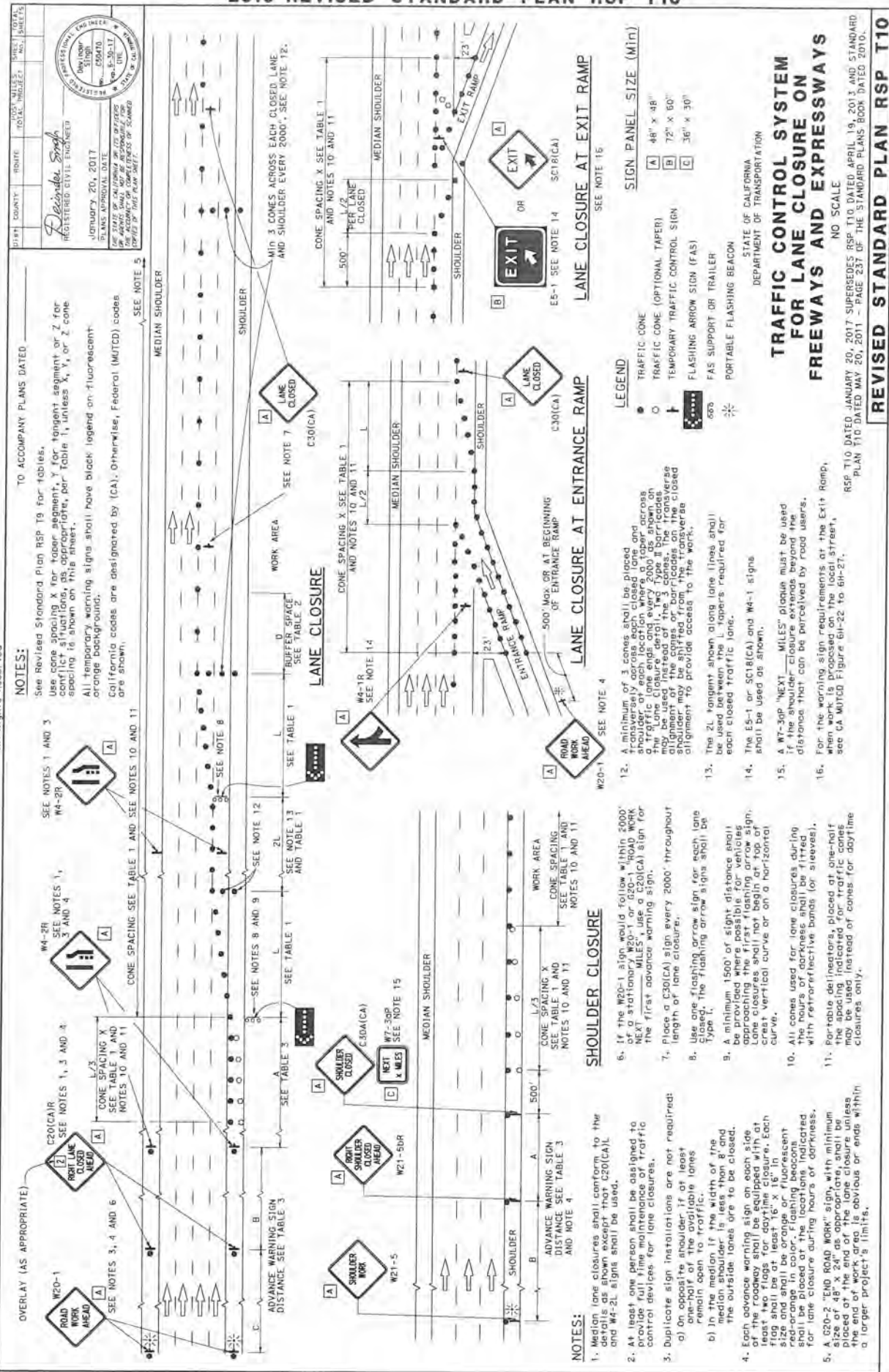
HIGHER VISIBILITY CROSSWALKS



STATE OF CALIFORNIA
DEPARTMENT OF TRANSPORTATION
**PAVEMENT MARKINGS
CROSSWALKS**

NO SCALE
RSP A24F DATED JULY 20, 2012 SUPPLEMENTS THE
STANDARD PLANS BOOK DATED 2010.

REVISED STANDARD PLAN RSP A24F





TO ACCOMPANY PLANS DATED



NOTES:

See Revised Standard Plan RSP 19 for tables.

Use cone spacing X for taper segment, Y for tangent segment or Z for conflict situations, as appropriate, per Table 1, unless X , Y , or Z cone spacing is shown on this sheet.

Unless otherwise specified in the special provisions, all temporary warning signs shall have black legend on fluorescent orange background. California codes are designated by (Ca). Otherwise, Federal (MUTCD) codes are shown.

LEGEND

SIGN PANEL SIZE (min)

TRAFFIC COME

A 401 x 401

TRAFFIC CONF (OPTIONAL TAPER)

B 361 8 1811

TEMPORARY TRAFFIC CONTROL SIGN

C 30" x 30"

FLASHING APPROX. 5100 (FAS)

FAS SUPPORT OR TRAILER

PORTABLE FLASHING BEACON

STATE OF CALIFORNIA
DEPARTMENT OF TRANSPORTATION

TRAFFIC CONTROL SYSTEM FOR LANE CLOSURE ON MULTILANE CONVENTIONAL HIGHWAYS

NO SCALE

RSP T11 DATED APRIL 19, 2013 SUPERSEDES STANDARD PLAN T11
DATED MAY 20, 2011 - PAGE 239 OF THE STANDARD PLANS BOOK DATED 2010.

REVISÉ STANDARD PLAN RSP T11

- NOTES:

1. Each advance warning sign shall be equipped with reflective sheeting. Signs with a yellow background shall be at least 16" x 16" in size and color shall be orange or fluorescent red-orange in color.
2. Flashed beacons shall be placed at the locations indicated for lane closure during hours of darkness.
3. A G20-2 "END ROAD WORK" sign, as appropriate, shall be placed at the end of the lane closure unless the end of work area is obvious, or ends within a larger project's limits.
4. If the W20-1 sign would follow within 3000' of a stationary W20-1 or G20-1 "ROAD WORK NEXT MILES", use a C20(CA) sign for the first advance warning sign.
5. All cones used for lane closures during the hours of darkness shall be fitted with reflective bands (or sleeves) as specified in the specifications.
6. Portable delineators, placed at one-half the spacing indicated for daytime closures may be used instead of cones for daytime closures only.

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SIGN PANEL SIZE (MIN)

A	48" x 48"
B	24" x 24"
C	36" x 18"

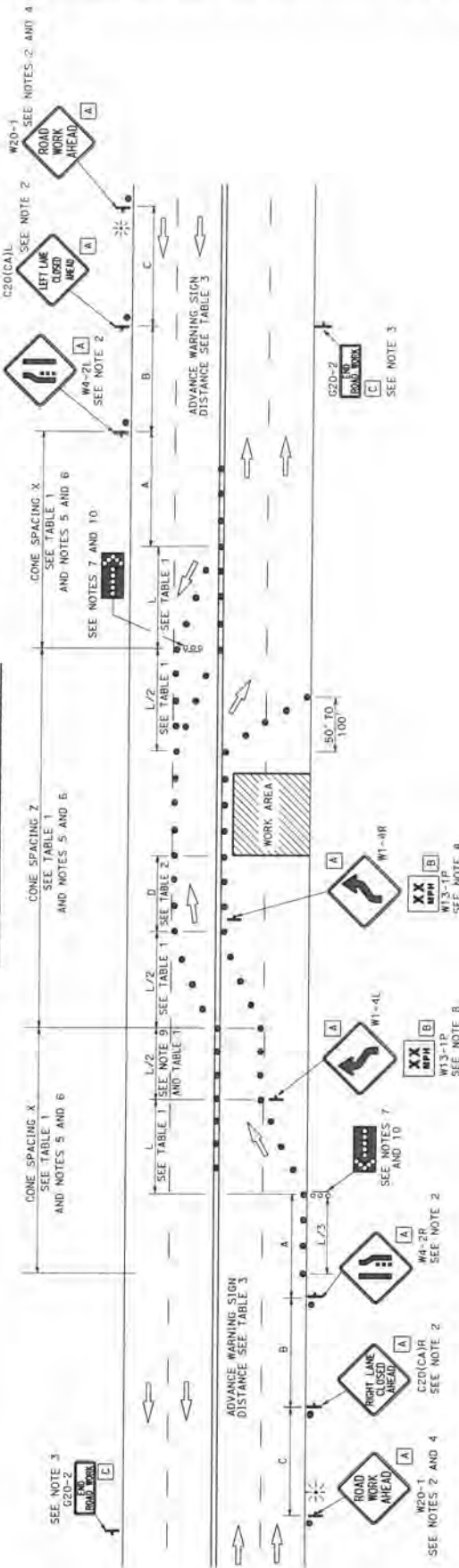
LEGEND

- TRAFFIC CONE
- TEMPORARY TRAFFIC CONTROL SIGN
- FLASHING ARROW SIGN (FAS)
- FAS SUPPORT OR TRAILER
- PORTABLE FLASHING BEACON

NOTES:

See Revised Standard Plan RSP T9 for tables.
Use cone spacing X for taper segment, Y for tangent segment or Z for conflict situations, as appropriate, per Table 1, unless X, Y, or Z cone spacing is shown on this sheet.
Unless otherwise specified in the special provisions, all temporary warning signs shall have black legend on fluorescent orange background.
California codes are designated by (CA). Otherwise, Federal (MUTCD) codes are shown.

TYPICAL HALF ROAD CLOSURE



NOTES:

- At least one person shall be assigned to provide full time maintenance of traffic control devices for lane closure unless, otherwise directed by the Engineer.
- Each advance warning sign in each direction of travel shall be equipped with at least two flags for daytime closure. Each flag shall be at least 12" x 12" and made of reflective material. Fluorescent red-orange control flags and beacons shall be placed at the locations indicated for lane closure during hours of darkness.
- A G20-2 "END ROAD WORK" sign, as appropriate, shall be placed at the end of the lane closure where the end of work area is obvious, or ends within a larger project's limits.
- If the W20-1 sign would follow within 200' of a stationing W20-1 or G20-1 "ROAD WORK NEXT AHEAD" sign, use a G20(CA) sign for the first advance warning sign.
- All cones used for lane closures during the hours of darkness shall be fitted with retroreflective bands (or sleeves) as specified in the specifications.

- Portable delineators, placed at one-half the spacing indicated for traffic cones, may be used instead of cones for daytime closures only.
- Flashing arrow signs shall be either Type I or Type II.
- Advisory speed will be determined by the Engineer. The W13-1P plaque will not be required when advisory speed is more than the posted or maximum speed limit.
- Unless otherwise specified in the special provisions, the tangent (L/2) shall be used.
- A minimum 1500' of sight distance shall be provided where possible for vehicles approaching the first flashing arrow sign. Lane closures shall not begin at the top of a vertical curve or on a horizontal curve.

STATE OF CALIFORNIA
DEPARTMENT OF TRANSPORTATION

**TRAFFIC CONTROL SYSTEM
FOR HALF ROAD CLOSURE ON
MULTILANE CONVENTIONAL
HIGHWAYS AND EXPRESSWAYS**

NO SCALE

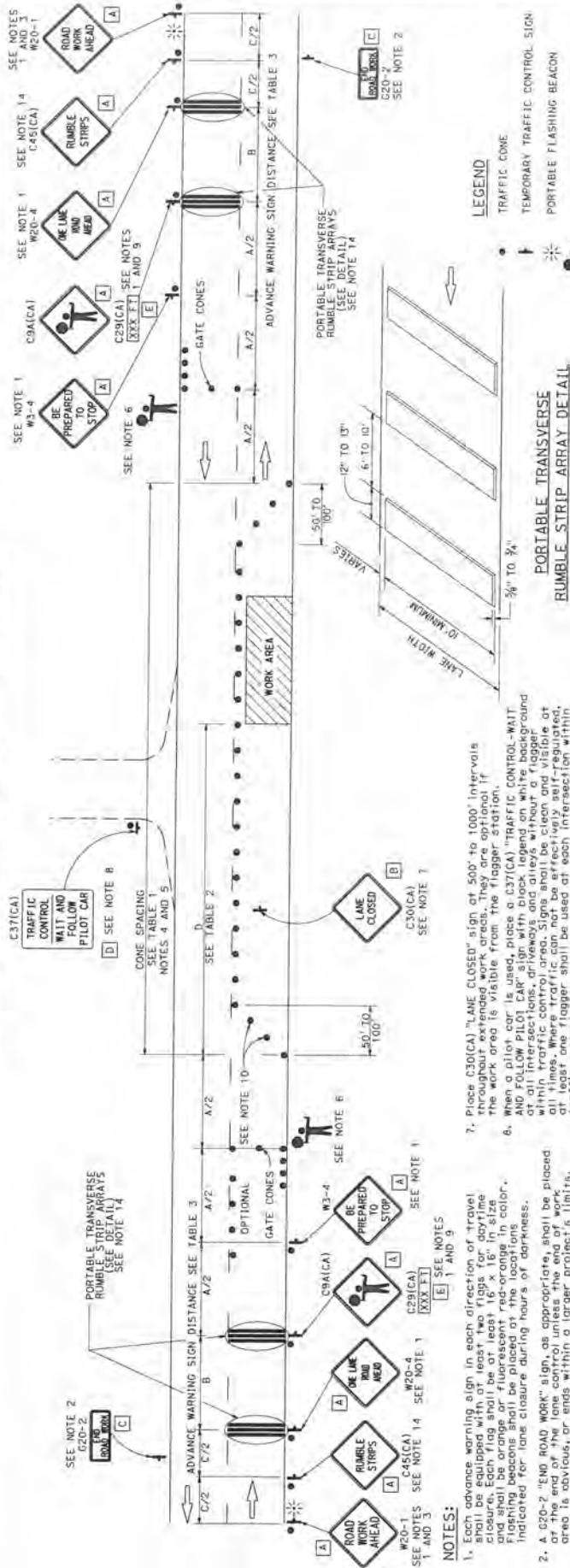
RSP T12 DATED APRIL 19, 2013 SUPERSEDES STANDARD PLAN T12
DATED MAY 20, 2011 - PAGE 240 OF THE STANDARD PLANS BOOK DATED 2010.

REVISED STANDARD PLAN RSP T12

NOTES:

See Revised Standard Plan RSP T9 for tables.
Use cone spacing X for taper segment, Y for tangent segment or Z for conflict situations, as appropriate, per Table 1, unless X, Y, or Z cone spacing is shown on this sheet.
Unless otherwise specified in the special provisions, all temporary warning signs shall have black legend on fluorescent orange background. California codes are designated by (CA), otherwise, Federal (MUTCD) codes are shown.

TYPICAL LANE CLOSURE WITH REVERSIBLE CONTROL



NOTES:

- Each advance warning sign in each direction of travel shall be equipped with at least two flags for daytime closure. Each flag shall be at least 16" x 16" in size and shall be fluorescent orange with black legend. Flashing beacons shall be placed at the ends of the work area indicated for lane closure during hours of darkness.
- A C20-2 "NO ROAD WORK" sign, as appropriate, shall be placed at the rear of the work area. If the work area is within the project limits, it shall be placed within 200' of a stationary sign for the first advance warning sign.
- If the W20-1 sign would work NEXT to the W20-4 sign for the first advance warning sign.
- All cones used for lane closures during the hours of darkness shall be fitted with retroreflective bands (or sleeves) as specified in the specifications.
- Portable delineators, placed at one-half the spacing of cones for traffic closures, may be used instead of cones for daytime closures only.
- Additional advance flaggers may be required. Flaggers should stand in a conspicuous place, be visible to approaching traffic as well as approaching vehicles, and be clearly visible to approaching traffic. The illumination footprint of the lighting on the ground shall be at least 20 ft in diameter, place a minimum of four 400' intervals in advance of flagger station as shown.
- Place C30(CA) "LANE CLOSED" sign at 500' to 1000' intervals throughout extended work areas. They are optional if the work area is visible from the flagger station.
- When a pilot car is used, place a C37(CA) "TRAFFIC CONTROL-WAIT AND FOLLOW PILOT CAR" sign with black legend on white background at all intersections, driveways and alleys without a flagger at the intersection. Signs shall be clean and visible at all times. Where traffic is not visible at the intersection, at least one flagger shall be used at each intersection within traffic control area.
- An optional C29(CA) sign may be placed below the C30(CA) sign.
- Either traffic cones or barricades shall be placed on the taper. Barricades shall be type I, II, or III.
- The color of the portable transverse rumble strips shall be black or orange. Use 2 arrays, each array shall consist of 3 rumble strips.
- Portable transverse rumble strips shall not be placed on sharp curves or at the ends of the work area. They shall be placed through pedestrian crossings.
- If the portable transverse rumble strips become out of alignment (skewed) by more than 6 inches, measured from one end to the other, they shall be readjusted to bring the placement back to the original location.
- Portable transverse rumble strips are not required if any one of the following conditions exist:
 - Work duration occupies a location for four hours or less.
 - Posted speed limit is below 45 MPH.
 - Work is of emergency nature.
 - Work zone is in snow or icy weather conditions.

SIGN PANEL SIZE (min)

A	48" x 48"
B	30" x 30"
C	36" x 18"
D	36" x 42"
E	20" x 7"

TRAFFIC CONTROL SYSTEM FOR LANE CLOSURE ON TWO LANE CONVENTIONAL HIGHWAYS

NO SCALE

RSP T13 DATED OCTOBER 30, 2015 SUPERSEDES
RSP T13 DATED OCTOBER 17, 2014, RSP T13 DATED JULY 18, 2014
AND RSP T13 DATED APRIL 19, 2013 AND STANDARD PLAN T13 DATED
MAY 20, 2011 - PAGE 241 OF THE STANDARD PLANS BOOK DATED 2010.

REVISED STANDARD PLAN RSP T13

APPENDIX B

Caltrans Working Day Calendars

CONSTRUCTION WORKDAY CALENDAR

Year 2017

JANUARY

SUN	MON	TUE	WED	THU	FRI	SAT
		944	945	946	947	
1	2	3	4	5	6	7
8	948	949	950	951	952	13
	10	11	12	13	14	
15	16	953	954	955	956	21
	22	957	958	959	960	27
	23	24	25	26	27	28
29	962	963	31			
	30					

FEBRUARY

			964	965	966	
			1	2	3	4
5	967	968	969	970	971	11
	6	7	8	9	10	
12	13	972	973	974	975	18
	14	15	16	17	18	
19	20	976	977	978	979	25
	21	22	23	24	25	
26	980	981	28			
	27	28				

MARCH

			982	983	984	
			1	2	3	4
5	985	986	987	988	989	11
	6	7	8	9	10	
12	990	991	992	993	994	18
	13	14	15	16	17	
19	995	996	997	998	999	25
	20	21	22	23	24	
26	1000	1	2	3	31	
	27	28	29	30		

APRIL

						1
	4	5	6	7	8	
2	3	4	5	6	7	8
	9	10	11	12	13	15
	14	15	16	17	18	22
16	17	18	19	20	21	
	19	20	21	22	23	29
23	24	25	26	27	28	
	30					

MAY

	24	25	26	27	28	
	1	2	3	4	5	6
	29	30	31	32	33	13
7	8	9	10	11	12	
	34	35	36	37	38	20
14	15	16	17	18	19	
	39	40	41	42	43	27
21	22	23	24	25	26	
	28	29	30	31		

JUNE

				46	47	
				1	2	3
4	48	49	50	51	52	10
	5	6	7	8	9	
	53	54	55	56	57	17
11	12	13	14	15	16	
	58	59	60	61	62	24
18	19	20	21	22	23	
	63	64	65	66	67	
25	26	27	28	29	30	

JULY

SUN	MON	TUE	WED	THU	FRI	SAT
1						1
	68		69	70	71	8
2	3	4	5	6	7	
	72	73	74	75	76	15
9	10	11	12	13	14	
	77	78	79	80	81	22
16	17	18	19	20	21	
	82	83	84	85	86	29
23	24	25	26	27	28	
	87	31				

AUGUST

		88	89	90	91	
		1	2	3	4	5
	92	93	94	95	96	12
6	7	8	9	10	11	
	97	98	99	100	101	19
13	14	15	16	17	18	
	102	103	104	105	106	26
20	21	22	23	24	25	
	107	108	109	110	31	
27	28	29	30			

SEPTEMBER

					111	
					1	2
		112	113	114	115	9
3	4	5	6	7	8	
	116	117	118	119	120	16
10	11	12	13	14	15	
	121	122	123	124	125	23
17	18	19	20	21	22	
	126	127	128	129	130	30
24	25	26	27	28	29	

OCTOBER

	131	132	133	134	135	
1	2	3	4	5	6	7
		136	137	138	139	14
8	9	10	11	12	13	
	140	141	142	143	144	21
15	16	17	18	19	20	
	145	146	147	148	149	28
22	23	24	25	26	27	
	150	151	31			
29	30					

NOVEMBER

			152	153	154	
			1	2	3	4
	155	156	157	158	159	11
5	6	7	8	9	10	
	159	160	161	162	163	18
12	13	14	15	16	17	
	164	165	166	167	168	25
19	20	21	22	23	24	
	167	168	169	170	30	
26	27	28	29			

DECEMBER

					171	
					1	2
	172	173	174	175	176	9
3	4	5	6	7	8	
	177	178	179	180	181	16
10	11	12	13	14	15	
	182	183	184	185	186	23
17	18	19	20	21	22	
	187	188	189	190	29	30
24	25	26	27	28		
	31					

247 Working Days

Rev. 3-08

CONSTRUCTION WORKDAY CALENDAR

Year 2018

JANUARY

SUN	MON	TUE	WED	THU	FRI	SAT
	1	191	192	193	194	5
	2		3	4		6
7	195	196	197	198	199	12
	8	9	10	11	12	13
14	15	200	201	202	203	19
	16	17	18	19	20	
21	204	205	206	207	208	26
	22	23	24	25	26	27
28	209	210	211	31		
	29	30				

FEBRUARY

				212	213	
				1	2	3
4	214	215	216	217	218	9
	5	6	7	8	9	10
11	12	219	220	221	222	16
	13	14	15	16	17	
18	19	223	224	225	226	23
	20	21	22	23	24	
25	227	228	229	28		
	26	27				

MARCH

				230	231	
				1	2	3
4	232	233	234	235	236	9
	5	6	7	8	9	10
11	237	238	239	240	241	16
	12	13	14	15	16	17
18	242	243	244	245	246	23
	19	20	21	22	23	24
25	247	248	249	250	251	30
	26	27	28	29	30	31

APRIL

1	252	253	254	255	256	6
	2	3	4	5	6	7
8	257	258	259	260	261	13
	9	10	11	12	13	14
15	262	263	264	265	266	20
	16	17	18	19	20	21
22	267	268	269	270	271	27
	23	24	25	26	27	28
29	272					
	30					

MAY

		273	274	275	276	
		1	2	3	4	5
6	277	278	279	280	281	11
	7	8	9	10	11	12
13	282	283	284	285	286	18
	14	15	16	17	18	19
20	287	288	289	290	291	25
	21	22	23	24	25	26
27	292	293	294	31		
	28	29	30			

JUNE

				295		
				1	2	
3	296	297	298	299	300	8
	4	5	6	7	8	9
10	301	302	303	304	305	15
	11	12	13	14	15	16
17	306	307	308	309	310	22
	18	19	20	21	22	23
24	311	312	313	314	315	29
	25	26	27	28	29	30

JULY

SUN	MON	TUE	WED	THU	FRI	SAT
	316	317		318	319	
1	2	3	4	5	6	7
8	320	321	322	323	324	13
	9	10	11	12	13	14
15	325	326	327	328	329	20
	16	17	18	19	20	21
22	330	331	332	333	334	27
	23	24	25	26	27	28
29	335	336	31			
	30					

AUGUST

			337	338	339	
			1	2	3	4
5	340	341	342	343	344	10
	6	7	8	9	10	11
12	345	346	347	348	349	17
	13	14	15	16	17	18
19	350	351	352	353	354	24
	20	21	22	23	24	25
26	355	356	357	358	359	31
	27	28	29	30		

SEPTEMBER

						1
2		360	361	362	363	7
	3	4	5	6	7	8
9	364	365	366	367	368	14
	10	11	12	13	14	15
16	369	370	371	372	373	21
	17	18	19	20	21	22
23	374	375	376	377	378	28
	24	25	26	27	28	29
30						

OCTOBER

	379	380	381	382	383	
	1	2	3	4	5	6
7		384	385	386	387	12
	8	9	10	11	12	13
14	388	389	390	391	392	19
	15	16	17	18	19	20
21	393	394	395	396	397	26
	22	23	24	25	26	27
28	398	399	400	31		
	29	30				

NOVEMBER

				401	402	
				1	2	3
4	403	404	405	406	407	9
	5	6	7	8	9	10
11		408	409	410	411	16
	12	13	14	15	16	17
18	412	413	414	21	22	23
	19	20	21	22	23	24
25	415	416	417	418	419	30
	26	27	28	29	30	

DECEMBER

						1
2	420	421	422	423	424	7
	3	4	5	6	7	8
9	425	426	427	428	429	14
	10	11	12	13	14	15
16	430	431	432	433	434	21
	17	18	19	20	21	22
23	435	24	25	436	437	28
	24	25	26	27	28	29
30	439	31				

249 Working Days

Rev. 2-08

CONSTRUCTION WORKDAY CALENDAR

Year 2019

JANUARY

SUN	MON	TUE	WED	THU	FRI	SAT
		1	440	441	442	5
	443	444	445	446	447	12
6	7	8	9	10	11	
13	14	15	16	17	18	19
20	21	22	23	24	25	26
27	28	29	30	31		

FEBRUARY

					461	2
	462	463	464	465	466	9
3	4	5	6	7	8	
10	11	12	13	14	15	16
17	18	19	20	21	22	23
24	25	26	27	28		

MARCH

				479	1	2
	480	481	482	483	484	9
3	4	5	6	7	8	
10	11	12	13	14	15	16
17	18	19	20	21	22	23
24	25	26	27	28	29	30
31						

APRIL

		500	501	502	503	6
	504	505	506	507	508	13
7	8	9	10	11	12	
14	15	16	17	18	19	20
21	22	23	24	25	26	27
28	29	30				

MAY

			521	522	523	4
	524	525	526	527	528	11
5	6	7	8	9	10	
12	13	14	15	16	17	18
19	20	21	22	23	24	25
26	27	28	29	30	31	

JUNE

						1
	543	544	545	546	547	8
2	3	4	5	6	7	
9	10	11	12	13	14	15
16	17	18	19	20	21	22
23	24	25	26	27	28	29
30						

JULY

SUN	MON	TUE	WED	THU	FRI	SAT
	563	564	565		566	6
	567	568	569	570	571	13
7	8	9	10	11	12	
14	15	16	17	18	19	20
21	22	23	24	25	26	27
28	29	30	31			

AUGUST

				585	586	3
	587	588	589	590	591	10
4	5	6	7	8	9	
11	12	13	14	15	16	17
18	19	20	21	22	23	24
25	26	27	28	29	30	31

SEPTEMBER

		607	608	609	610	7
1	2	3	4	5	6	
8	9	10	11	12	13	14
15	16	17	18	19	20	21
22	23	24	25	26	27	28
29	30					

OCTOBER

		627	628	629	630	5
	631	632	633	634	635	12
6	7	8	9	10	11	
13	14	15	16	17	18	19
20	21	22	23	24	25	26
27	28	29	30	31		

NOVEMBER

					649	2
	650	651	652	653	654	9
3	4	5	6	7	8	
10	11	12	13	14	15	16
17	18	19	20	21	22	23
24	25	26	27	28	29	30

DECEMBER

	667	668	669	670	671	7
1	2	3	4	5	6	
8	9	10	11	12	13	14
15	16	17	18	19	20	21
22	23	24	25	26	27	28
29	30	31				

248 Working Days

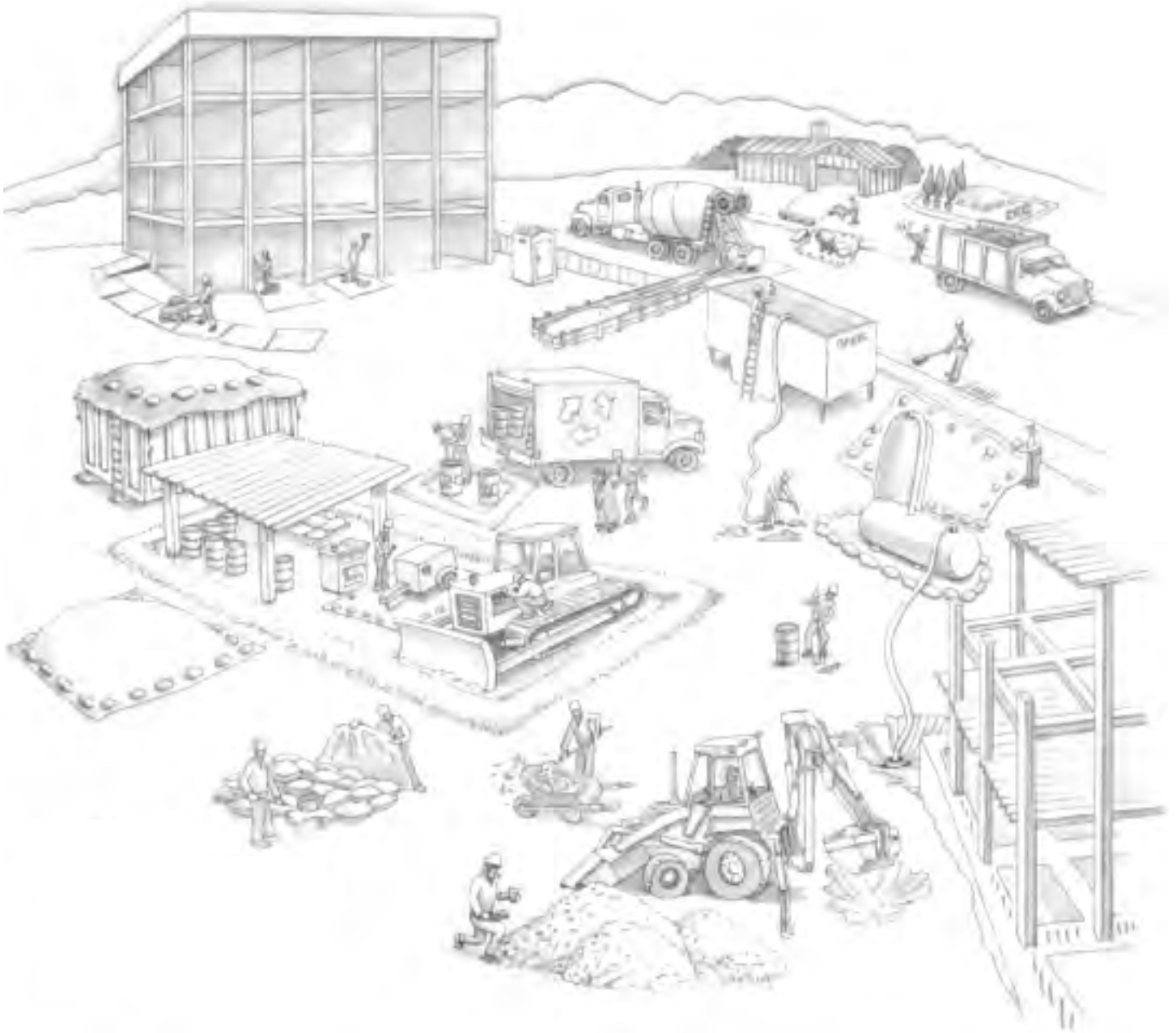
Rev. 2-08

APPENDIX C

Blueprint for a Clean Bay

Blueprint for a Clean Bay

Best Management Practices to Prevent Stormwater Pollution from Construction-Related Activities



The Bay Area Stormwater Management Agencies Association (BASMAA), a consortium of Bay Area municipalities from Alameda, Contra Costa, Marin, San Mateo, Santa Clara, Solano, and Sonoma Counties, developed this booklet as a resource for all general contractors, home builders, and subcontractors working on construction sites.

Project #13-31 Almond Grove Street Reconstruction
Phase II

Appendices - Page 21

Project Specifications

CONTENTS

Introduction.....	2
Stormwater Pollution.....	2
Storm Drain System	
Pollution From Construction Sites	
Adverse Effects from Stormwater Pollution	
Requirements for Dischargers.....	3
Municipal Stormwater Program	
Projects Equal To Or Greater Than 1 Acre	
California State Water Resources Control Board General Permit	
Notice of Intent (NOI)	
Storm Water Pollution Prevention Plan (SWPPP)	
Projects Less Than 1 Acre	
General Best Management Practices.....	3
Specific Best Management Practices	
Erosion Prevention and Sediment Control	4
Prevent erosion	
Control sediment	
General Site Maintenance.....	6
Prevent spills and leaks	
Clean up spills immediately after they happen	
Store materials under cover	
Cover and maintain dumpsters	
Collect and properly dispose of paint removal wastes	
Clean up paints, solvents, adhesives, and cleaning	
solutions properly	
Keep fresh concrete and cement mortars out of gutters,	
storm drains, and creeks	
Service and maintain portable toilets	
Dispose of cleared vegetation properly	
Demolition Waste Management.....	9
Make sure all demolition waste is properly disposed of	
Roadwork and Pavement Construction.....	9
Plan roadwork and pavement construction to avoid stormwater pollution	
Contaminated Poned Stormwater, Groundwater,	
and Soil Guidance	10
Look for ponded stormwater, groundwater, and/or soil contamination	
Take appropriate action	

Introduction

Stormwater pollution is a national environmental problem. In California, stormwater runoff is a major source of water pollution. To help combat the problems of stormwater pollution, federal and state governments have developed a program for monitoring and permitting discharges to municipal storm drain systems, creeks, and water bodies such as San Francisco Bay.

Municipalities in the Bay Area are required by the Clean Water Act to develop stormwater management programs that include requirements for construction activities. Your construction project will need to comply with local municipal requirements. If your construction activity will disturb one acre or more, you must also obtain coverage under the General Construction Activity Permit (see Requirements for Dischargers).

Blueprint for a Clean Bay is an introductory guide to stormwater quality control on construction sites. It contains several principles and techniques that you can use to help prevent stormwater pollution. BASMAA has developed this booklet as a resource for all general contractors, home builders, and subcontractors working on construction sites.

Blueprint for a Clean Bay is not a design manual or a Stormwater Pollution Prevention Plan (SWPPP) (see Requirements for Dischargers). For more information on the General Permit, designing stormwater quality controls, or producing a Stormwater Pollution Prevention Plan, please refer to:

- ☐ the California Stormwater Quality Association (CASQA) Stormwater Best Management Practice Handbook for Construction,
- ☐ the Regional Water Quality Control Board's (RWQCB) Guidelines for Construction Projects, or
- ☐ consult your local program or the State Water Resources Control Board (SWRCB) (see below).

Please note that this booklet is concerned only with the management of construction sites and activities during construction.

Stormwater Pollution

Storm Drain System

Stormwater or runoff from sources like sprinklers and hoses flows over the ground into the storm drain system. In the San Francisco Bay Area, storm drain systems consist of gutters, storm drains, underground pipes, open channels, culverts, and creeks. Storm drain systems are designed to drain directly to the Bay, Delta, or Pacific Ocean with no treatment.

Pollution From Construction Sites

Stormwater runoff is part of a natural hydrologic process. However, land development and construction activities can significantly alter natural drainage patterns and pollute stormwater runoff. Runoff picks up pollutants as it flows over the ground or paved areas and carries these pollutants into the storm drain system. Common sources of pollutants from construction sites include: sediments from soil erosion; construction materials and waste (e.g., paint, solvents, concrete, drywall); landscaping runoff containing fertilizers and pesticides; and spilled oil, fuel, and other fluids from construction vehicles and heavy equipment.

Adverse Effects from Stormwater Pollution

Stormwater pollution is a major source of water pollution in California. It can cause declines in fisheries, damage habitats, and limit water recreation activities. Stormwater pollution poses a serious threat to the overall health of the ecosystem.

For more information on stormwater requirements, call the State Water Resources Control Board's Stormwater Information Line at (916) 341-5537 or your local program.

Requirements for Dischargers

Municipal Stormwater Program

Municipalities in the Bay Area are required by federal regulations to develop programs to control the discharge of pollutants to the storm drain system, including the discharge of pollutants from construction sites and areas of new development or significant redevelopment. As a result, your development and construction projects are subject to new requirements designed to improve stormwater quality such as, expanded plan check and review, contract specifications, stormwater treatment measures, runoff monitoring, and increased site inspection. For more information on municipal requirements, please contact the municipal representative listed on the back cover of this booklet.

Projects Equal To Or Greater Than 1 Acre

If your construction activity will disturb one acre or more, you must obtain coverage under the General Construction Activity Storm Water Permit (General Construction Permit) issued by the SWRCB for stormwater discharges associated with construction activity. To obtain coverage under the General Permit, a Notice of Intent (NOI) must be filed with the SWRCB. The General Construction Permit requires you to prepare and carry out a “Stormwater Pollution Prevention Plan” or SWPPP. Your SWPPP must identify appropriate stormwater pollution prevention measures or best management practices (BMPs), like the ones described in this booklet, to reduce pollutants in stormwater discharges from the construction site both during and after construction is complete. A best management practice or BMP is defined as any program, technology, process, practice, operating method, measure, or device that controls, prevents, removes, or reduces pollution. The General Permit also requires permanent stormwater quality controls (see BASMAA's Start at the Source manual and CASQA's BMP Handbooks New Development and Redevelopment for examples). You should keep a copy of your SWPPP readily available onsite throughout construction.

Projects Less Than 1 Acre

If your project is less than one acre, you may still need to use BMPs to comply with local municipal requirements. Check with the local stormwater program (listed on back

Best Management Practices

cover), or planning or engineering department for details.

General Practices

The following are some general principles that can significantly reduce pollution from construction activity and help make compliance with stormwater regulations easy:

- ❑ Identify all storm drains, drainage swales and creeks located near the construction site and make sure all subcontractors are aware of their locations to prevent pollutants from entering them.
- ❑ Clean up leaks, drips, and other spills immediately so they do not contact stormwater.
- ❑ Refuel vehicles and heavy equipment in one designated location on the site and take care to clean up spills immediately.
- ❑ Wash vehicles at an appropriate off-site facility. If equipment must be washed on-site, do not use soaps, solvents, degreasers, or steam cleaning equipment, and prevent wash water from entering the storm drain. If possible, direct wash water to a low point where it can evaporate and/or infiltrate.
- ❑ Never wash down pavement or surfaces where materials have spilled. Use dry cleanup methods whenever possible.
- ❑ Avoid contaminating clean runoff from areas adjacent to your site by using berms and/or temporary or permanent drainage ditches to divert water flow around the site. Reduce stormwater runoff velocities by constructing temporary check dams and/or berms where appropriate.
- ❑ Protect all storm drain inlets using filter fabric cloth or other best management practices to prevent sediments from entering the storm drainage system during construction activities.
- ❑ Keep materials out of the rain — prevent runoff pollution at the source. Schedule clearing or heavy earth moving activities for periods of dry weather. Cover exposed piles of soil, construction materials and wastes with plastic sheeting or temporary roofs. Before it rains, sweep and remove materials from surfaces that drain to storm drains, creeks, or channels.

For more information on the General Permits, call the State Water Resources Control Board's Stormwater Information Line at (916) 341-5537 or your local program.

Best Management Practices

- ❑ Keep pollutants off exposed surfaces. Place trash cans around the site to reduce litter. Dispose of non-hazardous construction wastes in covered dumpsters or recycling receptacles.
- ❑ Practice source reduction — reduce waste by ordering only the amount you need to finish the job.
- ❑ Do not over-apply pesticides or fertilizers and follow manufacturers instructions for mixing and applying materials.
- ❑ Recycle leftover materials whenever possible. Materials such as concrete, asphalt, scrap metal, solvents, degreasers, cleared vegetation, paper, rock, and vehicle maintenance materials such as used oil, antifreeze, batteries, and tires are recyclable (check with the local planning or building department for more information).
- ❑ Dispose of all wastes properly. Materials that cannot be reused or recycled must be taken to an appropriate landfill or may require disposal as hazardous waste. Never throw debris into channels, creeks or into wetland areas. Never store or leave debris in the street or near a creek where it may contact runoff.
- ❑ Illegal dumping is a violation subject to a fine and/or time in jail. Be sure that trailers carrying your materials are covered during transit. If not, the hauler may be cited and fined.
- ❑ Train your employees and inform subcontractors about the stormwater requirements and their own responsibilities.



Specific Practices

Following is a summary of specific best management practices for erosion and sediment control and contractor activities. For more information on erosion and sediment control BMPs and their design, please refer to the RWQCB Erosion and Sediment Control Field Manual (August 2002), the CASQA Stormwater Best Management Practice Handbook for Construction (January 2003), and the Association of Bay Area Governments (ABAG) Manual of Standards for Erosion & Sediment Control Measures (May 1995).

Erosion Prevention and Sediment Control

Prevent erosion

Soil erosion is the process by which soil particles are removed from the land surface, by wind, water and/or gravity. Soil particles removed by stormwater runoff are pollutants that when deposited in local creeks, lakes, Bay or Delta, can have negative impacts on aquatic habitat. Exposed soil after clearing, grading, or excavation is easily eroded by wind or water. The following practices will help prevent erosion from occurring on the construction site:

- ❑ Plan the development to fit the topography, soils, drainage pattern and natural vegetation of the site.
- ❑ Delineate clearing limits, easements, setbacks, sensitive or critical areas, trees, drainage courses, and buffer zones to prevent excessive or unnecessary disturbances and exposure.
- ❑ Phase grading operations to reduce disturbed areas and time of exposure.
- ❑ Avoid excavation and grading during wet weather.
- ❑ Limit on-site construction routes and stabilize construction entrance(s) and exit(s).
- ❑ Remove existing vegetation only when absolutely necessary.
- ❑ Construct diversion dikes and drainage swales to channel runoff around the site.
- ❑ Use berms and drainage ditches to divert runoff around exposed areas. Place diversion ditches across the top of cut slopes.

Best Management Practices

- ❑ Plant vegetation on exposed slopes. Where replanting is not feasible, use erosion control blankets (e.g., jute or straw matting, glass fiber or excelsior matting, mulch netting).
- ❑ Consider slope terracing with cross drains to increase soil stability.
- ❑ Cover stockpiled soil and landscaping materials with secured plastic sheeting and divert runoff around them.
- ❑ As a back-up measure, protect drainage courses, creeks, or catch basins with fiber rolls, silt fences, sand/gravel bags and/or temporary drainage swales.
- ❑ Once grading is completed, stabilize the disturbed areas using permanent vegetation as soon as possible. Use temporary erosion controls until vegetation is established.
- ❑ Conduct routine inspections of erosion control measures especially before and immediately after rainstorms, and repair if necessary.
- ❑ fabric fences, block and gravel filters, catch basin filter inserts, excavated drop inlet sediment traps, or a combination of these.
- ❑ Collect and detain sediment-laden runoff in sediment traps (an excavated or bermed area or constructed device) to allow sediments to settle out prior to discharge.
- ❑ Use sediment controls and filtration to remove sediments from dewatering discharges.
- ❑ Prevent construction vehicle tires from tracking soil onto adjacent streets by constructing a temporary stone pad with a filter fabric underliner near the site exit where dirt and mud can be removed.
- ❑ When cleaning sediments from streets, driveways and paved areas on construction sites, use dry sweeping methods where possible. If water must be used to flush pavement, collect runoff to settle out sediments and protect storm drain inlets.

Note: Performance of erosion and sediment controls is dependent on proper installation, routine inspections and maintenance of the controls. Straw bale barriers are an example of a BMP that has not been as effective as expected due to improper use. Most of the BMPs described above are temporary and if left alone can quickly fall into disrepair and/or become ineffective. Routine inspections and maintenance, particularly before and after a storm event, must be part of any erosion and sediment control plan.

Control sediment

Sedimentation is defined as the process of depositing sediments carried away by runoff. Sediments consist of soil particles, clays, sands, and other minerals. The purpose of sediment control practices is to remove sediments from stormwater before they are transported off-site or reach a storm drain inlet or nearby creek. The most effective sediment control practices reduce runoff velocity and trap or detain runoff allowing sediments to settle out.

- ❑ Use terracing, rip rap, sand/gravel bags, rocks, fiber rolls, and/or temporary vegetation on slopes to reduce runoff velocity and trap sediments. Do not use asphalt rubble or other demolition debris for this purpose.
- ❑ Use check dams in temporary drains and swales to reduce runoff velocity and promote sedimentation.
- ❑ Protect storm drain inlets from sediment-laden runoff. Storm drain inlet protection devices include sand/gravel bag barriers, filter

The RWQCB's Field Manual, the CASQA Stormwater Best Management Practice Handbook for Construction, and the ABAG Manual of Standards for Erosion and Sediment Control provide specific details and design criteria for erosion and sediment control plans.



Drainage swales channel runoff around a construction site. Planting temporary vegetation on freshly graded areas, and trenching and staking fiber rolls and/or silt fences downslope are common techniques for preventing erosion and controlling sediment.

Best Management Practices



Make sure equipment repair area is bermed or well away from creeks and storm drains.

General Site Maintenance

Prevent spills and leaks

Poorly maintained vehicles and heavy equipment leaking fuel, oil, antifreeze, or other fluids on the construction site are common sources of stormwater pollution and soil contamination. Construction material spills can also cause serious problems. Careful site planning, preventive maintenance, and good materials handling practices can eliminate most spills and leaks.

- ☐ Maintain all vehicles and heavy equipment. Inspect frequently for and repair leaks.
- ☐ Designate specific areas of the construction site, well away from creeks or storm drain inlets, for vehicle and equipment parking and routine maintenance.
- ☐ Perform major maintenance, repair jobs and vehicle and equipment washing off-site when feasible, or in designated and controlled areas on-site.

- ☐ If you must drain and replace motor oil, radiator coolant, or other fluids on-site, use drip pans or drop cloths to catch drips and spills. Collect all spent fluids, store in labeled separate containers, and recycle whenever possible. Note that in order to be recyclable, such liquids must not be mixed with other fluids. Non-recycled fluids generally must be disposed of as hazardous wastes.

Clean up spills immediately after they happen

When vehicle fluids or materials such as paints or solvents are spilled, cleanup should be immediate, automatic, and routine.

- ☐ Sweep up spilled dry materials (e.g., cement, mortar, or fertilizer) immediately. Never attempt to “wash them away” with water, or bury them. Use only minimal water for dust control.

- ☐ Clean up liquid spills on paved or impermeable surfaces using “dry” cleanup methods (e.g., absorbent materials like cat litter, sand or rags).

- ☐ Clean up spills on dirt areas by digging up and properly disposing of the contaminated soil.

- ☐ Report significant spills to the appropriate spill response agencies immediately (See reference list on the back cover of this booklet for more information).



Clean up spills on dirt areas by removing contaminated soil.

Note: Used cleanup rags that have absorbed hazardous materials must either be sent to a certified industrial laundry or dry cleaner, or disposed of through a licensed hazardous waste disposal company.

Best Management Practices

Store materials under cover

Wet and dry building materials with the potential to pollute runoff should be stored under cover and/or surrounded by berms when rain is forecast or during wet weather.

- ❑ Store stockpiled materials and wastes under a temporary roof or secured plastic sheeting or tarp.
- ❑ Berm around storage areas to prevent contact with runoff.
- ❑ Plaster or other powders can create large quantities of suspended solids in runoff, which may be toxic to aquatic life and cause serious environmental harm even if the materials are inert. Store all such potentially polluting dry materials—especially open bags—under a temporary roof or inside a building, or cover securely with an impermeable tarp. By properly storing dry materials, you may also help protect air quality, as well as water quality.
- ❑ Store containers of paints, chemicals, solvents, and other hazardous materials in accordance with secondary containment regulations and under cover during rainy periods.



Store building materials under cover. Make sure dumpsters are properly covered to keep out rain.

Cover and maintain dumpsters

Open and/or leaking dumpsters can be a source of stormwater pollution.

- ❑ Cover open dumpsters with plastic sheeting or a tarp. Secure the sheeting or tarp around the outside of the dumpster. If your dumpster has a cover, close it.
- ❑ If a dumpster is leaking, contain and collect leaking material. Return the dumpster to the leasing company for repair/exchange.
- ❑ Do not clean dumpsters on-site. Return to leasing company for periodic cleaning, if necessary.

Collect and properly dispose of paint removal wastes

Paint removal wastes include chemical paint stripping

residues, paint chips and dust, sand blasting material and wash water. These wastes contain chemicals that are harmful to the wildlife in our creeks and the water bodies they flow to. Keep all paint wastes away from the gutter, street, and storm drains.

- ❑ Non-hazardous paint chips and dust from dry stripping and sand blasting may be swept up or collected in plastic drop cloths and disposed of as trash. Chemical paint stripping residue and chips and dust from marine paints or paints containing lead or tributyl tin must be disposed of as a hazardous waste.
- ❑ When stripping or cleaning building exteriors with high-pressure water, cover or berm storm drain inlets. If possible (and allowed by your local wastewater treatment plant), collect (mop or vacuum) building cleaning water and discharge to the sanitary sewer. Alternatively, discharge non-contaminated wash water onto a dirt area and spade into the soil. Be sure to shovel or sweep up any debris that remains in the gutter and dispose of as garbage.

Clean up paints, solvents, adhesives, and cleaning solutions properly

Although many paint materials can and should be recycled, liquid residues from paints, thinners, solvents, glues, and cleaning fluids are hazardous wastes. When

Best Management Practices

they are thoroughly dry, empty paint cans, used brushes, rags, absorbent materials, and drop cloths are no longer hazardous and may be disposed of as garbage.

- ☐ Never clean brushes or rinse paint containers into a street, gutter, storm drain, or creek.
- ☐ For water-based paints, paint out brushes to the extent possible and rinse to a drain leading to the sanitary sewer (i.e., indoor plumbing).
- ☐ For oil-based paints, paint out brushes to the extent possible, and filter and reuse thinners and solvents. Dispose of unusable thinners and residue as hazardous waste.
- ☐ Recycle, return to supplier or donate unwanted water-based (latex) paint. You may be able to recycle clean empty dry paint cans as metal (check with the local planning or building department for more information).
- ☐ Dried latex paint may be disposed of in the garbage.
- ☐ Unwanted paint (that is not recycled), thinners, and sludges must be disposed of as hazardous waste.
- ☐ More and more paint companies are recycling excess latex paint (check with the local planning or building department for more information).

Keep fresh concrete and cement mortars out of gutters, storm drains, and creeks

Concrete and cement-related mortars that wash into gutters and storm drains are toxic to fish and the aquatic environment.

- ☐ Locate mortar/stucco mixers inside bermed areas to avoid discharge to street or storm drains.
- ☐ Avoid mixing excess amounts of fresh concrete or cement mortar.
- ☐ Store dry and wet materials under cover, protected from rainfall and runoff.
- ☐ Wash out concrete transit mixers only in designated wash-out areas where the water will flow into settling ponds or onto dirt or stockpiles of aggregate base or sand. Pump water from settling ponds to the sanitary sewer, where allowed. Whenever possible, recycle washout by pumping back into

mixers for reuse. Never dispose of washout into the street, storm drains, drainage ditches, or creeks.

- ☐ Whenever possible, return contents of mixer barrel to the yard for recycling. Dispose of small amounts of excess concrete, grout, and mortar in the trash.

Service and maintain portable toilets

Leaking portable toilets are a potential health and environmental hazard.

- ☐ Inspect portable toilets for leaks.
- ☐ Be sure the leasing company adequately maintains, promptly repairs, and replaces units as needed.
- ☐ The leasing company must have a permit to dispose of waste to the sanitary sewer.
- ☐ Do not place on or near storm drain inlets.

Dispose of cleared vegetation properly

Cleared vegetation, tree trimmings, and other plant material can cause environmental damage if it gets into creeks. Such “organic” material requires large quantities of oxygen to decompose, which reduces the oxygen available for fish and other aquatic life.

- ☐ Do not dispose of plant material in a creek or drainage facility or leave it in a roadway where it can clog storm drain inlets.
- ☐ Avoid disposal of plant material in trash dumpsters or mixing it with other wastes. Compost plant material or take it to a landfill or other facility that composts yard waste (check with the local planning or building department for more information).



Recycle yard waste and tree prunings at a landfill that chips and composts plant material.

Demolition Waste Management

Make sure all demolition waste is properly disposed of

Demolition debris that is left in the street or pushed over a bank into a creek bed or drainage facility causes serious problems for flood control, storm drain maintenance, and the health of our environment. Different types of materials have different disposal requirements or recycling options.

- ❑ Materials that can be recycled from demolition projects include: metal framing, wood, concrete, asphalt, and plate glass.
- ❑ Materials that can be salvaged for reuse from old structures include: doors, banisters, floorboards, windows, 2x4s, and other old, dense lumber.
- ❑ Unusable, unrecycleable debris should be confined to dumpsters, covered at night and during wet weather, and taken to a landfill for disposal.
- ❑ Hazardous debris such as asbestos must be handled in accordance with specific laws and regulations and disposed of as a hazardous waste. For more information of asbestos handling and disposal regulations, contact the Bay Area Air Quality Management District.
- ❑ Arrange for an adequate debris disposal schedule to ensure that dumpsters do not overflow.
- ❑ Most local planning or building departments have lists of recycling and disposal services for construction and demolition debris.

Roadwork and Pavement Construction

Plan roadwork and pavement construction to avoid stormwater pollution

Road paving, surfacing, and asphalt removal happen right in the street, with numerous opportunities for stormwater pollution from the asphalt mix, saw-cut slurry, or excavated material. Properly proportioned asphalt mix and well-compacted pavement avoid a host of water pollution problems.

- ❑ Apply concrete, asphalt, and seal coat during dry weather to prevent contaminants from contacting stormwater runoff.
- ❑ Cover storm drain inlets and manholes when paving or applying seal coat, slurry seal, fog seal, etc.
- ❑ Always park paving machines over drip pans or absorbent materials, since they tend to drip continuously.
- ❑ When making saw-cuts in pavement, use as little water as possible. Cover each catch basin completely with filter fabric during the sawing operation and contain the slurry by placing sand/gravel bags around the catch basin. After the liquid drains or evaporates, shovel or vacuum the slurry residue from the pavement or gutter and remove from site.
- ❑ Wash down exposed aggregate concrete only when the wash water can: (1) flow onto a dirt area; (2) drain onto a bermed surface from which it can be pumped and disposed of properly; or (3) be vacuumed from a catchment created by blocking a storm drain inlet. If necessary, divert runoff with temporary berms. Make sure runoff does not reach gutters or storm drains.
- ❑ Allow aggregate rinse to settle, and pump the water to the sanitary sewer if allowed by your local wastewater authority.
- ❑ Never wash sweepings from exposed aggregate concrete into a street or storm drain. Collect and return to aggregate base stockpile, or dispose with trash.
- ❑ Recycle broken concrete and asphalt (check with the local planning or building department for more information).

Contaminated Ponded Stormwater, Groundwater, and Soil Guidance

Look for ponded stormwater, groundwater, and/or soil contamination

Ponded stormwater, groundwater and soil may become contaminated if exposed to hazardous materials. If any of the following conditions apply, contaminated ponded stormwater, groundwater, and/or soil may be present and pose a potential health and environmental hazard:

- ☐ The project site is in an area of previous commercial/industrial activity;
- ☐ There is a history of illegal dumping on the site or adjacent properties;
- ☐ The construction site is subject to a Superfund, state, or local cleanup order;
- ☐ Ponded stormwater, groundwater and/or water generated by dewatering exhibits an oily-sheen and/or smells of petroleum;
- ☐ Soil appears discolored, smells of petroleum and/or exhibits other unusual properties;

- ☐ Abandoned underground storage tanks, drums, or other buried debris are encountered during construction activities; or
- ☐ Spills have occurred on the site or adjacent properties involving pesticides and herbicides; fertilizers; detergents; plaster and other products; petroleum products such as fuel, oil, and grease; or other hazardous chemicals such as acids, lime, glues, paints, solvents, and curing compounds.

Take appropriate action

Ponded stormwater, groundwater, or water generated by dewatering that is contaminated cannot be discharged to a street, gutter, or storm drain. If contamination is suspected, the water should be contained and held for testing. Call the appropriate local agency and/or the Regional Water Quality Control Board for further guidance (See reference list on the back cover of this booklet for more information).

Remember: The property owner and the contractor share ultimate responsibility for the activities that occur on a construction site. You may be held responsible for any environmental damage caused by your subcontractors or employees.

Pollution Control Agencies and Sources of Information

Storm water quality management programs

Alameda Countywide Clean Water Program
951 Turner Court, Hayward, CA 94545
(510) 670-5543
www.cleanwaterprogram.com

Contra Costa Clean Water Program
255 Glacier Drive, Martinez, CA
94553-4897 (925) 313-2392
(800) NO DUMPING
www.cccleanwater.org

Fairfield-Suisun Urban Runoff Management Program
1010 Chadbourn Road
Fairfield, CA 94534 (707) 429-8930

Marin County Stormwater Pollution Prevention Program
3501 Civic Center Drive, Room 304,
San Rafael, CA 94903 (415) 499-6528
www.mcstoppp.org

San Francisco Stormwater Management Program
3801 3rd Street, Suite 600
San Francisco, CA 94124 (415) 695-7310
<http://stormwater.sfwater.org>

San Mateo Countywide Stormwater Pollution Prevention Program
555 County Center, Fifth Floor
Redwood City, CA 94063
(650) 363-4305
www.flowstobay.org

Santa Clara Valley Urban Runoff Pollution Prevention Program
699 Town & Country Village
Sunnyvale, CA 94086 (800) 794-2482
www.scvurppp.org

Sonoma County Water Agency
2150 West College Avenue
Santa Rosa, CA 95401
(707) 526-5370
www.scwa.org

Vallejo Sanitation and Flood Control District
450 Ryder Street, Vallejo, CA 94590
(707) 644-8949
www.vsfcd.com

Bay Area Stormwater Management Agencies Association (BASMAA)
1515 Clay Street, Suite 1400,
Oakland, CA 94612 (510) 622-2326
(888) BayWise www.basmaa.org

Agencies to call in the event of a spill

You are required by law to report all significant releases or suspected significant releases of hazardous materials, including oil.

To report a spill, call the following agencies:

1. Dial 911 or your local emergency response number.
2. Call the Governor's Office of Emergency Services Warning Center, (800) 852-7550 (24 hours).

For spills of "Federal Reportable Quantities" of oil, chemicals, or other hazardous materials to land, air, or water, notify the National Response Center (800-424-8802). If you are not sure whether the spill is of a "reportable quantity," call the federal Environmental Protection Agency (800) 424-9340 for clarification.

For further information, see *California Hazardous Material Spill/ Release Notification Guidance* (State Office of Emergency Services, Hazardous Materials Division).

Agencies to call if you find or suspect contaminated soil or groundwater

Regional Water Quality Control Board:

San Francisco Bay Region
(510) 622-2300

Central Valley Region
(916) 255-3000

California Environmental Protection Agency (Cal EPA), Department of Toxic Substances Control (DTSC)
(510) 540-3732

Documents and available resources

From State Water Resources Control Board (SWRCB)
(916) 341-5537
www.swrcb.ca.gov

General Construction Activity Storm Water Permit

From Friends of the San Francisco Estuary
(510) 622-2465
www.abag.ca.gov/bayarea/sfep

Field Manual

Guidelines for Construction Projects

Hold On to Your Dirt – Video

Keep it Clean – Video

From Association of Bay Area Governments (ABAG)
(510) 464-7900
www.abag.ca.gov

Manual of Standards for Erosion and Sediment Control Measures

From Cal EPA, DTSC
(916) 322-3670
www.dtsc.ca.gov

Waste Minimization for the Building Construction Industry - Fact Sheet

From California Stormwater Quality Association (CASQA)
www.cabmphandooks.com

Stormwater Best Management Practice Handbook – Construction

THANKS

BASMAA adapted this booklet from one originally developed and generously shared by the Santa Clara Valley Nonpoint Source Pollution Control Program.

Illustrations by John Finger

APPENDIX D
Town of Los Gatos
Storm Water Pollution Control Ordinance

ARTICLE III. - STORM WATER POLLUTION CONTROL

Sec. 22.30.010. - Definitions.

The following words and phrases, when used in this article, shall be as defined herein. Words and phrases used in this article and not otherwise defined shall be as defined in the regulations promulgated by the U.S. Environmental Protection Agency to implement the requirements of the federal Clean Water Act, or as defined by the State Water Resources Control Board to implement the California Water Code.

Applicable materials means all materials used in industrial or commercial establishments that are stored outdoors, that may be exposed to storm water, and that have the reasonable potential to degrade the quality of runoff from the site. These include, but are not limited to, all materials containing cadmium, chromium, copper, lead, mercury, nickel, selenium, silver, and zinc, which are pollutants that have specifically been identified as known to contribute to impairment of applicable water quality standards.

Deemed complete means that a project applicant has submitted a development application package for discretionary approval that is determined to be a complete and acceptable application by the development review committee. For public projects (funded and owned by the town), projects are deemed complete if funding has been approved by the town council and construction has been scheduled by October 15, 2003.

Discharge means the discharge, addition, placement, deposit, release or dumping of any pollutant or combination of pollutants to surface waters from any point source. This definition includes, but is not limited to, additions of pollutants into waters from: surface runoff and discharges through pipes, sewers, channels, or other conveyances owned by a state, municipality, or other person which do not lead to a treatment works.

Grease means, and includes, fats, oils, waxes, or other related constituents. Grease may be of mineral origin, including kerosenes, lubricating oil, and road oil. Grease may also be of vegetable or animal origin, including butter, lard, margarine, vegetable fats and oils, fats in meats, cereals, seeds, nuts, and certain fruits. Grease is generally present as, but need not be, a floatable solid, a liquid, a colloid, an emulsion, or in a solution.

Grease generating activity means any commercial or industrial activity that uses or produces grease on an ongoing basis.

Grease removal device means an interceptor or other mechanical device designed, constructed, and intended to remove, hold, or otherwise prevent the passage of grease to the (sanitary sewer or) municipal storm drain system.

Impervious surface means a constructed or modified surface that does not allow rainfall to percolate through to the subsoil and thus creates storm water runoff. Impervious surface includes, but is not limited to, building rooftops, pavement, sidewalks, patios, driveways or other hardscape where such surfaces are not constructed with pervious materials and/or are not designed so as to have zero (0) storm water discharge.

Interceptor means a receptacle or trap designed and constructed to intercept, separate, and prevent the passage of prohibited substances into the (sanitary sewer or) municipal storm drain system.

Major development or redevelopment project means a project that creates, adds, or replaces one (1) acre (forty-three thousand five hundred sixty (43,560) square feet) or more of impervious surface, for those project applications that are deemed complete on or after October 15, 2003. For those project applications that are deemed complete on or after April 15, 2005, a major development or redevelopment project means a project that creates, adds, or replaces ten thousand (10,000) square feet or more of impervious surface.

Municipal storm drain system means and includes, but shall not be limited to, those facilities within the municipality by which storm water may be conveyed to waters of the United States, including any roads with drainage systems, municipal streets, catch basins, curbs, gutters, ditches, manmade channels or storm drains, which are not part of a publicly owned treatment works (POTW).

NPDES permit means a valid National Pollutant Discharge Elimination System permit issued by the California Regional Water Quality Control Board, San Francisco Bay Region, in accordance with regulations promulgated by the U.S. Environmental Protection Agency to implement the requirements of the federal Clean Water Act.

Pollutants mean and include all sewage, sewage sludge, garbage, biological materials, radioactive materials, and chemical, industrial, and agricultural waste discharged into water.

Project with significant pollution potential means any project determined by the town to be likely to have sources of pollutants on-site and/or to contribute pollutants to stormwater after project completion, based on a review of the proposed uses of or activities planned for the site.

Storm water means all rainfall runoff, surface runoff, and drainage.

Watercourses mean and include all natural waterways and definite channels and depressions in the earth that carry water, even though such waterways may only carry water during rains and storms and may not carry storm water at and during all times and seasons. Watercourses include facilities owned and operated by the Santa Clara Valley Water District.

(Ord. No. 1940, § I, 5-3-93; Ord. No. 2125, § I, 1-20-04)

Sec. 22.30.015. - Requirements for non-storm water discharges.

- (a) *Discharge prohibition.* No person shall discharge or cause to be discharged into the municipal storm drain system or watercourses any materials other than storm water. In addition, no person shall discharge or cause to be discharged into the municipal storm drain system or watercourses, any pollutants or waters containing any pollutants that cause or threaten to contribute to a violation of applicable water quality standards. It shall also be unlawful to discharge, or cause to be discharged into any storm drain or natural outlet or channel, any sewage, industrial waste or other polluted waters or materials without a valid NPDES permit or written authority from the U.S. Environmental Protection Agency or its designated enforcement agent.
- (b) *Exceptions to discharge prohibition.* The preceding discharge prohibition shall not apply to any discharge that is specifically authorized by an NPDES permit to flow to a storm drain or natural outlet or channel. In addition, the California Regional Water Quality Control Board, San Francisco Bay Region, has determined that the discharge prohibition shall not apply to the following "permissible" activities: water line flushing, landscape irrigation/lawn watering, uncontaminated foundation drains, uncontaminated non-industrial roof drains, irrigation water, uncontaminated groundwater infiltration, residential car washings, flows from fire fighting, flows from potable water sources, and dechlorinated swimming pool waters.
- (c) *Protection against accidental discharge.* The owner or operator of a commercial or industrial establishment shall provide reasonable protection from accidental discharge of prohibited materials or other wastes into the municipal storm drain system or watercourses. Facilities to prevent accidental discharge of prohibited materials or other wastes shall be provided and maintained at the owner or operator's expense.
- (d) *Report of accidental discharges.* Where an accidental discharge of prohibited materials or other wastes has entered the municipal storm drain system or a watercourse, such incident shall be reported to West Valley Sanitation District as soon as possible, but in no event later

than twenty-four (24) hours after such a discharge. An accidental discharge of toxics must be reported immediately to Central Fire District—Phone 911. If the accidental discharge of prohibited materials or other wastes emanates from a commercial or industrial establishment, the owner or operator of such establishment shall also retain an on-site written record of the discharge and the actions taken to prevent its recurrence. Such records shall be retained for at least three (3) years. A notice shall be permanently posted in a conspicuous place on the premises of each commercial or industrial establishment advising employees of the department or agency to call in case of such an accidental discharge.

(Ord. No. 1940, § I, 5-3-93)

Sec. 22.30.020. - Water protection.

- (a) *Watercourse protection requirements.* Every person owning property through which a watercourse passes, or such person's lessee, shall keep and maintain that part of the watercourse within the property reasonably free of trash, debris, excessive vegetation, and other obstacles that would pollute, contaminate, or significantly retard the flow of water through the watercourse. In addition, the owner or lessee shall maintain existing privately owned structures within or adjacent to a watercourse, so that such structures will not become a hazard to the use, function, or physical integrity of the watercourse. The owner or lessee shall not remove healthy bank vegetation beyond that actually necessary for maintenance, nor remove said vegetation in such a manner as to increase the vulnerability of the watercourse to erosion.
- (b) *Acts requiring permit.* No person shall commit or cause to be committed any of the following acts unless a written permit has first been obtained from the building and engineering services department:
 - (1) Discharge into or connect any pipe or channel to a watercourse;
 - (2) Modify the natural flow of water in a watercourse;
 - (3) Carry out development within a setback designed in whole or in part to protect a watercourse;
 - (4) Deposit in, plant in, or remove any material from, a watercourse, including its banks, except as required for necessary maintenance;
 - (5) Construct, alter, enlarge, connect to, change, or remove any structure in a watercourse; or
 - (6)

Place any loose or unconsolidated material along the side of or within a watercourse or so close to a side as to cause a diversion of the flow, or to cause a probability of such material being carried away by storm water passing through such watercourse.

(Ord. No. 1940, § I, 5-3-93)

Sec. 22.30.025. - Outdoor storage of materials.

- (a) *Proper outdoor storage of materials required.* All applicable materials stored outdoors at a commercial or industrial establishment shall be managed in a manner that minimizes the discharge of pollutants to storm water and as is required to meet water quality standards. Establishments covered by the general NPDES permit for storm water discharges "associated with industrial activities" that has been promulgated for Santa Clara County by the California Regional Water Quality Control Board, San Francisco Bay Region, shall address this requirement in applicable provisions of their storm water pollution prevention plan.
- (b) *Protection against accidental discharge.* The owner or operator of a commercial or industrial establishment shall provide reasonable protection from accidental discharge of applicable materials to the municipal storm drain system or watercourses. Specifically, secondary containment systems or equivalent measures approved by Building and Engineering Services Department shall be provided for all applicable materials that are liquids. All facilities to prevent the accidental discharge of applicable materials to the municipal storm drain system and watercourses shall be provided and maintained at the owner or operator's expense.
- (c) *Report of accidental discharge to the storm drain.* Where applicable materials have entered the municipal storm drain system or a watercourse due to an accidental discharge at a commercial or industrial establishment, the owner or operator of such establishment shall report such incident to Central Fire Protection District as soon as possible, but in no event later than twenty-four (24) hours after such a discharge. The owner or operator of such establishment shall also retain an on-site written record of all accidental discharges of applicable materials (whether or not such discharge actually entered the municipal storm drain system or a watercourse) and the actions taken to prevent their recurrence. Such records shall be retained for at least five (5) years. A notice shall be permanently posted in a conspicuous place on the premises of each commercial or industrial establishment advising employees of the department or agency to call in case of such an accidental discharge.

(Ord. No. 1940, § I, 5-3-93)

Sec. 22.30.030. - Grease disposal and control.

- (a) *Grease disposal prohibited.* No person shall dispose of any grease, or cause any grease to be disposed, by discharge into any drainage piping, (any public or private sanitary sewer), any part of the municipal storm drain system, or any land, street, public way, river, stream, or other watercourse.
- (b) *Grease removal device required.* The owner or operator of every newly constructed, remodeled, or converted commercial or industrial establishment with one (1) or more grease generating activities shall install or cause to be installed for each grease generating activity, a grease removal device (of an approved design) for preventing the passage of grease to the municipal storm drain system and watercourses.
- (c) *Maintenance of grease removal devices required.* The contents of all grease removal devices shall be removed periodically as necessary to prevent a violation of this chapter. At a minimum, the contents shall be removed every ninety (90) days. All grease removal devices shall be kept in good repair, and shall be maintained in continuous operation at the owner or operator's expense.

(Ord. No. 1940, § I, 5-3-93)

Sec. 22.30.035. - New development/redevelopment.

- (a) *Storm water management required for major projects.* Every applicant for a building permit and/or grading permit for a major development or redevelopment project shall identify the potential for storm water to be discharged from the project site following completion of construction activity and shall demonstrate that the plans, drawings, or specifications for such project include the installation of management techniques, practices, and control measures designed to mitigate the potential adverse impacts of storm water that may be discharged from the project site on an ongoing basis, including storm water treatment measures. In addition, applicants for building and/or grading permits for projects with significant pollution potential may be required to demonstrate that sources of pollutants will be controlled onsite with appropriate measures. The storm water management techniques, practices, and control measures ("mitigation measures") shall be selected, designed, and maintained in accordance with the town's current NPDES storm water discharge permit, and the town's policy for storm water management requirements for new development and redevelopment projects.

(b)

Issuance of permits. The town shall not issue a building permit or a grading permit for a major development or redevelopment project or a project with significant pollution potential until it has reviewed the mitigation measures proposed by the applicant pursuant to the preceding paragraph and determined that they are sufficient to address the potential adverse impacts of storm water that may be discharged from the project site on an ongoing basis.

- (c) *Occupancy.* The town shall not issue a certificate of occupancy for a major development or redevelopment project or a project with significant pollution potential until it has determined that the mitigation measures identified in the building permit and/or the grading permit issued for such project have been adequately implemented and that appropriate arrangements have been made to ensure that these management techniques, practices, and control measures will be maintained on an ongoing basis, in accordance with the town's current NPDES storm water discharge permit and the town's policy for storm water management requirements for new development and redevelopment project.

(Ord. No. 1940, § I, 5-3-93; Ord. No. 2125, § II, 1-20-04)

Sec. 22.30.040. - Enforcement.

- (a) *Criminal penalties.* Any person who knowingly violates any provision of this article shall be guilty of a misdemeanor and upon conviction thereof shall be punishable by imprisonment in the county jail for a term not to exceed six (6) months or by a fine not to exceed one thousand dollars (\$1,000.00) or by both. Each and every violation of this article shall constitute a separate offense. Every day each such violation continues shall be an additional offense.
- (b) *Civil penalties.* Any person who discharges any applicable materials, greases or pollutants into a watercourse or the municipal storm drain system in violations of any provision of this article shall be civilly liable to the Town of Los Gatos in a sum not to exceed two thousand dollars (\$2,000.00) per day for each day in which the violation occurs. In determining the amount of such award, the court shall consider proof of such matters as justice may require. Subsequent or repeated violation, which are not committed contemporaneously with the initial violation, shall be treated as separate cause of action and shall be subject to a separate award of damages.
- (c) *Civil liability.* Any person who violates any provision of this article shall be civilly liable to the Town of Los Gatos for all costs, including attorneys fees, associated with the investigation, elimination and remediation of environmental conditions caused by the discharge of pollutants into the municipal storm drain system or a watercourse in violation of this article.

- (d) *Remedies cumulative.* The remedies provided for in this article are cumulative and not exclusive and shall be in addition to any and all other remedies available to the Town of Los Gatos under state and federal law.

(Ord. No. 1940, § I, 5-3-93)

Sec. 22.30.045. - Inspection and right of entry.

- (a) Whenever deemed necessary to make an inspection to ensure compliance with the requirements of this article or to enforce any provision of this article, or whenever the Town officer or agent, has reasonable cause to believe that there may be any condition upon any property or in any structure that may violate the requirements of this article, the authorized Town officer or agent may enter such property or structure at all reasonable times to inspect the same or to perform any duty imposed upon the Town officer or agent by this article. Should entry be refused, the officer or agent shall have recourse to every remedy provided by law to gain entry.
- (b) When a Town officer or agent has first obtained a property inspection or search warrant or other remedy provided by law to secure entry, no person having charge, care or control of any building or property shall fail or neglect after proper request is made as herein provided, to promptly permit entry by the authorized officer or agents. Violation of this subsection shall be a misdemeanor.

(Ord. No. 1990, § II, 10-17-94)