

CITY OF SEBASTOPOL
CITY COUNCIL
STAFF REPORT

Meeting Date: January 17, 2017
To: Honorable Mayor and Honorable City Councilmembers
From: Henry Mikus, Engineering Manager
Subject: Approval of Request to Issue Bid Package - Repair of Bodega Avenue/High Street Pedestrian Crosswalk
Recommendation: Adopt Minute Order authorizing staff to advertise for bids.
Funding: Currently Budgeted: Yes No N/A
Net General Fund Cost: \$ none
\$238,299 Engineer's cost estimate; would be paid for from the Pavement Fund

INTRODUCTION: Staff is asking for authorization from Council regarding issuing the bid package for the Bodega-High intersection pavement and crosswalk repair project that is listed in the current Capital Improvement Plan (CIP).

BACKGROUND: A crosswalk with in-pavement flashing lights activated via push-buttons was installed at the intersection of Bodega Avenue and High Street several years ago. For this intersection, existing pavement remained in place and had cut-outs put in to fit the flashing lights, which were relatively flush with the pavement. However, the pavement has deteriorated and has resulted in broken or dislodged lights. In order to maintain a functional flashing light crosswalk, the pavement should either be repaired or replaced. A potential project was listed in the FY 15-16 CIP for repairing the pavement and the crosswalk lights.

DISCUSSION:

At the November 1, 2016 Council meeting, staff was directed to prepare a design and bid package for the work. This was done primarily in-house for time and cost savings. The bid package is presented for Council approval to go to bid. The work consists of removing pavement including lower layers beyond the wearing surface, adding geogrid to stabilize the underlying soil, and repaving the intersection. The pavement design reflects the experience gained by staff from previous intersection and crosswalk work.

The project had a \$100,000 budget, and was listed again in the new CIP for the current fiscal year. This budget amount was a "place-holder", as the true cost of the work cannot be accurately figured until the condition of the layers below the wearing surface layer are thoroughly examined as pavement is removed. However, based on experience recently gleaned from design work on the Willow Street repaving project, a revised engineer's cost estimate has been prepared that includes work to stabilize the layers below the wearing surface. The updated estimate is approximately \$240,000 with the majority of the increase from the stabilization work that will be employed. The Pavement fund has a balance sufficient to accommodate the cost increase.

RECOMMENDATION: Staff requests the City Council to Adopt Minute Order authorizing staff to advertise for bids and conduct the competitive procurement process.

ATTACHMENT(S):

Bid Package
Project Plans
Engineer's Cost Estimate

INVITATION FOR BIDS

**CONTAINING
NOTICE TO BIDDERS
INFORMATION FOR BIDDERS
SPECIAL PROVISIONS
PROPOSAL AND CONTRACT FORMS**

FOR CONSTRUCTION OF

**BODEGA AVENUE/HIGH STREET
INTERSECTION IMPROVEMENTS**

Contract No. 2016-16

**IN THE
CITY OF SEBASTOPOL**

BID OPENING DATE

**March 2 , 2017
3:00 PM**

ISSUED BY

**ENGINEERING DIVISION
CITY OF SEBASTOPOL
714 Johnson Street
Sebastopol, CA 95472
(707) 823-2151**

Henry Mikus, Engineering Manager

**CITY OF SEBASTOPOL
CONTRACT DOCUMENTS AND SPECIFICATIONS**

TABLE OF CONTENTS

NOTICE TO BIDDERS

**PART I
BIDDING AND CONTRACT DOCUMENTS**

**PART II
GENERAL CONDITIONS**

**PART III
SPECIAL PROVISIONS**

**PART IV
SPECIFICATIONS**

APPENDICES

<u>ID</u>	<u>Description</u>
A	General Guidelines for Construction Activities Erosion and Sediment Control and Minimization of Hazardous Materials Contact with Stormwater
B	Project Plans

NOTICE TO BIDDERS

Sealed proposals will be received by the Engineering Manager, Engineering Division, 714 Johnson Street, Sebastopol, California 95472, up to the hour of **3:00 PM Thursday, March 2, 2017** for:

BODEGA AVENUE/HIGH STREET INTERSECTION IMPROVEMENTS Contract 2016-16

In accordance with the applicable provisions of the Labor Code, the Director of Industrial Relations, State of California has determined the general prevailing wage rates. Copies of those rates are on file with the City Engineer.

Plans and specifications may be examined at the office of the Sebastopol Public Works Department, 714 Johnson Street, Sebastopol, California 95472, and may be obtained upon payment of Twenty Dollars (\$20.00). There will be no refund for plans and specifications. Bidders must possess a valid **Class A or C12** license in accordance with the provisions of the State Contractor's License Act. Questions regarding the project plans, and specifications, or other contract provisions, bonding, and insurance shall be addressed to the City Engineer, Joseph Gaffney at (707) 823-2151.

Proposals for the job must be submitted on the proposal forms included in these specifications without removal therefrom. Proposals shall be enclosed in an envelope marked:

BODEGA AVENUE/HIGH STREET INTERSECTION IMPROVEMENTS Contract 2016-16

Each proposal must be accompanied by cash, or an unconditional certified bid bond or check made payable to the City of Sebastopol, and such cash, check, or bond shall be in an amount equal to at least ten percent (10%) of the amount of the bid.

Notice is hereby given that for any moneys earned by the contractor and withheld by the City to ensure performance of the contract, the contractor may, at his request and expense, substitute securities equivalent to the amount withheld in the form and manner and subject to the conditions provided in Chapter 13 (commencing with Section 4590), Division 5, Title 1 of the Government Code of the State of California.

The City Council of the City of Sebastopol reserves the right to reject any and all bids and to waive any informality in any bid received. The award of the contract, if it were awarded, will be to the lowest responsible bidder whose proposal complies with all the requirements prescribed.

By order of the City Council of the City of Sebastopol, Sonoma County, California.

CITY OF SEBASTOPOL

Joseph Gaffney, City Engineer

PART I
BIDDING AND CONTRACT DOCUMENTS

SECTION	TITLE	PAGE
1	Receipt and Opening of Bids	I- 1
2	Preparation of Bid	I- 1
3	Subcontractors	I- 1
4	Site Visit	I- 1
5	Telegraphic Modifications	I- 1
6	Qualification of Bidder	I- 2
7	Bid Security	I- 2
8	Liquidated Damages for Failure to Enter Into Contract	I- 2
9	Time of Completion and Liquidated Damages	I- 2
10	Conditions of Work	I- 2
11	Addenda and Interpretations	I- 3
12	Security for Faithful Performance	I- 3
13	Power of Attorney	I- 3
14	Laws and Regulations	I- 3
15	Method of Award - Lowest Qualified Bidder	I- 3
16	Obligation of Bidder	I- 4
17	Workmen's Compensation Insurance	I- 3
18	Wage Scale	I- 4
19	Hours of Labor	I- 4
20	Apprentices	I- 4
21	Labor Discrimination	I- 5
22	City Water	I- 5
23	Safety Standards and Accident Prevention	I- 5

BID DOCUMENTS, CONTRACT DOCUMENTS AND INSURANCE REQUIREMENTS

BIDDER'S PROPOSAL	I- 6
BID SCHEDULE	I- 7
STATEMENT OF EXPERIENCE OF BIDDER	I- 10
LIST OF SUBCONTRACTORS	I- 11
BID BOND	I- 12
NON-COLLUSION AFFIDAVIT	I- 13
CONTRACT	I- 14
100% PERFORMANCE BOND	I- 16
50% PAYMENT BOND	I- 18
INSURANCE REQUIREMENTS FOR CONTRACTORS	I- 20

PART 1
INFORMATION FOR BIDDERS

Section 1 Receipt and Opening of Bids:

The City of Sebastopol (herein called the Owner) invites bids on the form attached hereto, all blanks of which must be appropriately filled in. Bids will be received by the Owner at the office of the Engineering Manager until 3:00 PM Thursday, February 2, 2017, and then at said office publicly opened and read aloud. The envelopes containing the bids must be sealed, addressed to the Engineering Manager, Engineering Division, 714 Johnson Street, Sebastopol, California, 95472, and designated as bid for:

BODEGA AVENUE/HIGH STREET INTERSECTION IMPROVEMENTS
Contract 2016-16

The Owner may find any bid not prepared and submitted in accordance with the provisions hereof non-responsive and may waive any informality or reject any and all bids. Any bid may be withdrawn before the postponement thereof. Any bid received after the time and date specified shall not be considered. No bidder may withdraw within 30 days after the actual date of the opening thereof.

Section 2 Preparation of Bid:

BIDS SHALL BE SUBMITTED ON THE FORMS PROVIDED IN THIS DOCUMENT WITHOUT REMOVAL THEREIN.

All blank spaces for bid prices must be filled in, in ink or typewriter, and the foregoing Certification must be fully completed and executed when submitted.

Each bid must be submitted in a sealed envelope bearing on the outside the name of the bidder, his address, and the name of the project for which the bid is submitted. If forwarded by mail, the sealed envelope containing the bid must be enclosed in another envelope addressed as specified in the bid form.

Section 3 Subcontractors:

The bidder is specifically advised that any person, firm, or other party to whom it is proposed to award a subcontract under this contract must be acceptable to the Owner.

Section 4 Site Visit

Prospective bidders are strongly encouraged to visit the job site prior to the bidding date. Contact the Sebastopol Engineering Division at 707-823-2151 for directions.

Section 5 Telegraphic Modifications:

Any bidder may modify his bid by telegraphic communication at anytime prior to the scheduled closing time for receipt of bids, provided such telegraphic communication is received by the Owner prior to the closing time, and provided further, the Owner is satisfied that a written confirmation of the telegraphic modification over the signature of the bidder was mailed prior to the closing time. The telegraphic communication should not reveal the bid price but should provide the addition or subtraction or other modification so that the final prices or terms will not be known by the Owner until the sealed bid is opened. If written confirmation is not received within two days from the closing time, no consideration will be given to the telegraphic modification.

Section 6 Qualification of Bidder:

The Owner may make such investigation as he deems necessary to determine the ability of the bidder to perform the work, and the bidder shall furnish to the Owner all such information and data for this purpose as the Owner may request. The Owner reserves the right to reject any bid if the evidence is submitted by, or investigation of, such bidder fails to satisfy the Owner that such bidder is properly qualified to carry out the obligations of the contract and to complete the work contemplated therein. Conditional bids will not be accepted. Bidder must possess a valid Class A or C12 Contractor's License.

No contractor or subcontractor may be listed on a bid proposal for a public works project unless registered with the Department of Industrial Relations pursuant to Labor Code Section 1725.5 [with limited exceptions from this requirement for bid purposes only under Labor Code Section 1771.1(a)].

No contractor or subcontractor may be awarded a contract for public works on a public works project unless registered with the Department of Industrial Relations pursuant to Labor Code Section 1725.5.

Section 7 Bid Security:

Each bid must be accompanied by cash, certified check of the bidder, or a bid bond prepared on the form of a bid bond attached thereto, duly executed by the bidder as principal and having as surety thereon a surety company approved by the Owner, in the amount of 10% of the bid. Such cash, checks or bid bonds will be returned to all except the three lowest bidders within three days after the opening of bids, and the remaining cash, checks or bid bonds will be returned promptly after the Owner and the accepted bidder have executed the contract, or, if no award has been made within 30 days after the date of the opening of the bids, upon demand of the bidder at any time thereafter, so long as he has not been notified of the acceptance of his bid.

Section 8 Liquidated Damages for Failure to Enter into Contract:

The successful bidder, upon his failure or refusal to execute and deliver the contract, bonds, and Insurance Certificates, required within 10 days after he has received notice of the acceptance of his bid, shall forfeit to the Owner, as liquidated damages for such failure or refusal, the security deposited with his bid. Please refer to proposed schedule of work contained in Special Provisions, Section 6.

Section 9 Time of Completion and Liquidated Damages:

Bidder must agree to commence work on or before a date to be specified in written "Notice to Proceed" of the Owner and to fully complete the project within.

Sixty (60) working days

thereafter. Bidder must also agree to pay as liquidated damages, the sum of \$500.00 for each consecutive working day thereafter as hereinafter provided in the General Conditions. Please refer to proposed schedule of work contained in Special Provisions, Section 6.

Section 10 Conditions of Work:

Each bidder must inform himself fully of the conditions relating to the construction of the project and the employment of labor thereon. Failure to do so will not relieve a successful bidder of his obligation to furnish all material and labor necessary to carry out the provisions of his contract. Insofar as possible, the

contractor, in carrying out his work, must employ, such methods or means as will not cause any interruption of or interference with the work of any contractor.

Section 11 Addenda and Interpretation:

No oral interpretation of the meaning of the plans, specifications or other pre-bid documents will be made to any bidder.

Every request for such interpretation should be in writing addressed to Sebastopol Engineering Division, 714 Johnson Street, Sebastopol, California 95472, and to be given consideration must be received at least five days prior to the date fixed for opening of bids. Any and all such interpretations and any supplemental instructions will be in the form of a written addendum to the specifications which, if issued, will be mailed by certified mail with return receipt requested to all prospective bidders (at the respective addresses furnished for such purposes), and not later than three days prior to the date fixed for opening bids. Failure of any bidder to receive any such addendum or interpretations shall not relieve such bidder from any obligation under his bid as submitted. All addenda so issued shall become part of the contract documents.

Section 12 Security for Faithful Performance:

Simultaneously with his delivery of the executed contract, the Contractor shall furnish a surety bond as security for faithful performance of this contract and for the payment of all persons performing labor on the project under this contract and furnishing materials in connection with this contract, as specified in the General Conditions included herein. The surety on such bond or bonds shall be a duly authorized surety company satisfactory to the Owner.

Section 13 Power of Attorney:

Attorneys-in-fact who sign bid bonds or contract bonds must file with each bond a certified and effectively dated copy of their power of attorney.

Section 14 Laws and Regulations:

The Bidder's attention is directed to the fact that all applicable State Laws, Municipal Ordinances and the rules and regulations of all authorities having jurisdiction over construction of the project shall apply to the contract throughout, and they will be deemed to be included in the contract the same as though herein written out in full. Reference is made to the Provisions of the Contract contained in these specifications where applicable State Laws are specified.

This contract is subject to compliance monitoring and enforcement by the Department of Industrial Relations.

Section 15 Method of Award - Lowest Qualified Bidder:

If at the time this contract is to be awarded, the lowest bid submitted by a responsible bidder does not exceed the amount of funds estimated by the Owner to be available to finance the contract, the contract will be awarded.

Section 16 Obligation of Bidder:

At the time of the opening of bids each bidder will be presumed to have inspected the site and to have read and be thoroughly familiar with the plans and contract documents (including all addenda). The failure or omission of any bidder to examine any form, instrument or documents shall in no way relieve any bidder from any obligation in respect of his bid.

Section 17 Workmen's Compensation:

The Contractor shall maintain adequate workmen's compensation insurance under the laws of the State of California for all labor employed by him or by any subcontractor under him who may come within the protection of such workmen's compensation laws of the State of California, and shall provide, where practicable, employers' general liability insurance for the benefit of his employees and the employees of any subcontractor under him not protected by such compensation laws, and proof of such insurance satisfactory to the Governing Body shall be given by filing certificates of such insurance with the Engineer of work in form satisfactory to the Governing Body. If such insurance is underwritten by any agency other than the State Compensation Fund, such agency shall be a company authorized to do business in the State of California.

Section 18 Wage Scale:

Pursuant to Section 1773 of the Labor Code of the State of California, the City has obtained from the Directory of the Department of Industrial Relations the general prevailing rate of per diem wages and the general prevailing rate for holidays and overtime work for each craft, classification, or type of workman required to execute the contract. A copy of said prevailing rate of per diem wages is on file in the office of the Engineering Manager to which reference is hereby made for further particulars. Said prevailing rate of per diem wages will be made available to any interested party upon request, and a copy thereof shall be posted at the job site. The provisions of Article 2, Chapter 1, Part 7, Division 2 (commencing with Section 1770) of the Labor Code and particularly Section 1775 thereof, shall be complied with.

Section 19 Hours of Labor:

The Contractor shall forfeit, as penalty to the City, one hundred twenty-five dollars (\$125.00) 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 any one calendar day and forty (40) hours in any one calendar week, in violation of the provisions of Article 3, Chapter 1, Part 7, Division 2 (commencing with Section 1810) of the Labor Code of the State of California.

Section 20 Apprentices:

In accordance with the provisions of Section 1777.5 of the Labor Code, and in accordance with the rules and procedures of the California Apprenticeship Council, properly indentured apprentices shall be employed in the prosecution of the work. The ratio of apprentices to journeymen who shall be employed in the respective crafts or trades may be the ratio stipulated in the apprenticeship standards under which the appropriate joint apprenticeship committee operates. Willful failure by the contractor to comply with said Section 1777.5 shall result in his being denied the right to bid on a public works contract for a period of six months from the date determination is made.

Information relative to number of apprentices, indemnification, wages, hours of employment and standards of working conditions shall be obtained from the Director of the Department of Industrial Relations, who is the Administrative Officer of the California Apprenticeship Council.

Section 21 Labor Discrimination:

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 or ancestry, physical handicap, medical condition, marital status, or sex of such persons, except as provided in Section 12940 of the Government Code. Any contractor for public works violating this section is subject to all penalties imposed for a violation of this chapter."

Section 22 City Water:

Contractors may obtain water from a filler line located at the City Corporation Yard, 714 Johnson Street, or from an alternate source approved by the Public Works Superintendent prior to the start of construction. Contact the Sebastopol Public Works Department for information. Unauthorized use of City hydrants or water outlets is not allowed and will result in legal proceedings by the City of Sebastopol.

Section 23 Safety Standards and Accident Prevention:

With respect to all work performed under this contract, the Contractor shall:

1. Comply with the safety standard provisions of applicable laws, building and construction codes in the "Manual of Accident Prevention in Construction" published by the Associated General Contractors of America, the requirements of the Occupational Safety and Health Act of 1970 (Public Law 91-596), and the requirements of Title 29 of the Code of Federal Regulations, Section 1518 as published in the "Federal Register," Volume 36, No. 75, Saturday, April 17, 1971.
2. Exercise every precaution at all times for the prevention of accidents and the protection of persons (including employees) and property.
3. Maintain at his field office or other well known place at the job site, all articles necessary for giving first aid to the injured, and shall make standing arrangements for the immediate removal to a hospital or a doctor's care of persons (including employees), who may be injured on the job site. In no case shall employees be permitted to work at a job site before the employer has made a standing arrangement for removal of injured persons to a hospital or a doctor's care.

BIDDER'S PROPOSAL

(DO NOT DETACH)

**BODEGA AVENUE/HIGH STREET INTERSECTION IMPROVEMENTS
Contract 2016-16**

To the Honorable City Council
City of Sebastopol
Sebastopol, California

Gentlemen:

The undersigned, as a bidder, declares he has carefully examined the location of the proposed work and that he has examined the plans and specifications and hereby proposes to furnish all materials and to do all work required to complete the work in accordance with the plans and specifications. Bidder hereby agrees to commence work under this contract on or before a date specified in written "Notice to Proceed" of the Owner, and to complete the work within Sixty (60) working days as stipulated in the specifications, or agree to the assessment of liquidated damages, and to accept payment in full for the work at the prices as set forth on the attached Bidder's sheets.

Licensed in accordance with an act providing for the registration of Contractor's License No. A or C12 .

(If an individual, so state. If a firm or co-partnership, state the firm name and give the names of all individual co-partners comprising the firm. If a corporation, state legal name of corporation and also name of President, Secretary, Treasurer and manager thereof).

DATED: _____, 20__

BID SCHEDULE
BODEGA AVENUE/HIGH STREET INTERSECTION IMPROVEMENTS
CITY OF SEBASTOPOL
CONTRACT NO. 2016-16

ITEM NO.	DESCRIPTION	ESTIMATED QUANTITY	UNIT	UNIT PRICE	BID ITEM TOTAL
1	Traffic Control	1	LS	\$	\$
2	Water Pollution and Erosion Control	1	LS	\$	\$
3	Construction Area Signs	1	LS	\$	\$
4	Mobilization, Bonds and Insurance	1	LS	\$	\$
5	Remove Existing Asphalt Pavement	3,480	SF	\$	\$
6	Roadway Excavation	330	CY	\$	\$
7	Biaxial Geogrid Type 2	3,480	SF	\$	\$
8	Class 1 Aggregate Subbase	31	TONS	\$	\$
8	Class 2 Aggregate Base	20	TONS	\$	\$
9	Asphalt Concrete Type A	9	TONS	\$	\$
10	Wedge Grind	81	SY	\$	\$
11	Adjust Sewer Manhole to Grade	1	EA	\$	\$
12	Adjust Water Valve Covers to Grade	2	EA	\$	\$
13	Detail 23 Striping	20	LF	\$	\$
14	12" White Crosswalk Striping	188	LF	\$	\$
15	Pavement Markings	82	SF	\$	\$
16	Install Electrical Handhole	2	EA	\$	\$

TOTAL ALL BID ITEMS \$

In Figures

(in words)

Above unit prices shall include all costs for performing the entire contract as shown on the plans and included in these specifications and shall include but not be limited to all labor, materials, tools, equipment, mobilization, tree preservation, profit, overhead, insurance, bonds, and the like required to finish the various forms of work.

Bidder understands that the Owner reserves the right to reject any or all bids and to waive any informality in the bidding.

The bidder agrees that this bid shall be good and may not be withdrawn for a period of 30 calendar days after the scheduled closing time for bids.

Upon receipt of written notice of the acceptance of this bid, bidder will execute the formal contract attached within 10 days and deliver a Surety Bond or Bonds as required by the section of the General Conditions entitled "Contract Security." The bid security attached in the sum of _____ (\$ _____), is to become the property of the Owner in the event the contract and bond are not executed within the time and additional expense to the Owner caused thereby.

Respectfully Submitted,

Signature

Print Name

Title

Address

City, State, Zip Code

SEAL - (If Bid by a Corporation)

**STATEMENT OF EXPERIENCE OF BIDDER
TO BE COMPLETED BY BIDDER AND
SUBMITTED WITH THE BID**

The bidder has been engaged in the contracting business, under the present business name, for ___ years. Experience in work of a nature similar to that bid in this Proposal extends over a period of _____ years.

The bidder is required to state below work of similar magnitude or character that he has done, and to give references that will enable the Governing Body to judge his experience, skill, and business standing, and his ability to conduct the work completely and as required under the terms of the Contract.

**Year, Location, Magnitude
and Type of Work**

**Owner / Contact Person
and Phone Number**

Bank References: _____

Contractor's License No: _____ Signature of Bidder: _____
State of California

Attach other sheets as necessary.

**LIST OF SUBCONTRACTORS
TO BE COMPLETED BY BIDDER AND
SUBMITTED WITH THE BID**

In accordance with the provisions of Sections 4104 and 4111, inclusive, of the Government Code of the State of California, each bidder shall list below the name and location of place of business of each subcontractor who will perform a portion of the contract work in an amount in excess of one-half of one percent of the total contract price. In each such instance, the nature and extent of the work to be subcontracted shall be described.

The General Contractor to whom the contract is awarded will not be permitted without written consent of the City, to substitute any person as subcontractor in place of the subcontractor designated in the original bid, or to permit any subcontract to be assigned or transferred, or to allow it to be performed by anyone other than the original subcontractor. If the original subcontractor, after having reasonable opportunity to do so, shall fail or refuse to execute the written contract presented to him by the General Contractor, the owner shall be notified and a replacement agreed upon.

The failure of the Contractor to specify a subcontractor for any portion of the contract work in excess of one-half of one percent of the total contract price shall be deemed to indicate that the Contractor intends to perform such portion himself. The subcontracting of work for which no subcontractor was designated in the original bid and which is in excess of one-half of one percent of the total contract price, will be allowed only with the written consent of the City.

Subcontractor Name	Contractors License #	D.I.R. #	Address of Office, Mill or Shop	Description of Work To Be Performed	% of Total Bid

NOTE: All subcontractors must provide insurance certificates and endorsements in accordance with "Insurance Requirements For Contractors" contained in this document.

**BID BOND
TO BE EXECUTED BY THE BIDDER AND
SUBMITTED WITH THE BID**

KNOW ALL MEN BY THESE PRESENTS, that we, the undersigned, _____
_____ as Principal, and _____
as Surety, are hereby held and firmly bound unto the CITY OF SEBASTOPOL, as owner in the penal sum
of \$ _____ for the payment of which, well and truly to be made, we hereby jointly and
severally bind ourselves, our heirs, executors, administrators, successors and assigns.

Signed this _____ day of, _____ 20__.

The condition of the above obligation is such that whereas the Principal has submitted to the CITY OF SEBASTOPOL a certain Bid, attached hereto and hereby made a part hereof to enter in a contract in writing for the

**BODEGA AVENUE/HIGH STREET INTERSECTION IMPROVEMENTS
Contract 2016-16**

NOW, THEREFORE,

- (a) If said Bid shall be rejected, or in the alternate,
- (b) If said Bid shall be accepted and the Principal shall execute and deliver a contract in the Form of Contract attached hereto (properly completed in accordance with said Bid) and shall furnish a bond for his faithful performance of said contract, and for the payment of all persons performing labor or furnishing materials in connection therewith, and shall in all other respects perform the agreement created by the acceptance of said Bid, then this obligation shall be void, otherwise the same shall remain in force and effect; it being expressly understood and agreed that the liability of the Surety for any and all claims hereunder, in no event, exceed the penal amount of this obligation as herein stated. The Surety for value received, hereby stipulated and agrees that the obligations of said surety and its bond shall be in no way impaired or affected by any extension of the time within which the Owner may accept such Bid; and said Surety does hereby waive notice of any such extension.

IN WITNESS WHEREOF, the Principal and the Surety have hereunto set their hands and seals, and such of them are corporations have caused their corporate seals to be hereto affixed and these presents to be signed by their proper officers, the day and year first set forth above.

Principal

Surety

SEAL

BY: _____

**NONCOLLUSION AFFIDAVIT
TO BE EXECUTED BY BIDDER AND
SUBMITTED WITH BID**

State of California)
) ss.
County of _____)

Being first duly sworn, deposes and says that he or she is _____ of _____ the party making the foregoing bid that the 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 bidder 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, conspired, connived, or agreed with any bidder or anyone else to put in a sham bid, or that anyone shall refrain from bidding; that the bidder has not in any manner, directly or indirectly, sought by agreement, communication, or conference with anyone to fix the bid price of the bidder or any other bidder, or to fix any overhead, profit, or cost element of the bid price, or of that of any other bidder, or to secure any advantage against the public body awarding the contract of anyone interested in the proposed contract; that all statements contained in the bid are true; and, further, that the bidder has not, directly or indirectly, submitted his or her bid price or any breakdown thereof, of the contents thereof, or divulged information or data relative thereto, or 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.

Principal

CONTRACT

THIS AGREEMENT, made this _____ day of _____, 20____, by and between CITY OF SEBASTOPOL, herein called "owner," acting herein through its CITY MANAGER and

STRIKE OUT (A Corporation) (A Partnership)
INAPPLICABLE (An Individual doing business as _____)
TERMS

of _____, County of _____, State of _____, hereinafter called "Contractor."

WITNESSETH: That for and in consideration of the payment and agreement hereinafter mentioned, to be made and performed by the OWNER, the CONTRACTOR hereby agrees with the OWNER to commence and complete the construction described as follows:

BODEGA AVENUE/HIGH STREET INTERSECTION IMPROVEMENTS
Contract 2016-16

hereinafter called the project, for the sum of _____ Dollars (\$ _____) and all extra work in connection therewith, under the terms as stated in the General Conditions and Special Provisions of the Contract; and at his (its or their) own proper cost and expense to furnish all the materials, supplies, machinery, equipment, tools, superintendence, labor, insurance, and other accessories and services necessary to complete the said project in accordance with the conditions and prices stated in Notice to Bidders, Bidders Proposal, the General Conditions, and Special Provisions of the Contract, the plans, which include all maps, plats, blue prints, and other drawings or written explanation matter thereof, the specifications and contract documents therefor as prepared by the City of Sebastopol Public Works Department, herein entitled the Engineer all of which are made a part hereof and collectively evidence and constitute the contract.

The Contractor hereby agrees to commence work under this contract on or before a date to be specified in a written "Notice to Proceed" of the Owner, and to fully complete the project within Sixty (60) working days. The Contractor further agrees to pay, as liquidated damages, the sum of \$500.00 for each consecutive working day thereafter as provided in Section 9 of the Information to Bidders.

The Owner agrees to pay the Contractor in current funds for the performance of the Contract, subject to additions and deductions, as provided in the General Conditions of the contract, and to make payments on account thereof as provided in Part II, Section 20, "Payments to Contractor" of the General Conditions.

IN WITNESS WHEREOF, the parties to these presents have executed this contract in three (3) counterparts, each of which shall be deemed an original, in the year and day above mentioned.

SEAL

CITY OF SEBASTOPOL
(Owner)

Attest:

BY: _____

(City Clerk)

(City Manager)

SEAL

(Contractor)

BY: _____

(Secretary)

(Title)

(Witness)

NOTE: Secretary of the Owner should attest. If Contractor is a corporation, Secretary should attest.

100%
PERFORMANCE BOND

KNOW ALL MEN BY THESE PRESENTS: That we (1) _____
_____ a (2) _____ hereinafter called "Principal"
and (3) _____ of _____ State of _____
_____ hereinafter called "Surety", are held and firmly bound into (4) CITY OF
SEBASTOPOL of SEBASTOPOL, CALIFORNIA hereinafter called "Owner", in the penal sum of
_____ Dollars (\$_____) in lawful
money of the United States, for the payment of which sum well and truly to be made, we bind ourselves,
our heirs, executors, administrators and successors, jointly and severally, firmly by these presents.

THE CONDITION OF THIS OBLIGATION is such that Whereas, the Principal entered into a certain
contract with the Owner dated the _____ day of _____, 20 ____, a copy of which is hereto attached
and made a part hereof for the construction of:

BODEGA AVENUE/HIGH STREET INTERSECTION IMPROVEMENTS
Contract 2016-16

NOW, THEREFORE, if the principal shall well, truly and faithfully perform its duties, all the
undertakings, covenants, terms, conditions and agreements of said contract during the original term thereof,
and any extensions thereof which may be granted by the Owner, with or without notice to the Surety, and
if he shall satisfy all claims and demands incurred under such contract, and shall fully indemnify and save
harmless the Owner from all costs and damages which it may suffer by reason of failure to do so, and shall
reimburse and repay the Owner all outlay and expense which the Owner may incur in making good any
default, then this obligation shall be void; otherwise to remain in full force and effect.

PROVIDED, FURTHER, that the said Surety, for value received hereby stipulates and agrees that no
change, extension of time, alteration or addition to the terms of the contract or to the work performed
thereunder or the specifications accompanying the same shall in any wise 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 contract or to the work or to the specifications.

PROVIDED, FURTHER, that no final settlement between the Owner and the Contractor shall abridge the
right of any beneficiary hereunder, whose claim may be unsatisfied.

IN WITNESS THEREOF, this instrument is executed in three (3) counterparts, each one of which shall be deemed an original, this the _____, day of _____, 20_____.

ATTEST:

(Principal)

By: _____

(Address)

(SEAL)

Witness as to Principal

(Address)

(Surety)

ATTEST:

By: _____

Attorney-in-Fact

(Surety) Secretary

(Address)

(SEAL)

Witness as to Principal

(Address)

NOTE: Date of Bond must not be prior to date of Contract.

- (1) Correct Name of Contractor
- (2) A Corporation, a Partnership or an Individual, as case may be
- (3) Correct Name of Surety
- (4) Correct Name of Owner
- (5) If Contractor is Partnership, all partners should execute bond.

50% PAYMENT BOND

KNOW ALL MEN BY THESE PRESENTS: That we _____
(Name of Contractor)
_____ a _____
(Corporation, Partnership or Individual)
_____ hereinafter called "Principal" and _____
(Surety)
_____ of _____ State of _____

hereinafter called "Surety", are held and firmly bound unto the CITY OF SEBASTOPOL, 7120 BODEGA AVENUE, SEBASTOPOL, CALIFORNIA 95472, hereinafter called "Owner", in the penal sum of _____

Dollars (\$ _____) in lawful money of the United States, for the payment of which sum well and truly to be made, we bind ourselves, our heirs, executors, administrators and successors, jointly and severally, firmly by these presents.

THE CONDITION OF THIS OBLIGATION is such that Whereas, the Principal entered into a certain contract with the Owner dated the _____ day of _____, 20____, a copy of which is hereto attached and made a part hereof for the construction of:

**BODEGA AVENUE/HIGH STREET INTERSECTION IMPROVEMENTS
Contract 2016-16**

NOW, THEREFORE, if the principal shall promptly make payment to all persons, firms, subcontractors, and corporations furnishing materials for or performing labor in the prosecution of the work provided for in such contract, any authorized extension of modification thereof, including all amounts due for materials, lubricants, oil, gasoline, and coal, repairs on machinery, equipment and tools, consumed or used in connection with the construction of such work, and all insurance premiums on said work, and for all labor, performed in such work whether by subcontractor or otherwise then this obligation shall be void; otherwise to remain in full force and effect.

PROVIDED, FURTHER, that the said Surety, for value received hereby stipulates and agrees that no change, extension of time, alteration or addition to the terms of the contract or to the work performed thereunder or the specifications accompanying the same shall in any wise 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 contract or to the work or to the specifications.

PROVIDED, FURTHER, that no final settlement between the Owner and the Contractor shall abridge the right of any beneficiary hereunder, whose claim may be unsatisfied.

IN WITNESS THEREOF, this instrument is executed in three (3) counterparts, each one of which shall be deemed an original, this the _____, day of _____, 20____.

ATTEST:

(Principal)

By: _____(S)

(Address)

(SEAL)

Witness as to Principal

(Address)

(Surety)

By: _____
Attorney-in-Fact

ATTEST:

(Surety) Secretary

(Address)

(SEAL)

Witness as to Principal

(Address)

NOTE: Date of Bond must not be prior to date of Contract.

- (1) If Contractor is a Partnership, all partners should execute bond.

CITY OF SEBASTOPOL INSURANCE REQUIREMENTS FOR CONTRACTORS

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, his agents, representatives, employees or subcontractors.

Minimum Scope of Insurance

Coverage shall be at least as broad as:

1. Insurance Services Office Commercial General Liability coverage (occurrence form CG0001).
2. Insurance Services Office form number CA 0001 (Ed. 1/87) covering Automobile Liability, code 1 (any auto).
3. Worker's Compensation insurance as required by the State of California and Employer's Liability Insurance. A Waiver of Subrogation endorsement is required on Workers' Compensation Insurance.

Minimum Limits of Insurance

Contractor shall maintain limits no less than:

1. **General Liability:** \$2,000,000 per occurrence for bodily injury, personal injury and property damage including operations, products and completed operations, as applicable. 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. **Auto Liability:** \$2,000,000 per accident for bodily injury and property damage.
3. **Employer's Liability:** \$1,000,000 per accident for bodily injury or disease.

Deductibles and Self-Insured Retentions

Any deductibles or self-insured retentions must be disclosed to and approved by the City. At the option of the City, either: the insurer shall reduce or eliminate such deductibles or self-insured retentions as respects the City, its officers, officials, employees and volunteers, or the Contractor shall provide a financial guarantee satisfactory to the City guaranteeing payment of losses and related investigations, claim administration and defense expenses.

Other Insurance Provisions

All required general liability and automobile liability policies are to contain, or be endorsed to contain, the following provisions:

1. The *named additional insured* with respect to this contract shall include the following:

The CITY OF SEBASTOPOL, its Officers, Officials, Employees and Volunteers.

2. The *named additional insured* are to be covered as insureds with respect to liability arising out of automobiles owned, leased, hired or borrowed by or on behalf of the contractor; and with respect to all liability arising out of work or operations performed by or on behalf of the Contractor including materials, parts or equipment furnished in connection with such work or operations. General liability coverage can be provided in the form of an endorsement to the Contractor's insurance, or as a separate owner's policy.

Subcontractor agrees to be bound to Contractor and City in the same manner and to the same extent as Contractor is bound under the contract. Subcontractor further agrees to include the same requirements and provisions of this agreement, including indemnity and insurance requirements, with any Sub-subcontractor to the extent they apply to the scope of the Sub-subcontractor's work. A copy of the City contract indemnity and insurance provisions will be furnished to the Subcontractor upon request.

INSURANCE REQUIREMENTS FOR CONTRACTORS (continued)

3. For any claims related to this project, the Additional Insured coverage under the Contractor's policy shall be "primary and non-contributory" and will not seek contribution from the City of Sebastopol's insurance.
4. It shall be a requirement under this contract that any available insurance proceeds broader than or in excess of the specified minimum Insurance coverage requirements and/or limits shall be available to the Additional Insured. Furthermore, the requirements for coverage and limits shall be (1) the minimum coverage and limits specified in this Contract; or (2) the broader coverage and maximum limits of coverage of any Insurance policy or proceeds available to the named Insured; whichever is greater.
5. Each insurance policy required by this clause shall be endorsed to state that coverage shall not be cancelled by either party, except after thirty (30) day's prior written notice by certified mail, return receipt requested, has been given to the City of Sebastopol and the County of Sonoma.

Acceptability of Insurers

Insurance is to be placed with insurers with a current A.M. Best's rating of no less than A:VII.

Verification of Coverage

Within ten days of the City's request, the Contractor shall furnish the City with original certificates and amendatory endorsements affecting the coverage required by this clause. The endorsements should be on forms provided by the City or on other than the City's forms or a separate owners policy, provided those forms or policies are approved by the City and amended to conform to the City's requirements. All certificates and endorsements are to be received and approved by the City before the contract is executed. The City reserves the right to require complete, certified copies of all required insurance policies, including endorsements affecting the coverage required by these specifications at any time.

All certificates and endorsements shall reference the appropriate policy number, names of insured, and shall be signed by an authorized representative of the insurer.

Subcontractors

Contractor agrees to include with all subcontractors in their subcontract the same requirements and provisions of this agreement including the indemnity and Insurance requirements to the extent they apply to the scope of the Subcontractor's work. Subcontractors hired by Contractor agree to be bound to Contractor and City in the same manner and to the same extent as Contractor is bound to City under the Contract. Subcontractor further agrees to include these same provisions with any Sub-subcontractor. A copy of the contract indemnity and insurance provisions will be furnished to the Subcontractor upon request. The Contractor shall require all sub-contractors to provide a valid certificate of insurance and the required endorsements included in the agreement prior to commencement of any work and contractor will provide proof of compliance to the city.

PART II

GENERAL CONDITIONS

SECTION	TITLE	PAGE
1	Definitions	II- 1
2	Shop or Setting Drawings	II- 1
3	Materials, Services and Facilities	II- 1
4	Contractor's Title or Materials	II- 1
5	Inspection and Testing of Materials	II- 2
6	"Or Equal" Clause	II- 2
7	Surveys, Permits and Regulations	II- 2
8	Contractor's Obligations	II- 2
9	Weather Conditions	II- 3
10	Protection of Work and Property - Emergency	II- 3
11	Reports, Records and Data	II- 3
12	Superintendence by Contractor	II- 3
13	Changes in Work	II- 3
14	Extras	II- 4
15	Time for Completion and Liquidated Damages	II- 4
16	Correction of Work	II- 5
17	Claims for Extra Cost	II- 5
18	Right of the Owner to Terminate Contract	II- 5
19	Construction Schedule and Periodic Estimates	II- 6
20	Payments to Contractor	II- 6
21	Acceptance of Final Payment Constitutes Release	II- 7
22	Contract Security	II- 7
23	Mutual Responsibility of Contractors	II- 7
24	Separate Contract	II- 7
25	Subcontracting	II- 7
26	Engineer's Authority	II- 8
27	Use of Premises and Removal of Debris	II- 8
28	Quantities of Estimate	II- 8
29	Lands and Rights-of-Way	II- 9
30	General Guaranty	II- 9
31	Insurance Requirements for Contractors	II- 9
32	Workmen's Compensation Insurance	II- 9
33	Claims and Arbitration	II- 9
34	Damage by Storm, Flood, Tidal Wave or Earthquake	II- 11
35	Checking of Drawings	II- 11
36	As-Built Drawings	II- 11
37	Substitute Materials and Equipment	II- 12

38	Defective Material or Work	II-	12
39	Right to Retain Imperfect Work	II-	12
40	Existing Utilities	II-	12
41	Differing Site Conditions	II-	13
42	Project Appearance	II-	13
43	Hazardous Waste in Excavation	II-	14
44	Removal of Asbestos and Hazardous Substances	II-	14
45	Substitution of Securities for Withheld Funds	II-	14
46	Antitrust Claim Assignment	II-	18
47	Examination and Audit of Contracts	II-	18
48	Sanitary Sewer Overflow Emergency Response Plan	II-	18

PART II
GENERAL CONDITIONS

Section 1 Definitions:

The following terms as used in this contract are respectively defined as follows:

- (a) "Contractor": A person, firm or corporation with whom the contract is made by the Owner.
- (b) "Engineer": The City Engineer of the City of Sebastopol, acting either directly or through properly authorized agents, such agents acting within the scope of the particular duties entrusted to them.
- (c) "Subcontractor": A person, firm or corporation supplying labor and materials or only labor for work at the site of the project for, and under separate contract or agreement with, the Contractor.
- (d) "Owner": The City of Sebastopol.
- (e) "Work on (at) the project": Work to be performed at the location of the project, including the transportation of materials and supplies to or from the location of the project by employees of the Contractor and any Subcontractor.

Section 2 Shop or Setting Drawings:

The Contractor shall submit promptly to the Engineer copies of each shop or setting drawing as specified in Part IV, Specifications. After examination, such drawings by the engineer and the return thereof, the Contractor shall make such corrections to the drawings as have been indicated and shall furnish the Engineer with two corrected copies. If requested by the Engineer, the Contractor must furnish additional copies. Regardless of corrections made in or approval given to such drawings by the Engineer, the Contractor will nevertheless be responsible for the accuracy of such drawings and for the conformity to the Plans and Specifications, unless he notifies the Engineer in writing of any deviations at the time he furnishes such drawings.

Section 3 Materials, Services and Facilities:

- (a) It is understood that except as otherwise specifically stated in the Contract documents, the Contractor shall provide and pay for all materials, labor, tools, equipment, water, light, power, transportation, superintendence, temporary construction of every nature, and all other services and facilities of every nature whatsoever necessary to execute, complete and deliver the work within the specified time.
- (b) Any work necessary to be performed after regular working hours, on Sundays or Legal Holidays, shall be performed without additional expense to the Owner.

Section 4 Contractor's Title or Materials:

No materials or supplies for the work shall be purchased by the Contractor or by any Subcontractor subject to any chattel mortgage or under a conditional sale contract or other agreement by which an interest is retained by the seller. The Contractor warrants that he has good title to all materials and supplies used by him in the work, free from all liens, claims or encumbrances.

Section 5 Inspection and Testing of Materials:

- (a) All materials and equipment used in the construction of the project shall be subject to adequate inspection and testing in accordance with accepted standards. The laboratory or inspection agency shall be selected by the Owner. The Owner will pay for all laboratory inspection service direct, and not as a part of the contract.
- (b) Materials of construction, particularly those upon which the strength and durability of the structure may depend, shall be subject to inspection and testing to establish conformance with specifications and suitability for uses intended.

Section 6 "Or Equal" Clause:

Whenever a material, article or piece of equipment is identified on the plans or in the specifications by reference to manufacturers' or vendor's names, trade names, catalogue numbers, etc., it is intended merely to establish a standard; and, any material, article, or equipment of other manufacturers and vendors which will perform adequately the duties imposed by the general design will be considered equally acceptable provided the material, article, or equipment so proposed, is, in the opinion of the Engineer, of equal substance and function. It shall not be purchased or installed by the Contractor without the Engineer's written approval.

Section 7 Surveys, Permits, and Regulations:

The Contractor shall employ as a subcontractor, a licensed land surveyor or civil engineer experienced in construction staking as required to perform the construction staking function for this project. The cost of construction staking shall be borne solely by the Contractor. The cost of construction staking shall be considered as included in the cost of the various items of work requiring construction staking and no additional compensation will be allowed.

The Contractor shall procure and pay all permits, licenses and approvals necessary for the execution of his contract.

The Contractor shall comply with all laws, ordinances, rules, orders and regulations relating to performance of the work, the protection of adjacent property, and the maintenance of passageways, guard fences or other protective facilities.

Section 8 Contractor's Obligations:

The Contractor shall and will, in good workmanlike manner, do and perform all work and furnish all supplies and materials, machinery, equipment, facilities and means, except as herein otherwise expressly specified, necessary or proper to perform and complete all work required by this contract and said specifications and in accordance with the plans and drawings covered by this contract any and all supplemental plans and drawings, and in accordance with the directions of the Engineer as given from time to time during the progress of work. He shall furnish, erect, maintain and remove such construction plant and such temporary works as may be required.

The Contractor shall observe, comply with, and be subject to all terms, conditions, requirements and limitations of the contract and specifications, and shall do, carry on, and complete the entire work to the satisfaction of the Engineer and the Owner.

Section 9 Weather Conditions:

In the event of temporary suspensions of work, or during inclement weather, or whenever the Engineer shall direct, the contractor shall, and will cause his Subcontractors to protect carefully his and their work and materials against damage or injury from the weather. If, in the opinion of the Engineer, any work or materials shall have been damaged or injured by reason of failure on the part of the Contractor or any of his Subcontractors so to protect his work, such materials shall be removed and replaced at the expense of the Contractor.

Section 10 Protection of Work and Property - Emergency:

The Contractor shall at all times safely guard the Owner's property from injury or loss in connection with this contract. He shall at all times safely guard and protect his own work, and that of adjacent property from damage. The Contractor shall replace or make good any such damage, loss or injury unless such is caused directly by errors contained in the contract or by the Owner, or his duly authorized representatives.

In case of an emergency that threatens loss or injury of property, and/or safety of life, the Contractor will be allowed to act, with previous instructions from the Engineer, in a diligent manner. He shall notify the engineer immediately thereafter.

Where the contractor has not taken action but has notified the Engineer of an emergency threatening injury to persons or damage to the work or any adjoining property, he shall act as instructed or authorized by the Engineer.

Section 11 Reports, Records, and Data:

The Contractor shall submit to the Owner such schedule of quantities and costs, progress schedules, payrolls, reports, estimates, records and other data as the Owner may request concerning work performed or to be performed under this contract. The Contractor shall maintain and furnish payroll records in accordance with Labor Code Section 1776.

Section 12 Superintendence by Contractor:

The Contractor shall maintain on the Project during at least 95% of the time work is being performed by the prime Contractor and/or its subcontractors, a superintendent with the authority to make all decisions relating to the Project. The contractor shall provide the name and telephone number of the Acting Superintendent at the preconstruction conference. The Superintendent shall be accessible by telephone or pager on a 24-hour basis. It is understood that such representative shall be acceptable to the Engineer and shall be the one who will continue in that capacity for the particular job involved unless he ceases to be on the Contractor's payroll.

Section 13 Changes in Work:

No changes in the work covered by the approved Contract Documents shall be made without having prior written approval of the Owner. All requests for contract change orders shall be in writing. Charges or credits for the work covered by the approved change shall be determined by one or more, or a combination of the following methods:

- (a) Unit bid prices previously approved.
- (b) An agreed lump sum.
- (c) The actual cost of:
 - 1. Labor, including foreman;
 - 2. Materials entering permanently into the work;

3. The ownership or rental cost of construction plant and equipment during the time of use on the extra work;
4. Power and consumable supplies for the operation of power equipment;
5. Insurance;
6. Social Security and old age and unemployment contributions.

To the cost under (c) there shall be added a fixed fee to be agreed upon but not to exceed fifteen percent (15 %) of the actual cost of the work. The fee shall be compensation to cover the cost of supervision, overhead, bond, profit and any other general expenses.

Section 14 Extras:

Without invalidating the contract, the Owner may order extra work or make changes by altering, adding to or deducting from the work, the contract sum being adjusted accordingly, and the consent of the Surety being first obtained where necessary or desirable. All the work of the kind bid upon shall be paid for at the price stipulated in the proposal, and no claims for any extra work or materials shall be allowed unless the work is ordered in writing by the Owner or its Engineer acting officially for the Owner, and the price is stated in such order.

Section 15 Time for Completion and Liquidated Damages:

It is hereby understood and mutually agreed, by and between the Contractor and the Owner, that the date of beginning and the time for completion as specified in the contract of the work to be done hereunder are **ESSENTIAL CONDITIONS** of this contract; and it is further mutually understood and agreed that the work embraced in this contract shall be commenced on a date to be specified in the "Notice to Proceed."

The Contractor agrees that said work shall be prosecuted regularly, diligently and uninterruptedly at such rate of progress as will insure full completion thereof within the time specified. It is expressly understood and agreed, by and between the Contractor and the Owner, that the time for the completion of the same, taking into consideration the average climatic range and usual industrial conditions prevailing in this locality.

If the said Contractor shall neglect, fail or refuse to complete the work within the time herein specified, or any proper extension thereof granted by the Owner, then the contractor does hereby agree, as a part consideration for the awarding of this contract, to pay the Owner the amount specified in the contract, not as a penalty but as liquidated damages for such breach of contract as hereinafter set forth, for each and every calendar day that the Contractor shall be in default after the time stipulated in the contract for completing the work.

The said amount is fixed and agreed upon by and between the Contractor and the Owner because of the impracticality and extreme difficulty of fixing and ascertaining the actual damages the Owner would in such event sustain, and said amount shall be retained from time to time by the Owner from current periodical estimates.

It is further agreed that time is of the essence of each and every portion of this contract and of the specifications wherein a definite and certain length of time is fixed for the performance of any act whatsoever; and where under the contract an additional time is allowed for the completion of any work, the new time limit fixed by such extension shall be of the essence of this contract. Provided, that the Contractor shall not be charged with liquidated damages or any excess cost when the Owner determines that the Contractor is without fault and the Contractor's reasons for the time extension are acceptable to the Owner; provided, further, that the Contractor shall not be charged with liquidated damages or any excess cost when the delay in completion of the work is due:

- (a) To any preference, priority or allocation order duly issued by the Government;
- (b) To unforeseeable cause beyond the control and without the fault or negligence of the Contractor, including, but not restricted to, acts of God, or of the public enemy, acts of the Owner, acts of another Contractor in the performance of a contract with the Owner, fires, floods, epidemics, quarantine restrictions, strikes, freight embargoes, and severe weather; and
- (c) To any delays of Subcontractors or suppliers occasioned by any of the causes specified in subsections (a) and (b) of this article;

Provided, further, that the Contractor shall, within ten (10) days from the beginning of such delay, unless the Owner shall grant a further period of time prior to the date of final settlement of the contract, notify the Owner, in writing, of the causes of the delay, who shall ascertain the facts and extent of the delay and notify the Contractor within a reasonable time of his decision in the matter.

Section 16 Correction of Work:

All work, all materials, whether incorporated in the work or not, all processes of manufacture, and all methods of construction shall be at all times and places subject to the inspection of the Engineer who shall be the final judge of the quality and suitability of the work, materials, processes of manufacture and methods of construction for the purposes for which they are used. Should they fail to meet the Engineer's approval, they shall be forthwith reconstructed, made good, replaced, and/or corrected, as the case may be, by the Contractor at his own expense. Rejected material shall immediately be removed from the site. If, in the opinion of the Engineer, it is undesirable to replace any defective or damaged materials or to reconstruct to correct any portion of the work injured or not performed in accordance with the Contract Documents, the compensation to be paid to the Contractor shall be reduced by such amount in the judgment of the Engineer.

Section 17 Claims for Extra Cost:

No claim for extra work or cost shall be allowed unless the same was done in pursuance of a written order of the Engineer approved by the Owner, as aforesaid, and the claim presented with the first estimate after the changed or extra work is done. When work is performed under the terms of subparagraph 13(c) of the General Conditions, the Contractor shall furnish satisfactory bills, payrolls and vouchers covering all items of cost and when requested by the Owner, give the Owner access to accounts relating thereto.

Section 18 Right of the Owner to Terminate Contract:

In the event that any of the provisions of this contract are violated by the Contractor, or by any of his Subcontractors, the Owner may serve written notice upon the Contractor and the Surety of its intention to terminate the contract, such notices to contain the reasons for such intention to terminate the contract, and unless within ten (10) days after the serving of such notice upon the Contractor, such violation or delay shall cease and satisfactory arrangement of correction be made, the contract shall, upon the expiration of said ten (10) days, cease and terminate. In the event of any such termination, the Owner shall immediately serve notice thereof upon the Surety and the Contractor and the Surety shall have the right to take over and perform the contract; provided however, that if the Surety does not commence performance thereof within ten (10) days from the date of the mailing to such Surety of notice of termination, the Owner may take over the work and prosecute the same to completion by contract or by force account for the account and at the expense of the Contractor and the Contractor and his Surety shall be liable to the Owner for any excess cost occasioned the Owner thereby, and in such event the Owner may take possession of and utilize in

completing the work, such materials, appliances, and plant as may be on the site of the work and necessary therefore.

Section 19 Construction Schedule and Periodic Estimates:

Immediately after execution and delivery of the contract, and before the first partial payment is made, the Contractor shall deliver to the Owner an estimated construction progress schedule in form satisfactory to the Owner, showing the proposed dates of commencement and completion of each of the various subdivisions of work required under the Contract Documents and the anticipated amount of each monthly payment that will become due the Contractor in accordance with the progress schedule. The Contractor shall also furnish a detailed estimate giving a complete breakdown of the contract price and periodic itemized estimates of work done for the purpose of making partial payments thereon. The costs employed in making up any of these schedules will be used only for determining the basis of partial payments and will not be considered as fixing a basis for additions to or deductions from the contract price.

Section 20 Payments to Contractor:

Not later than the 15th day of each calendar month the Owner shall make a progress payment to the Contractor on the basis of a duly certified and approved estimate of the work performed during the preceding calendar month under this contract, but to insure the proper performance of this such estimate, except that at any time after fifty percent (50%) of the work has been completed, if the Engineer finds that satisfactory progress is being made, the Owner may reduce the total amount being retained from payment to five percent (5%) of the total estimated value of said work. Such reduction will only be made upon the written request of the Contractor and shall be approved in writing by the Surety of the Performance and Payment Bond. The Engineer may at anytime during the contract, recommend returning to ten percent (10%) retained if satisfactory progress is not being made by the Contractor.

The Contractor shall submit his monthly estimate of work (in triplicate) no later than the first day of the month.

All work covered by partial payments made shall thereupon become the sole property of the Owner, but this provision shall not be construed as relieving the Contractor from the sole responsibility for the care and protection of work upon which payments have been made or the restoration of any damaged work, or as a waiver of the right of the Owner to require the fulfillment of all of the terms of the contract.

Owner's Right to Withhold Certain Amounts and Make Application Thereof: The Contractor agrees that he will indemnify and save the Owner harmless from all claims growing out of the lawful demands of Subcontractors, laborers, workmen, mechanics, material men, and furnishers of machinery and parts thereof, equipment, power tools, and all supplies, including commissary, incurred in the furtherance of the performance of this contract. The Contractor shall, at the Owner's request, furnish satisfactory evidence that all obligations of the nature herein above designated have been paid, discharged or waived. If the Contractor fails so to do, then the Owner may, after having served written notice on the said Contractor, either pay unpaid bills, of which the Owner has written notice, direct, or withhold from the Contractor's unpaid compensation a sum of money deemed reasonably sufficient to pay any and all such lawful claims until satisfactory evidence is furnished that all liabilities have been fully discharged whereupon payment to the Contractor shall be resumed, in accordance with the terms of this contract, but in no event shall the provisions of this sentence be construed to impose any obligations upon the Owner to either the Contractor or his Surety. In paying any unpaid bills of the Contractor, the Owner shall be deemed the agent of the contractor, and any payment so made by the Owner shall be considered as a payment made under the contract by the Owner to the Contractor and the Owner shall not be liable to the Contractor for any such payments made in good faith.

Section 21 Acceptance of Final Payment Constitutes Release:

The acceptance by the Contractor of final payment shall be and shall operate as a release of the Owner of all claims and all liability to the Contractor for all things done or furnished in connection with this work and for every act and neglect of the Owner and others relating to or arising out of this work. No payment, however, final or otherwise, shall operate to release the Contractor or his Sureties from any obligations under this contract or the Performance and Payment Bond. Final payment shall be made 35 days after recording of Notice of Completion.

Section 22 Contract Security:

The Contractor shall furnish a performance bond in an amount at least equal to one hundred percent (100%) of the contract prices as security for the faithful performances of this contract and also a payment bond in an amount not less than fifty percent (50%) of the contract price, as security for the payment of all persons performing labor on the project under this contract and furnishing materials in connection with this contract. Attorneys-in-fact who sign contract bonds must file with each bond a certified and effectively dated copy of their power of attorney.

Section 23 Mutual Responsibility of Contractors:

If, through acts of neglect on the part of the Contractor, any other Contractor or any other Subcontractor shall suffer loss or damage on the work, the Contractor agrees to settle with such other Contractor or Subcontractor by agreement or arbitration if such other Contractor or Subcontractor will so settle. If such other Contractor or Subcontractor shall assert any claim against the Owner on account of any damage alleged to have been sustained, the Owner shall notify the Contractor, who shall indemnify and save harmless the Owner against any such claim.

Section 24 Separate Contract:

The Contractor shall coordinate his operations with those of other Contractors. Cooperation will be required in the arrangement for the storage of materials and in the detailed execution of work. The Contractor, including his Subcontractors, shall keep informed of the progress and the detail work of other Contractors and shall notify the Engineer immediately of lack of progress or defective workmanship on the part of other Contractors. Failure of a Contractor to keep informed of the work progressing on the site and failure to give notice of lack of progress or defective workmanship by others shall be construed as acceptance by him of the status of the work as being satisfactory for proper coordination with his own work.

Section 25 Subcontracting:

The Contractor may utilize the services of specialty Subcontractors on those parts of the work that, under normal contracting practices, are performed by specialty Subcontractors.

The Contractor shall not award any work to any Subcontractor without prior written approval of the Owner, which approval will not be given until the Contractor submits to the Owner a written statement concerning the proposed award to the Subcontractor, which statement shall contain such information as the Owner may require.

The Contractor shall be as fully responsible to the Owner for the acts and omissions of his Subcontractors, and of persons either directly or indirectly employed by them, as he is for the acts and omissions of persons directly employed by him.

The Contractor shall cause appropriate provisions to be inserted in all Subcontractors relative to the work to bind Subcontractors to the Contractor by the terms of the General Conditions and other Contract

documents insofar as applicable to the work of Subcontractors and to give the Contractor the same power as regards terminating any subcontract that the Owner may exercise over the Contractor under any provisions of the Contract Documents.

Nothing contained in this contract shall create any contractual relation between any Subcontractor and the Owner.

Section 26 Engineer's Authority:

The Engineer shall give all orders and directions contemplated under this contract and specifications, relative to the execution of the work. The Engineer shall determine the amount, quality, acceptability, and fitness of the several kinds of work and materials which are to be paid for under this contract and shall decide all questions which may arise in relation to said work and the construction thereof. The Engineer's estimates and decisions shall be final and conclusive, except as herein otherwise expressly provided. In case any question shall arise between the parties hereto relative to said contract or specifications, the determination or decision of the Engineer shall be a condition precedent to the right of the Contractor to receive any money or payment for work under this contract affected in any manner or to any extent by such question.

Section 27 Use of Premises and Removal of Debris:

The Contractor expressly undertakes at his own expense:

- (a) to take every precaution against injuries to persons or damage to property;
- (b) to store his apparatus, materials, supplies and equipment in such orderly fashion at the site of the work as will not unduly interfere with the progress of his work;
- (c) to place upon the work or any part thereof only such loads as are consistent with the safety of that portion of the work.
- (d) to clean up frequently all refuse, rubbish, scrap materials, and debris caused by his operations, to the end that at all times the site of the work shall present a neat, orderly and workmanlike appearance;
- (e) before final payment to remove all surplus materials, false-work, temporary structures, including foundations thereof, plant of any description and debris of every nature resulting from his operations, and to put the site in a neat, orderly condition;
- (f) to effect all cutting, fitting or patching of his work required to make the same to conform to the plans and specifications and, except with the consent of the Engineer, not to cut or otherwise alter the work of any other Contractor.

Section 28 Quantities of Estimate:

Wherever the estimated quantities of work to be done and materials to be furnished under this contract are shown in any of the documents including the proposal, they are given for use in comparing bids and the right is especially reserved except as herein otherwise specifically limited, to increase or diminish them as may be deemed reasonably necessary or desirable by the Owner to complete the work contemplated by this contract, and such increase or diminution shall in no way vitiate this contract, nor shall any such increase or diminution give cause for claims or liability for damages.

Section 29 Lands and Rights-of-Way:

Prior to the start of construction, the Owner shall obtain all lands and rights-of-way necessary for the carrying out and completion of work to be performed under this contract.

Section 30 General Guaranty:

Neither the final certificate of payment nor any provision in the Contract Documents, nor partial or entire occupancy of the premises by the Owner, shall constitute an acceptance of work not done in accordance with the Contract Documents or relieve the Contractor of liability in respect to any express warranties or responsibility for faulty materials or workmanship. The Contractor shall remedy any defects in the work and pay for any damage to other work resulting therefrom, which shall appear within a period of one year from the date of final acceptance of the work unless a longer period is specified. The Owner will give notice of observed defects with reasonable promptness.

Section 31 Insurance Requirements for Contractors:

Refer to Part I, Information for Bidders for Insurance Requirements.

Section 32 Workmen's Compensation Insurance:

Workmen's Compensation Insurance: The Contractor shall maintain adequate workmen's compensation insurance under the laws of the State of California for all labor employed by him or by any Subcontractor under him who may come within the protection of such workmen's compensation laws of the State of California, and shall provide, where practicable, employers' general liability insurance for the benefit of his employees and the employees of any Subcontractor under him not protected by such compensation laws; and proof of such insurance satisfactory to the Governing Body shall be given by filing certificates of such insurance with the Engineer of work in form satisfactory to the Governing Body. If such insurance is underwritten by any agency other than the State Compensation Fund, such agency shall be a company authorized to do business in the State of California. See Insurance Requirements for Contractors, in Part I, Information for Bidders.

Section 33 Claims and Arbitration:

Public Contract Code Sections 20104 to 20104.6 and Section 9-1.10, "Arbitration," of the Standard Specifications are hereby incorporated into this contract. In the event of a discrepancy, the Public Contracts Code shall take precedence.

Sections 20104 to 20104.6 of the Public Contracts Code state the following:

§20104. Application of article; "Public work"; "Claim"

(a)(1) This article applies to all public works claims of three hundred seventy-five thousand dollars (\$375,000) or less which arise between a contractor and a local agency.

(2) This article shall not apply to any claims resulting from a contract between a contractor and a public agency when the public agency has elected to resolve any disputes pursuant to Article 7.1 (commencing with Section 10240) of Chapter 1 of Part 2.

(b)(1) "Public work" has the same meaning as in Sections 3100 and 3106 of the Civil Code, except that "public work" does not include any work or improvement contracted for by the state or Regents of the University of California.

(2) "Claim" means a separate demand by the contractor for (A) a time extension, (B) payment of money or damages arising from work done by, or on behalf of, the contractor pursuant to the contract for a public work and payment of which is not otherwise expressly provided for or the claimant is not otherwise entitled to, (C) an amount the payment of which is disputed by the local agency.

(c) The provisions of this article or summary thereof shall be set forth in the plans or specifications for any work which may give rise to a claim under this article.

§20104.2. Requirements to submit claim; Agency's response; Dispute by claimant over response; Failure of agency to respond; Inapplicability of article to tort claims

For any claim subject to this article, the following requirements apply:

(a) The claim shall be in writing and include the documents necessary to substantiate the claim. Claims must be filed on or before the date of final payment. Nothing in this subdivision is intended to extend the time limit or supersede notice requirements otherwise provided by contract for the filing of claims.

(b)(1) For claims of less than fifty thousand dollars (\$50,000), the local agency shall respond in writing to any written claim within 45 days of receipt of the claim, or may request, in writing, within 30 days of receipt of the claim, any additional documentation supporting the claim or relating to defenses to the claim the local agency may have against the claimant.

(2) If additional information is thereafter required, it shall be requested and provided pursuant to this subdivision, upon mutual agreement of the local agency and the claimant.

(3) The local agency's written response to the claim, as further documented, shall be submitted to the claimant within 15 days after receipt of the further documentation or within a period of time no greater than that taken by the claimant in producing the additional information, whichever is greater.

(c)(1) For claims of over fifty thousand dollars (\$50,000) and less than or equal to three hundred seventy-five thousand dollars (\$375,000), the local agency shall respond in writing to all written claims within 60 days of receipt of the claim, or may request, in writing, within 30 days of receipt of the claim, any additional documentation supporting the claim or relating to defenses to the claim the local agency may have against the claimant.

(2) If additional information is thereafter required, it shall be requested and provided pursuant to this subdivision, upon mutual agreement of the local agency and the claimant.

(3) The local agency's written response to the claim, as further documented, shall be submitted to the claimant within 30 days after receipt of the further documentation, or within a period of time no greater than that taken by the claimant in producing the additional information or requested documentation, whichever is greater.

(d) If the claimant disputes the local agency's written response, or the local agency fails to respond within the time prescribed, the claimant may so notify the local agency, in writing, either within 15 days of receipt of the local agency's response or within 15 days of the local agency's failure to respond within the time prescribed, respectively, and demand an informal conference to meet and confer for settlement of the issues in dispute. Upon a demand, the local agency shall schedule a meet and conference within 30 days for settlement of the dispute.

(e) Following the meet and confer conference, if the claim or any portion remains in dispute, the claimant may file a claim as provided in Chapter 1 (commencing with Section 900) and Chapter 2 (commencing with Section 910) of Part 3 of Division 3.6 of Title 1 of the Government Code. For purposes of those provisions, the running of the period of time within which a claim must be filed shall be tolled from the time the claimant submits his or her written claim pursuant to subdivision (a) until the time that claim is denied as a result of the meet and confer process, including any period of time utilized by the meet and confer process.

(f) This article does not apply to tort claims and nothing in this article is intended nor shall be construed to change the time periods for filing tort claims or actions specified by Chapter 1 (commencing with Section 900) and Chapter 2 (commencing with Section 910) of Part 3 of Division 3.6 of Title 1 of the Government Code.

§20104.4. Procedures to resolve claims

The following procedures are established for all civil actions filed to resolve claims subject to this article:

(a) Within 60 days, but no earlier than 30 days, following the filing or responsive pleadings, the court shall submit the matter to nonbinding mediation unless waived by mutual stipulation of both parties. The mediation process shall provide for the selection within 15 days by both parties of a disinterested third person as mediator, shall be commenced within 30 days of the submittal, and shall be concluded within 15 days from the commencement of the mediation unless a time requirement is extended upon a good cause

showing to the court or by stipulation of both parties. If the parties fail to select a mediator within the 15-day period, any party may petition the court to appoint the mediator.

(b)(1) If the matter remains in dispute, the case shall be submitted to judicial arbitration pursuant to Chapter 2.5 (commencing with Section 1141.10) of Title 3 of Part 3 of the Code of Civil Procedure, notwithstanding Section 1141.11 of that code. The Civil Discovery Act of 1986 (Article 3 (commencing with Section 2016) of Chapter 3 of Title 3 of Part 4 of the Code of Civil Procedure) shall apply to any proceeding brought under this subdivision consistent with the rules pertaining to judicial arbitration.

(2) Notwithstanding any other provision of law, upon stipulation of the parties, arbitrators appointed for the purposes of this article shall be experienced in construction law, and, upon stipulation of the parties, mediators and arbitrators, shall be paid necessary and reasonable hourly rates of pay not to exceed their customary rate, and such fees and expenses shall be paid equally by the parties except in the case of arbitration where the arbitrator, for good cause, determines a different division. In no event shall these fees or expenses be paid by state or county funds.

(3) In addition to Chapter 2.5 (commencing with Section 1141.10) of Title 3, of Part 3 of the Code of Civil Procedure, any party who after receiving an arbitration award requests a trial de novo but does not obtain a more favorable judgment shall, in addition to payment of costs and fees under this chapter, pay the attorney's fees of the other party arising out of the trial de novo.

(c) The court may, upon request by any party, order any witness to participate in the mediation or arbitration process.

§20104.6. Payment of portion of claim which is undisputed; Payment of interest on arbitration award or judgment

(a) No local agency shall fail to pay money as to any portion of a claim which is undisputed except as otherwise provided in the contract.

(b) In any suit filed under Section 20104.4, the local agency shall pay interest at the legal rate on any arbitration award or judgment. The interest shall begin to accrue on the date the suit is filed in a court of law.

Section 34 Damage by Storm, Flood, Tidal Wave or Earthquake:

If the project is damaged by storm, flood, tidal wave or earthquake, then payment shall be made to the Contractor for repair in accord with Section 7-1.165 of the State of California Department of Transportation Standard Specifications except that payment or participation in payment shall only be made when such damage exceeds 5 percent (5%) of the amount of the Contractor's bid.

Section 35 Checking of Drawings:

The Contractor shall check all drawings furnished him immediately upon their receipt and shall promptly notify the Engineer of any discrepancies. Figures shown on drawings shall in general be followed in preference to scale measurements. Large scale drawings shall in general govern over small scale drawings. The Contractor shall compare all drawings and verify the figures before layout of the work, and shall be responsible for any errors which might have been avoided by such comparison.

Section 36 As-built Drawings:

The Contractor shall deliver to the Engineer, one set of marked prints showing any deviation from the contract drawings. The Contractor shall show all information necessary for the preparation of an accurate record of the installation. This copy shall be neatly prepared and shall be submitted from time to time so that it may be checked by the Engineer before the work is covered up. As-Built Drawings shall be complete and approved before final payment being issued.

Section 37 Substitute Materials and Equipment:

The Contractor may, at his option, suggest substitute makes and kinds of materials and equipment (other than those specified), indicating the amount of credit or extra cost in each instance. Acceptance of substitute items shall be only by written approval of the City. In the event the Engineer's evaluation of the suggested substitute item is required to obtain City's approval, the Contractor shall pay the Engineer's fee for investigating and evaluating the substitution. In all instances of substitutions, the Contractor shall assume full responsibility for having all substitute items comply in all respects with the applicable portions of the contract specifications, except where such requirement is specifically waived by the City.

Section 38 Defective Material or Work:

Materials not conforming to the requirements of these specifications shall be considered as defective, and all such materials, whether in place or not, shall be rejected and shall be removed immediately from the site of the work, unless otherwise permitted by the Engineer. No rejected material, the defects of which have been subsequently corrected, shall be used until approved in writing by the Engineer.

Work which does not conform to the requirements of these specifications or is deficient in construction, shall be rejected by the Engineer and be replaced by the Contractor at his own proper cost, charge and expense, and without allowance for additional cost of such replacement to the Contractor.

Upon failure on the part of the Contractor to comply with any order of the Engineer made under the provisions of these Articles or Sections, the Engineer shall have authority to remove and replace defective material or work at the expense of the Contractor, and the Contractor and his Sureties shall be liable therefor.

Section 39 Right to Retain Imperfect Work:

If any portion of the work done or material furnished under this contract shall prove defective and not in conformance with the drawings and specifications, and if the imperfection in the same shall not be of sufficient magnitude or importance to make the work dangerous or undesirable, the Engineer shall have the right and authority to retain such work instead of requiring the imperfect work to be removed and reconstructed, but he shall make deductions therefor in the payments due or to become due for the applicable contract item(s) of work as may be just and reasonable.

Section 40 Existing Utilities:

The Contractor is responsible for protection of all utility services and facilities within the limits of this work. The Contractor is responsible for checking in the field the locations as shown, and is further responsible for any and all utility laterals or services where presence or location is unknown.

The Contractor is responsible for not interrupting any of the utility services while work is in progress and he shall take proper precautions to safeguard such utilities while working near them. Should any utility be damaged during construction, all cost of replacing or repairing shall be borne by the Contractor.

The Pacific Gas and Electric Company and Pacific Telephone shall be notified 48 hours prior to any construction near its underground facilities, and shall be notified by the Contractor well in advance of construction to make utility lines.

The Contractor shall take precaution against damage of private water and gas service lines when crossing private property.

The Owner shall be notified and a request made that all sewer and water lines be marked before start of construction.

Prior to starting work, the contractor shall (a minimum of 2 working days in advance) call Underground Service Alert (USA), toll free, at (800) 642-2444 and provide USA with all necessary data relative to the proposed work. USA will accept calls and process information to participating agencies who have underground facilities in the area between the hours of 7:30 a.m. and 5:00 p.m. daily, except Saturdays, Sundays, and holidays. Between the hours of 5:00 p.m. and 7:30 a.m. calls will be recorded and then processed after 7:30 a.m. For emergency situations, after hours and on Saturdays, Sundays and holidays, the Contractor shall contact the organization owning the affected facility. Upon notification, agencies having facilities in the area of the proposed excavation, will mark their locations in the field using USA standard colors and codes to identify the facility.

Section 41 Differing Site Conditions:

During the progress of the work, if subsurface or latent physical conditions are encountered at the site differing materially from those indicated in the contract or if unknown physical conditions of any unusual nature, differing materially from those ordinarily encountered and generally recognized as inherent in the work provided for in the contract, are encountered at the site, the party discovering such conditions shall promptly notify the other party in writing of the specific differing conditions before they are disturbed and before the affected work is performed.

Upon written notification, the Engineer will investigate the conditions, and if the Engineer determines that the conditions materially differ and cause an increase or decrease in the cost or time required for the performance of any work under the contract, an adjustment excluding loss of anticipated profits will be made and the contract modified in writing accordingly. The Engineer will notify the Contractor of the determination as to whether or not an adjustment of the contract is warranted.

No contract adjustment which results in a benefit to the Contractor will be allowed unless the Contractor has provided the required written notice.

No contract adjustment will be allowed under the provisions specified in this section for any effects caused on unchanged work.

Any contract adjustment warranted due to differing site conditions will be made in accordance with the provisions in Section 4-1.03, "Changes," of the Standard Specifications.

Section 42 Project Appearance:

The Contractor shall maintain a neat appearance to the work.

In any area visible to the public, the following shall apply:

When practicable, broken concrete and debris developed during clearing and grubbing shall be disposed of concurrently with its removal. If stockpiling is necessary, the material shall be removed or disposed of weekly.

The Contractor shall furnish trash bins for all debris from structure construction. All debris shall be placed in trash bins daily. Forms or falsework that are to be reused shall be stacked neatly concurrently with their removal. Forms and falsework that are not to be reused shall be disposed of concurrently with their removal.

Full compensation for conforming to the provisions in this section, not otherwise provided for, shall be considered as included in prices paid for the various contract items of work involved, and no additional compensation will be allowed therefor.

Section 43 Hazardous Waste in Excavation:

If the Contractor encounters material in excavation which he/she has reason to believe may be hazardous waste, as defined by Section 25117 of the Health and Safety Code, he/she shall immediately so notify the Engineer in writing. Excavation in the immediate area of the suspected hazardous material shall be suspended until the Engineer authorizes it to be resumed. If such suspension delays the current controlling operation, the Contractor will be granted an extension of time as provided in Section 8-1.07, "Liquidated Damages," of the Standard Specifications.

If such suspension delays the current controlling operation more than two working days, the delay will be considered a right-of-way delay and the Contractor will be compensated for such delay as provided in Section 8-1.09, "Right-of-Way Delays," of the Standard Specifications.

The department reserves the right to use other forces for exploratory work to identify and determine the extent of such material and for removing hazardous material from such area.

Section 44 Removal of Asbestos and Hazardous Substances:

When the presence of asbestos or hazardous substances is not shown on the plans or indicated in the Specifications and the Contractor encounters materials which the Contractor reasonably believes to be asbestos or a hazardous substance as defined in Section 25914.1 of the Health and Safety Code, and the asbestos or hazardous substance has not been rendered harmless, the Contractor may continue work in unaffected areas reasonably believed to be safe, and shall immediately cease work in the affected area and report the condition to the Engineer in writing.

In accordance with Section 25914.1 of the Health and Safety Code, all such removal of asbestos or hazardous substances including any exploratory work to identify and determine the extent of such asbestos or hazardous substance will be performed by separate contract.

If delay of work in the area delays the current controlling operation, the delay will be considered a right-of-way delay and the Contractor will be compensated for such delay as provided in Section 8-1.09, "Right-of-Way Delays," of the Standard Specifications.

Section 45 Substitution of Securities for Withheld Funds:

Upon the Contractor's request, pursuant to Public Contract Code 22300, the Owner will pay to the Contractor the funds withheld from progress payments to ensure performance of the contract, if the Contractor substitutes satisfactory securities as follows.

- (a) At the request and expense of the Contractor, securities equivalent to the amount withheld shall be deposited with the Owner, or with a state or federally chartered bank in this state as the escrow agent, who shall then pay those moneys to the Contractor. Upon satisfactory completion of the contract, the securities shall be returned to the Contractor.
- (b) Alternatively, the Contractor may request and the Owner shall make payment of retentions earned directly to the escrow agent at the expense of the Contractor. At the expense of the Contractor, the Contractor may direct the investment of the payments into securities and the Contractor shall receive the interest earned on the investments upon the same terms provided for in this section for securities deposited by the Contractor. Upon satisfactory completion of the contract, the Contractor

shall receive from the escrow agent all securities, interest, and payments received by the escrow agent from the owner, pursuant to the terms of this section.

- (c) Securities eligible for investment under this section shall include those listed in Section 16430 of the Government Code, bank or savings and loan certificates of deposit, interest-bearing demand deposit accounts, standby letters of credit, or any other security mutually agreed to by the Contractor and the Owner.

The Contractor shall be the beneficial owner of any securities substituted for moneys withheld and shall receive any interest thereon.

- (d)(1) If the Contractor elects to receive interest on moneys withheld in retention by the Owner, the Contractor shall, at the request of any subcontractor, make that option available to the subcontractor regarding any moneys withheld in retention by the Contractor from the subcontractor. If the Contractor elects to receive interest on any moneys withheld in retention by the Owner, then the subcontractor shall receive the identical rate of interest received by the Contractor on any retention moneys withheld from the subcontractor by the Contractor, less any actual pro rata costs associated with administering and calculating that interest. In the event that the interest rate is a fluctuating rate, the rate for the subcontractor shall be determined by calculating the interest rate paid during the time that retentions were withheld from the subcontractor. If the Contractor elects to substitute securities in lieu of retention, then, by mutual consent of the Contractor and subcontractor, the subcontractor may substitute securities in exchange for the release of moneys held in retention by the Contractor.

- (2) This subdivision shall apply only to those subcontractors performing more than five percent of the Contractor's total bid.

- (3) No contractor shall require any subcontractor to waive any provision of this section.

- (e) The escrow agreement used hereunder shall be substantially similar to the following form:

**ESCROW AGREEMENT FOR
SECURITY DEPOSITS IN LIEU OF RETENTION**

This Escrow Agreement is made and entered into by and between _____
_____ whose address is _____
_____ hereinafter called "Owner,"
_____ whose address is _____
_____ hereinafter called "Contractor" and
_____ whose address is _____
_____ hereinafter called "Escrow Agent."

For the consideration hereinafter set forth, the Owner, Contractor and Escrow Agent agree as follows:

(1) Pursuant to Section 22300 of the Public Contract Code of the State of California, Contractor has the option to deposit securities with Escrow Agent as a substitute for retention earnings required to be withheld by Owner pursuant to the Construction Contract entered into between the Owner and Contractor for _____ in the amount of _____ dated _____ (hereinafter referred to as the "Contract"). Alternatively, on written request of the Contractor, the Owner shall make payments of the retention earnings directly to the Escrow Agent. When the Contractor deposits the securities as a substitute for Contract earnings, the Escrow Agent shall notify the Owner within 10 days of the deposit. The market value of the securities at the time of the substitution shall be at least equal to the cash amount then required to be withheld as retention under the terms of the Contract between the Owner and Contractor. Securities shall be held in the name of _____, and shall designate the Contractor as the beneficial owner.

(2) The Owner shall make progress payments to the Contractor for those funds which otherwise would be withheld from progress payments pursuant to the Contract provisions, provided that the Escrow Agent hold securities in the form and amount specified above.

(3) When the Owner makes payment of retentions earned directly to the Escrow Agent, the Escrow Agent shall hold them for the benefit of the Contractor until the time that the escrow created under this contract is terminated. The Contractor may direct the investment of the payments into securities. All terms and conditions of this agreement and the rights and responsibilities of the parties shall be equally applicable and binding when the Owner pays the Escrow Agent directly.

(4) Contractor shall be responsible for paying all fees for the expenses incurred by Escrow Agent in administering the Escrow Account and all expenses of the Owner. These expenses and payment terms shall be determined by the Owner, Contractor, and Escrow Agent.

(5) The interest earned on the securities or the money market accounts held in escrow and all interest earned on that interest shall be for the sole account of Contractor and shall be subject to withdrawal by Contractor at any time and from time to time without notice to the Owner.

(6) Contractor shall have the right to withdraw all or any part of the principal in the Escrow Account only by written notice to Escrow Agent accompanied by written authorization from the Owner to the Escrow Agent that Owner consents to the withdrawal of the amount sought to be withdrawn by Contractor.

(7) The Owner shall have a right to draw upon the securities in the event of default by the Contractor. Upon seven days' written notice to the Escrow Agent from the owner of the default, the Escrow Agent shall immediately convert the securities to cash and shall distribute the cash as instructed by the Owner.

(8) Upon receipt of written notification from the Owner certifying that the Contract is final and complete, and that the Contractor has complied with all requirements and procedures applicable to the Contract, Escrow Agent shall release to Contractor all securities and interest on deposit less escrow fees and charges of the Escrow Account. The escrow shall be closed immediately upon disbursement of all moneys and securities on deposit and payment of fees and charges.

(9) Escrow Agent shall rely on the written notifications from the Owner and the Contractor pursuant to Sections (5) to (8), inclusive, of this Agreement and the Owner and Contractor shall hold Escrow Agent harmless from Escrow Agent's release and disbursement of the securities and interest as set forth above.

(10) The names of the persons who are authorized to give written notice or to receive written notice on behalf of the Owner and on behalf of the Contractor in connection with the foregoing, and exemplars of their respective signatures are as follows:

On behalf of Owner:

On behalf of Contractor:

Title

Title

Name

Name

Signature

Signature

Address

Address

On behalf of Escrow Agent:

Title

Name

Signature

Address

At the time the Escrow Account is opened, the Owner and Contractor shall deliver to the Escrow Agent a fully executed counterpart of the is Agreement.

IN WITNESS WHEREOF, the parties have executed this Agreement by their proper officers on the date first set forth above.

Owner

Contractor

Title

Title

Name

Name

Signature

Signature

In entering into this public works contract or a subcontract to supply goods, services, or materials pursuant to a public works contract, the Contractor or subcontractor offers and agrees to assign to the awarding body all rights, title and interest in and to all causes of action it may have under Section 4 of the Clayton Act (15 U.S.C. Sec. 15) or under the Cartwright Act (Chapter 2 (commencing with Section 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 the subcontract. This assignment shall be made and become effective at the time the awarding body tenders final payment to the Contractor, without further acknowledgement by the parties.

Section 47 Examination and Audit of Contracts:

This contract shall be subject to the examination and audit of the State Auditor at the request of the Owner or as part of any audit of the Owner, for a period of three years after final payment under the contract.

The examinations and audits under this section shall be confined to those matters connected with the performance of the contract, including, but not limited to, the costs of administering the contract.

Section 48 Sanitary Sewer Overflow Emergency Response Plan:

The City has adopted an Overflow Emergency Response Plan (OERP) as required by the SWRCB Statewide General Waste Discharge Requirements, in order to support an orderly and effective response to Sanitary Sewer Overflows (SSOs).

Sanitary Sewer Overflows (SSOs) are defined as follows:

Any overflow, spill, release, discharge or diversion of untreated or partially treated wastewater from a sanitary sewer system including:

- (i) Overflows or releases of untreated or partially treated wastewater that reach waters of the United States;
- (ii) Overflows or releases of untreated or partially treated wastewater that do not reach the waters of the United States; and
- (iii) Wastewater backups into buildings and on private property that are caused by blockages or flow conditions within the publicly owned portion of a sanitary sewer system.

The Contractor shall follow the following procedures in the event that you cause or witness a Sanitary Sewer Overflow.

- **IMMEDIATELY NOTIFY THE CITY**

- During Business Hours: (707) 823-5331
- After Hours: (707) 829-4400

- **PROTECT THE STORM DRAINS USING MATS, DYKES, BERMS, ETC.**

- **PROTECT THE PUBLIC** - If the spill is entering an area where public contact may occur, and if it is safe to do so, prevent, to the extent possible, public contact with the sewage until City Maintenance Workers arrive.

- **PROVIDE INFORMATION** - Provide the City Maintenance Workers with information about the overflow such as start time, appearance point, suspected cause, weather conditions, etc.

- **Direct ALL media and public relations requests to:**

- Engineering Manager: (707) 823-2151
- City Manager: (707) 823-1153

PART III

SPECIAL PROVISIONS

SECTION	TITLE	PAGE
1	Contract	III- 1
2	Location of Work	III- 1
3	Governing Documents	III- 1
4	Description of Work	III- 1
5	Permits	III- 1
6	Signs and Barricades	III- 1
7	Dust and Debris Control	III- 2
8	Watering	III- 2
9	Existing Facilities	III- 2
10	Construction Grades	III- 2
11	Proposed Schedule of Work	III- 3
12	Material to be Encountered in Excavations	III- 3
13	Copies Furnished	III- 3
14	Additional Drawings	III- 3
15	City Furnished Facilities	III- 3
16	Public Convenience, Safety and Traffic	III- 3
17	Areas for Contractor's Use	III- 4
18	Trees, Shrubs, Grass Areas, Etc.	III- 4
19	Damage to Existing Improvements	III- 4
20	Order of Work	III- 5
21	Property Owner Notifications	III- 5
22	Temporary Erosion Control	III- 5
23	Preservation of Property	III- 6
24	Progress Schedule	III- 7
25	Cooperation	III- 7
26	Safety	III- 7
27	Obstructions	III- 7
28	Hours of Work	III- 8
29	Construction Area Signs	III- 8
30	Maintaining Traffic	III- 8
31	Traffic Control	III- 10
32	Existing Facilities	III- 11

PART III

SPECIAL PROVISIONS

Section 1 Contract:

All work described in the plans and specifications will be let under one contract in the manner set forth in the Notice to Bidders, and in the Bidder's Proposal.

Section 2 Location of Work:

The work is located on Willow Street, Jewell Avenue to High Street as shown on the Improvement Plans.

Section 3 Governing Documents:

All work shall be done in accordance with the General Conditions, these Special Provisions, Construction Plans and details and the City of Sebastopol Standard Plans and Details dated July 1998 insofar as they may apply.

The Standard Specifications of the Department of Transportation, State of California, dated July 2010, hereinafter referred to as the Standard Specifications.

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

Section 4 Description of Work:

The work consists of removal of existing asphalt concrete surface and existing aggregate base and/or subbase material to a typical depth of 30 inches, regrading the surface to form uniform pavement crown and grade break sections, furnishing and placement of type 2 bioaxle geogrid on prepared subgrade, furnishing and placement of Class 1 Aggregate Subbase, furnishing and placement of Class 2 Aggregate Base, furnishing and placement of Hot Mix Asphalt, Concrete, restriping and remarking the finished paved surface and other associated work not specifically listed herein.

Section 5 Permits:

This Contract will constitute the contractor's permit to perform work on Owner's property. The contractor and any subcontractors are also required to obtain City business licenses. The contractor shall be responsible for obtaining these and for paying any associated fees prior to the start of construction and inspection fees as required.

Section 6 Construction Signs and Barricades:

The Contractor shall furnish all reconstruction signs and barricades, the cost of which shall be included in the amount paid for Traffic Control System. Contractor shall acquaint himself with applicable portions of

Section 7 of the Standard Specifications relating to Public Convenience, Public Safety, Portable Delineators, Preservation of Property, and Indemnity and Insurance.

Section 7 Dust and Debris Control:

Dust control shall conform to the provisions in Section 10, "Dust Control," of the Standard Specifications and these Special Provisions.

The Contractor shall be responsible for all mud, rocks, dust, dirt and debris producing materials that originate in the project area and are deposited on other public or private property by truck tire, spillage, or by other means. The contractor shall, before the end of each day's work, clean all paved streets leading from the project that have dust producing materials or debris deposited upon them.

The Contractor shall control dust by the application of water.

In lieu of the provisions of the section paragraph in Section 10-1.04, "Payment," no separate payment will be made to the Contractor when the Engineer orders the application of water for the purpose of controlling dust caused by public traffic only. Full compensation for such dust control will be considered as included in the prices paid for the various items of work involved, and no additional compensation will be allowed.

Section 8 Watering:

Water for compacting embankment material, and for laying dust shall be applied by means of pressure-type distributors equipped with a spray system of hoses with nozzles that will insure a uniform application of water.

No additional compensation shall be made for watering, but shall be included in the various items of work.

Section 9 Existing Facilities:

As part of the work, existing valves, services, manholes, pipes, sprinklers, curbs, gutters, sidewalks, access ramps to be retained and all other fixtures shall be protected from damage. Contractor shall bring any currently damaged facilities to the attention of the Engineer. If none are reported, all damaged facilities within the job site shall be assumed caused by the Contractor.

Section 10 Construction Grades:

The Contractor is responsible for laying out any lines and grades. This layout shall be subject to review and approval by the City before the Contractor proceeds.

Section 11 Proposed Schedule of Work:

Bid Opening	March 2 , 2017 at 3:00 PM
Award of Contract	March 21 , 2017
Deadline to Execute Contract	Ten working days from Notice of Award
Notice to Proceed (approx.)	April 6, 2017
Completion Date (approx.)*	June 30, 2017
*Time of Completion	Sixty (60) working days

Section 12 Material to be Encountered in Excavations:

The Contractor shall visit the site and satisfy himself regarding the character of the material which may be encountered.

Section 13 Copies Furnished:

The Engineer will furnish to the Contractor, free of charge, five (5) sets of the specifications and full size drawings.

Section 14 Additional Drawings:

The Engineer will furnish from time to time such additional drawings and information as he may consider necessary for the Contractor's guidance, and the Contractor shall make his work conform to all such drawings.

Section 15 City Furnished Facilities:

Water is available from a filler pipe at the City Corporation Yard, or the Contractor may request a hydrant service from the Sebastopol Public Works Department by paying a security deposit of \$200.00, and an installation and removal fee of \$100 for a backflow preventer device to be installed by City forces and removed on completion of the project. The security deposit is refundable on return of the backflow device in good operating condition. Depending on the availability of space, the Contractor may make arrangements to store materials at the City Corporation Yard.

Section 16 Public Convenience, Safety and Traffic:

The Contractor shall so conduct his operations in a manner which causes the least possible obstructions and inconvenience to public traffic on public thoroughfares.

Lights, signs, red lights and watchmen as are necessary to give adequate warning to the public and of any dangerous conditions to be encountered as a result thereof, shall be furnished, erected and maintained by the Contractor.

Safety orders, rules and recommendations of the Division of Industrial Safety of the Department of Industrial Relations of the State of California applicable to the work to be done under the contract shall all be obeyed and enforced by the contractor.

All costs involved in respect to the above requirements will be considered as included in the prices bid for Traffic Control and no additional compensation will be allowed.

Section 17 Areas for Contractor's Use:

The right of way shall be used only for purposes that are necessary to perform the required work. The Contractor shall not occupy the right-of-way or allow others to occupy the right-of-way for purposes which are not necessary to perform the required work.

The Contractor shall remove all equipment, materials, and rubbish from the work areas and other City-owned property which he/she occupies and shall leave the areas in the presentable condition in accordance with the provisions in Section 46, "Final Cleaning Up," of these Special Provisions.

The Contractor shall secure at his/her own expense any area required for plant sites, storage of equipment or materials, or for other purposes if sufficient area is not available to him within the contract limits, or at the sites designated on the plans outside the contract limits.

Section 18 Trees, Shrubs, Grass Areas, Etc.:

Damage to trees and shrubs should be avoided wherever possible. It shall be the Contractor's responsibility to replace, in kind, any trees or shrubs destroyed or damaged during construction.

Before construction, the City and Contractor shall walk the entire project and City shall take pictures of existing improvements as a record of as-is conditions.

Any existing improvements damaged or removed by the Contractor as a result of his operations shall be repaired or replaced. All costs involved in the protection and restoration of existing improvements shall be included in the prices bid for the various items of work.

Section 19 Damage to Existing Improvements:

Any existing improvements damaged or removed by the Contractor as a result of his operations shall be repaired or replaced. Any paving damaged or destroyed during the Contractor's operations shall be replaced in kind to the Engineer's satisfaction. All costs involved in the protection and restoration of existing improvements shall be included in the prices paid for the various items of work.

Section 20: Order of Work:

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

Before beginning construction, a preconstruction meeting between the Contractor, City Engineer, and City Inspector will be held.

Full compensation for conforming to the requirements of this section shall be considered as included in the contract prices paid for the various items of work and no additional compensation will be allowed.

Section 21 Property Owner Notifications:

The Contractor shall notify all property owners and businesses affected by the project work at least 48 hours before work is to begin. In addition, the Contractor shall notify property owner(s) and the City 72 hours before entering private property or interrupting sewer or water service. The notice shall be in writing, placed in the mailboxes with postage, or on door hangers and shall indicate the Contractor's name and phone number, type of work, day(s) and time when work will occur. Notice shall be reviewed and approved by the Engineer before being sent.

Any required shut down of the water system shall be performed by City Public Works forces. Contact the City Public Works Department at least 48 hours before requiring shut down of water mains.

Section 22 Temporary Erosion Control:

Temporary erosion control shall consist of, but not be limited to, constructing such facilities and taking such measures as are necessary to prevent, control and abate water, mud, and erosion damage to public and private property as a result of the construction of this project.

Conformance with the requirements of this section shall in no way relieve the Contractor from his responsibilities, as provided in Section 7-1.01G, "Water Pollution," Section 7-1.11, "Preservation of Property," and Section 7-1.12, "Responsibility for Damage," of the Standard Specifications.

Temporary erosion control features as are necessary to provide sediment control shall be constructed and functioning prior to October 15. The Contractor shall construct such supplementary temporary erosion control facilities as are necessary to protect adjacent private and public property.

Temporary erosion control measures shall conform to the current field manual of erosion and sediment control published by the California Regional Water Quality Control Board, San Francisco Bay Region and includes, but is not limited to the following:

- (a) The Contractor shall conduct his operations in such a manner that storm runoff will be contained within the project or channeled into the storm drain system which serves the runoff area. Storm runoff from one area shall not be allowed to divert to another runoff area.
- (b) Storm drain systems, toe of slope drains, and outlet structures shall be constructed and operating before commencing, or concurrently with placing, an embankment. Temporary down drains, drainage structures and other devices shall be provided to channel storm runoff water into the

respective permanent storm drain systems during construction. Mud and silt shall be settled out of the storm runoff before said runoff enters the storm drain system.

- (c) Excavation areas, while being brought to grade, shall be protected from erosion and the resulting siltation of downstream facilities and adjacent areas by the use of various temporary erosion control measures. These measures may include, but shall not be limited to: jute mesh; check dams; confined ponding areas to desilt the runoff; and protection, such as sand bags or straw bales around inlets which have not been brought up to grade.
- (d) Contour graded areas shall be protected against erosion and the resulting siltation of downstream facilities and adjacent areas during grading operations. Various measures may include, but shall not be limited to the use of graded contour berms to control sheet flow; supplemental grading of large areas around temporary or unfinished inlet structures, such as inside ramp loops, to provide desilting basins; and temporary ditch paving.

Culvert pipe used in conjunction with temporary erosion control measures which was new when delivered to the project site and, in the opinion of the Engineer, is not damaged and whose dimensions and other properties conform to the requirements for new material may be used in the new work.

Full compensation for any cost involved in performing planned permanent water pollution control and erosion control to act as temporary water pollution control and temporary erosion control shall be considered as included in the contract prices paid for the various items of work involved and no additional compensation will be allowed.

Section 23 Preservation of Property:

Attention is directed to the provisions in Section 7-1.11, "Preservation of Property," of the Standard Specifications and these Special Provisions.

Existing trees, shrubs, and other plants, that are not to be removed and are injured or damaged by reason of the Contractor's operations, shall be replaced by the Contractor in accordance with the requirements in Section 20-4.07, "Replacement," of the Standard Specifications and the following:

The minimum size of tree replacement shall be 24-inch box and the minimum size of shrub replacement shall be 15-gallon. Replacement ground cover plants shall be from flats and shall be planted 12 inches on center.

Damaged or injured plants shall be removed and disposed of outside the street right of way in accordance with the provisions in Section 7-1.13 of the Standard Specifications. Storm drain easements and temporary construction easements are shown on the plans and shall be staked for location by the surveyors. Temporary easements may be used to move equipment and material and store material as required. The Contractor shall not disturb or remove trees, plant material or facilities located within the confines of the temporary easement unless required by his operations. The Contractor's attention is directed to section entitled, "Final Clean-up," of these Special Provisions.

Section 24 Progress Schedule:

Progress schedules will be required for this contract and shall conform to the provisions in Section 8-1.04, "Progress Schedule," of the Standard Specifications.

Section 25 Cooperation:

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

Other forces may be engaged in installing or in making adjustments to or in relocating various utility or other non-highway facilities throughout the project.

Section 26 Safety:

The Contractor is hereby specifically informed that under this contract he has the sole responsibility for the safety of his work, including his workman, equipment and that of subcontractors, and of the general public as they may come in contact with the work. The Engineer or Inspector has specifically **not** been hired to review the Contractor's safety or methods of operation.

At the end of each day, excavations shall be backfilled, plated with steel trench plates or barricaded and fenced.

Section 27 Obstructions:

Attention is directed to Sections 8-1.10, "Utility and Non-Highway Facilities," and Section 15 "Existing Highway Facilities," of the Standard Specifications and these Special Provisions.

Attention is directed to the existence of power, telephone, and cable television poles, underground gas lines, and underground water and sewer lines within the area in which construction is to be performed. The Contractor will be required to work around these facilities.

Prior to starting work, the Contractor shall (a minimum of 2 working days in advance) call Underground Service Alert (USA), toll free, at (800) 642-2444 and provide USA with all necessary data relative to the proposed work. USA will accept calls and process information to participating agencies that have underground facilities in the area between the hours of 7:30 a.m. and 5:00 p.m. daily, except Saturdays, Sundays, and holidays. Between the hours of 5:00 p.m. and 7:30 a.m. calls will be recorded and then processed after 7:30 a.m. For emergency situations, after hours and on Saturdays, Sundays and holidays, the Contractor shall contact the organization owning the affected facility. Upon notification, agencies having facilities in the area of the proposed excavation will mark their locations in the field using USA standard colors and codes to identify the facility.

The Contractor will be required to work around public utility facilities and other improvements that are to remain in place within the construction area, and he will be held liable to the owners of such facilities for interference with services resulting from his operations.

Section 28 Hours of Work:

Construction work shall be limited to the hours between 7:00 a.m. and 6:00 p.m. Monday through Friday.

Section 29 Construction Area Signs:

Construction area signs shall be furnished, installed, maintained and removed when no longer required in accordance with the provisions in Section 12, "Construction Area Traffic Control Devices," of the Standard Specifications and these Special Provisions.

Construction area signs shall not be used until they are needed and when no longer needed they shall be removed from the site of the work.

If speed limit construction signs are shown, they shall be covered when no work is being performed and the existing speed limit signs, if of different speed than speed limit construction signs, shall be covered when work is being performed.

The Contractor shall notify the Underground Service Alert (USA) in accordance with the section on "Obstructions" in these Special Provisions at least two working days, but no more than 14 calendar days, prior to commencing any excavation for construction area signposts.

All excavations required to install construction area signs shall be performed by hand methods without the use of power equipment, except that power equipment may be used if it is determined there are no utility facilities in the area of the proposed post holes.

Stationary mounted signs shall be erected on wood posts in the same manner specified for roadside signs and in accordance with the Caltrans Standard Plans.

Attention is directed to section entitled "Traffic Control System" elsewhere in these Special Provisions regarding compensation for construction area signs shown on the plans for traffic control system for lane closure.

No separate measurement or payment will be made for construction area signs. All costs associated with construction area signs shall be included in the lump sum contract price for the work and no additional compensation will be allowed.

Section 30 Maintaining Traffic:

Attention is directed to Section 7-1.08, "Public Convenience," Section 7-1.09, "Public Safety," and Section 12 "Construction Area Traffic Control Devices," of the Standard Specification. Nothing in these Special Provisions shall be construed as relieving the Contractor from his responsibilities as provided in said Section 7-1.09.

Lane closures shall conform to the provisions in the section of these Special Provisions entitled "Traffic Control System."

The Contractor's equipment and materials may not be stored within City right-of-way. Construction shall be staged from a site procured by the Contractor at no expense to the City.

Personal vehicles of the Contractor's employees shall not be parked on the traveled way, including any section closed to public traffic.

The Contractor shall notify the Engineer of his intent to begin work at least 5 days before work is begun. The Contractor shall cooperate with local authorities relative to handling traffic through the area.

Whenever vehicles or equipment are parked on the shoulder within 6 feet of a traffic lane, the shoulder area shall be closed with fluorescent traffic cones or portable delineators placed on a taper in advance of the parked vehicles or equipment and along the edge of the pavement at 25-foot intervals to a point not less than 25 feet past the last vehicle or piece of equipment. A minimum of 9 cones or portable delineators shall be used for the taper. A C23 (Road Work Ahead) or C24 (Shoulder Work Ahead) sign shall be mounted on a telescoping flag tree with flags. The flag tree shall be placed where directed by the Engineer.

When leaving a work area and entering a roadway carrying public traffic, the Contractor's equipment, whether empty or loaded, shall in all cases yield to public traffic.

A minimum of one traffic lane, not less than 10 feet wide, shall be open for use by public traffic. When construction operations are not actively in progress, not less than two such lanes shall be open to public traffic.

No work that interferes with public traffic shall be performed before 9:00 a.m. or after 5:00 p.m. except work required under said Section 7-1.08 and 7-1.09 of the Standard Specifications.

The full width of the traveled way shall be open for use by public traffic on Saturdays, Sundays, and designated legal holidays; after 3:00 p.m. on Fridays and the day preceding legal holidays; and when construction operations are not actively in progress.

Minor deviations from the requirements of this section concerning hours of work which do not significantly change the cost of the work may be permitted upon the written request of the Contractor if in the opinion of the Engineer public traffic will be better served and the work expedited. Such deviations shall not be adopted until the Engineer has indicated his written approval. All other modifications will be made by contract change order.

At the end of each working day if a difference in excess of 0.15 foot exists between the elevation of the existing pavement between lanes, the Contractor shall furnish and place portable delineators conforming to the provisions of Section 12-3.04, "Portable Delineators" along said drop-off. Full compensation for furnishing and placing delineators and signs shall be considered as included in the various items of work and no additional compensation will be allowed.

Whenever the Contractor's operations obliterate pavement delineation (lane lines, either pavement markers or painted lines or both, or temporary delineation), such pavement delineation shall be replaced by either permanent or temporary delineation before opening the traveled way to public traffic. Temporary delineation shall consist of reflective traffic line tape applied in pieces not less than 4 inches long nor less

than 4 inches wide spaced no more than 10 feet apart on curves nor more than 20 feet apart on tangents. Reflective traffic line tape shall be applied in accordance with the manufacturer's instructions. Full compensation for temporary delineation shall be considered as included in the prices paid for the contract items of work that obliterated the existing delineation and no separate payment will be made. Backfilled trenches in the existing pavement shall be temporarily paved and maintained with asphalt concrete, or permanently paved (consistent with the existing pavement) with asphalt concrete, before allowing traffic on the trenches.

Section 31 Traffic Control:

A traffic control system shall consist of closing traffic lanes in accordance with the details shown on the plans, the provisions of Section 12, "Construction Area Traffic Control Devices," of the Standard Specifications, and the provisions under "Maintaining Traffic" elsewhere in these Special Provisions.

The provisions in this section will not relieve the Contractor from his responsibility to provide such additional devices or take such measures as may be necessary to comply with the provisions in Section 7-1.09, "Public Safety," of the Standard Specifications.

The base material of construction area signs shall not be plywood. If any component in the traffic control system is damaged, displaced or ceases to operate or function as specified, from any cause, during the progress of the work, the Contractor shall immediately repair said component to its original condition or replace said component and shall restore the component to its original location.

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 excavation adjacent to the traveled way, shall be removed from the traveled way and shoulder. If the Contractor so elects, said components may be stored at selected central locations, approved by the Engineer, within the limits of the highway right-of-way.

Traffic control system required for work, which is classed as extra work, as provided in Section 4-1.03D of the Standard Specifications, will be paid for as a part of said extra work.

(a) Removal of On-street Parking:

Forty-eight (48) hours prior to construction, the Contractor shall place barricades signed "NO PARKING - TOW AWAY - Specific Time and Date(s)" at 50 to 60 foot intervals in the work area. "NO PARKING" signs must also state "C.V.C. 22651 (L)." See example below.

"NO PARKING - TOW AWAY" signs shall be submitted for approval by the Engineer before their use. The Contractor shall notify the Engineer immediately after the "NO PARKING" signs are in place. "NO PARKING" signs and barricades shall be supplied by the Contractor.

Failure to comply with this section will prevent the City from towing vehicles parked in the proposed work area. Work will not proceed if vehicles are parked in the proposed work area.

Full compensation for providing all labor, equipment, and materials necessary for the removal of on-street parking shall be considered as included in the prices paid for related bid items and no additional compensation shall be allowed.

No separate measurement or payment will be made for Traffic Control. All costs associated with Traffic Control shall be included in the lump sum contract price of the work and no additional compensation will be allowed.

Section 32 Existing Facilities:

The work performed in connection with various existing highway facilities shall conform to the provisions in Section 15, "Existing Highway Facilities," of the Standard Specifications and these Special Provisions.

(a) Removal of Miscellaneous Items:

Various items shown on the plans and specified removed herein shall be completely removed and disposed of.

No separate payment shall be made for the various items to be removed unless specified and listed in the proposal. Such items shall be considered as included in the contract lump sum price for Clearing and Grubbing, and no additional compensation will be allowed.

PART IV

SPECIFICATIONS

SECTION	TITLE	PAGE
SECTION 10-1	GENERAL	IV-1
10-1.01	Order of Work	IV-1
10-1.02	Relations with California Regional Water Quality Control Board	IV-1
10-1.03	Progress Schedule	IV-2
10-1.04	Cooperation	IV-2
10-1.05	Safety	IV-3
10-1.06	Obstructions	IV-3
10-1.07	Hours of Work	IV-3
10-1.08	Dust Control	IV-3
10-1.09	Construction Area Signs	IV-4
10-1.10	Maintaining Traffic	IV-4
10-1.11	Notice to Area Residents	IV-4
10-1.12	Traffic Control	IV-5
10-1.13	Existing Highway Facilities	IV-5
10-1.14	Clearing and Grubbing	IV-5
10-1.15	Watering	IV-6
SECTION 10-2	TECHNICAL SPECIFICATIONS	IV-7
10-2.01	Mobilization, Bonds & Insurance	IV-7
10-2.02	Remove Existing Asphalt Pavement	IV-7
10-2.03	Roadway Excavation	IV-8
10-2.04	Biaxial Geogrid Type 2	IV-8
10-2.05	Class I Aggregate Subbase	IV-10
10-2.05	Class II Aggregate	IV-10
10-2.06	Asphalt Concrete Type A	IV-11
10-2.07	Compensation Adjustments for Price Index Fluctuations	IV-11
10-2.08	Wedge Grind	IV-13
10-2.09	Adjust Sanitary Sewer Manhole to Grade	IV-14
10-2.10	Adjust Water Valve Covers to Grade	IV-15
10-2.13	Thermoplastic Traffic Pavement Markings	IV-17
10-2.14	Raised Pavement Markers	IV-18
10-2.14	Electrical Handhole	IV-__
10-2.15	Final Cleanup	IV-21
10-2.16	Water Pollution Control Program (WPCP)	IV-21

PART IV – SPECIFICATIONS

SECTION 10-1 GENERAL

10-1.01 ORDER OF WORK: Order of work shall conform to the provisions in Section 5-1.05, "Order of Work," of the Standard Specifications and these Specifications.

Attention is directed to Section 10-1.11, "Notice to Area Residents" as a controlling scheduling item of work.

The Contractor shall submit the following technical information prior to the pre-construction conference:

1. Emergency Contact Numbers for Prime and Subcontractors.
2. Proposed sequencing of work including street closure and lane closure sequences.
3. Traffic Control Plans specific to Willow Street, High Street and Jewell Avenue.

The Order of Work shall be as follows:

1. Applicable Traffic Control
2. Notice to Area Residents as applicable to Schedule
3. Pavement Demolition
4. Roadway Excavation
5. Subgrade / Base Preparation and Geogrid Placement
6. Aggregate Base Placement and Compaction
7. Hot Mix Asphalt Placement
8. Pavement Delineation
9. Project Cleanup

Full compensation for conforming to the requirements of this section shall be considered as included in the contract prices paid for the various items of work and no additional compensation will be allowed.

10-1.02 RELATIONS WITH CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD: This location is within an area controlled by the Regional Water Quality Control Board. The Contractor shall fully inform himself of all rules, regulations, and conditions that may govern his operations in said area and shall conduct his work accordingly.

The Contractor shall comply with the regulations of the North Coast Regional Water Quality Board and the discharge prohibitions and guidelines pertaining to construction activities listed on pages 1-5-7 through 1-5-9 of the Water Quality Control Plan North Coastal Basin dated April, 1975.

Full compensation for conforming to the requirements of this section shall be considered as included in the contract prices paid for the various items of work involved and no additional compensation will be allowed.

10-1.03 PROGRESS SCHEDULE: Progress schedules will be required for this contract and shall conform to the provisions in Section 8-1.04, "Progress Schedule," of the Standard Specifications.

The progress schedule shall identify refuse collection days. The schedule for demolition, subgrade / base preparation, aggregate base placement, hot mix asphalt placement, striping and marking shall include a makeup day to be included in posting no parking and notices to area residents such that all of the scheduled work will be completed within the scheduled periods. Failure to complete schedule work which results in rescheduling, reposting no parking signs, and redistribution of notices to area residents, all of which shall be at the Contractor's expense and shall not be a basis for time extensions unless caused by unforeseen weather.

Requests for changes in the schedule must be submitted to the City for approval at least 48 hours prior to beginning of construction of the scheduled work.

Full compensation for conforming to the requirements of this section shall be considered as included in the contract prices paid for the various items of work and no additional compensation will be allowed.

10-1.04 COOPERATION: Attention is directed to Sections 7-1.14, "Cooperation," and 8-1.10, "Utility and Non-Highway Facilities," of the Standard Specifications and these Specifications.

In some instances the Contractor may be required to coordinate work and share work areas with PG&E, SBC, Comcast and the City's other contractors. The Contractor shall cooperate at all times with utility agencies and other contractors in the vicinity of the project and as directed by the City.

Full compensation for conforming to the requirements of this section shall be considered as included in the contract prices paid for the various items of work and no additional compensation will be allowed.

10-1.05 SAFETY: The Contractor is hereby specifically informed that under this contract he has the sole responsibility for the safety of his work, including his workforce, equipment and that of subcontractors, and of the general public as they may come in contact with the work. The City or City's Inspector has specifically not been hired to review the Contractor's safety or methods of operation.

10-1.06 OBSTRUCTIONS: Attention is directed to Sections 8-1.10, "Utility and Non-Highway Facilities," and Section 15 "Existing Highway Facilities," of the Standard Specifications and these Specifications.

Attention is directed to the existence of underground gas mains, gas services, water mains, fire hydrants, water services, sewer mains and sewer laterals within the area in which construction is to be performed. The Contractor will be required to protect these facilities to perform work in accordance with the Plans.

The Contractor will be required to protect existing curb, gutter, sidewalk, driveways and access ramps and other improvements that are to remain in place within the construction area. The Contractor will be required to protect power, telephone and cable television within the construction area and will be held liable to the owners of such facilities for interference or damage resulting from their operations.

Full compensation for conforming to the requirements of this section shall be considered as included in the contract prices paid for the various items of work and no additional compensation will be allowed.

10-1.07 HOURS OF WORK: Construction work shall be limited to the hours between 7:00 AM and 6:00 PM Monday through Friday. Except as stated below, no construction is permitted on Saturdays or Sundays. The Contractor's attention is directed to restrictions in the section entitled "Maintaining Traffic," Part III – Section 30 of the Special Provisions.

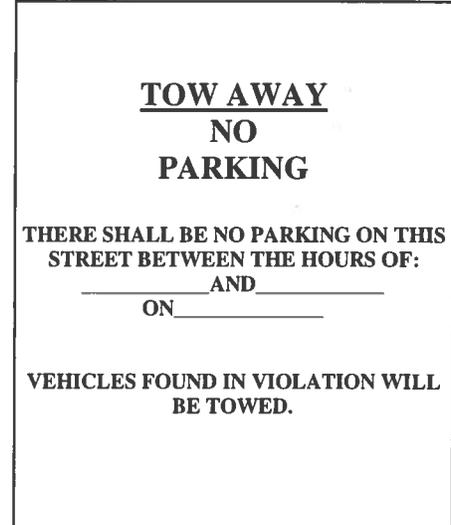
10-1.08 DUST CONTROL: Dust control shall conform to the provisions in Section 10, "Dust Control," of the Standard Specifications and these Specifications.

In lieu of the provisions of the second paragraph in Section 10-1.04, "Payment," no separate payment will be made to the Contractor when the City orders the application of water for the purpose of controlling dust caused by public traffic only. Full compensation for such dust control will be considered as included in the prices paid for the various items of work involved, and no additional compensation will be allowed.

10-1.09 CONSTRUCTION AREA SIGNS: Comply with Part III – Section 29 of the Special Provisions. Construction area signs shall be paid as part of the bid item for Traffic Control. No separate payment will be made therefore.

10-1.09a Removal Of On-Street Parking: During the period seventy-two (72) to forty-eight (48) hours prior to construction, the Contractor shall place barricades signed "NO PARKING - TOW AWAY - Specific Time and Date(s)" at 50 to 60 foot intervals in the work area. The first and last sign shall also be stenciled with the word "BEGIN" or "END" as appropriate to delineate the limits of the no parking area (See example).

"NO PARKING - TOW AWAY" signs shall be submitted for approval by the City before their use. The Contractor shall notify the City immediately after the "NO PARKING" signs are in place. The Contractor shall supply "NO PARKING" signs and barricades.



Failure to comply with this section will prevent the City from towing vehicles parked in the proposed work area. Work will not proceed if vehicles are parked in the proposed work area.

Full compensation for providing all labor, equipment and materials necessary for the furnishing and placement of construction area signs shall be included in the lump sum paid for construction area signs and no additional compensation shall be allowed, therefore. Compensation for providing all labor, equipment and materials necessary for the removal of construction area signs shall be considered as included in the prices paid for related bid items and no additional compensation shall be allowed.

10-1.10 MAINTAINING TRAFFIC: Comply with Part III – Section 30 of the Special Provisions. **The Contractor shall maintain not less than one lane of traffic on Bodega Avenue within the limits of the Project at all times during construction unless otherwise permitted by the City.** Maintaining Traffic shall be paid as part of the bid item for Traffic Control. No separate payment will be made therefore.

10-1.11 NOTICE TO AREA RESIDENTS: The Contractor shall provide notice to all residents and businesses affected by the construction relative to the Contractor's schedule of work including the traffic control provisions during construction. A sample notice shall be provided to the Contractor by the City. If the Contractor desires to modify the notice, the revisions must be

submitted to the City for approval at least 10 days prior to beginning work. The Notice to Area Residents shall be a **door hanger type notice printed on heavy paper or cardboard**. The dates of work shall match the work schedule provided to and approved by the City.

If the Contractors schedule shall change to include dates of work beyond the dates indicated in the posted notices, the Contractor shall repost such notices at least 48 hours prior to commencing work on the changed schedule work.

10-1.12 TRAFFIC CONTROL: The Contractor shall be responsible for maintaining traffic control through the worksite in accordance with Part III – Section 31 of the Special Provisions. This requirement shall be continuous, 24 hours per day, during the construction phase of the project.

The Contractor shall submit a Detour Plan for review and approval by the Engineer. Once the Detour Plan is approved by the Engineer, the Contractor shall implement the Plan, and shall maintain it during the construction phase. Detour elements may include, but not be limited to, Programmable Message Signs, detour signs, and guidance signs throughout the detour(s).

All costs associated with **Traffic Control** including detour plan, detour signs, construction area signs, maintaining traffic, placing no parking signs and notice to area residents shall be included in the lump sum paid for Traffic Control. The lump sum paid for Traffic Control shall include all costs associated with the work described herein including all labor, equipment, materials, printing costs and other associated costs with completing the work. Payment for Traffic Control shall be paid as a percentage of work completed.

10-1.13 EXISTING HIGHWAY FACILITIES: The work performed in connection with various existing highway facilities shall conform to the provisions in Section 15, "Existing Highway Facilities," of the Standard Specifications and these Specifications. Removal of traffic stripes shall conform to the provisions of Sections 15-2.02B and 15-2.02C of the Standard Specifications and these Specifications.

Residue from the removal of existing roadway, curb, gutter, sidewalk and ramp improvements shall be disposed of immediately after removal. Residue shall not be allowed to enter the storm drain system. Disposal shall be performed in accordance with Section 7-1.13 "Disposal of Material Outside the Highway Right of Way," of the Standard Specifications.

Full compensation for furnishing all labor, materials, tools, equipment and incidentals, and for doing all the work involved including, but not limited to, removal and disposal of existing traffic markings shall be considered as included in the contract unit prices for the various items of work indicated in the bid schedule as indicated elsewhere in these special conditions. No additional compensation will be allowed.

10-1.14 CLEARING AND GRUBBING: Clearing and grubbing shall conform to the provisions in Section 16, "Clearing and Grubbing," of the Standard Specifications and these Specifications.

All existing vegetation, outside the areas to be cleared and grubbed, shall be protected from the Contractor's operations unless specifically shown on the plans to be removed.

Nothing herein shall be construed as relieving the Contractor of his responsibility for final cleanup of the highway as provided in Section 4-1.02, "Final Cleaning Up," of the Standard Specifications and Section 10-2.15 of these Specifications.

Compensation for clearing and grubbing shall be included in the various items of work and no separate or additional compensation shall be made therefore.

10-1.15 WATERING: Watering shall conform to the provisions in Section 17, "Watering," of the Standard Specification.

The City will supply a hydrant meter for construction at one location at no cost to the Contractor. The location and rate of withdrawal will be subject to City approval. Contractor shall determine, with the City, the cost of water to be supplied for watering.

Full compensation for developing a water supply shall be considered as included in the contract prices paid for the various items of work involved and no additional compensation will be allowed.

SECTION 10-2 TECHNICAL SPECIFICATIONS

10-2.01 MOBILIZATION, BONDS & INSURANCE: 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 and from the project site; for the establishment of all offices, buildings, construction yards, sanitary facilities, and any 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, as well as the related demobilization costs anticipated at the completion of the project. The cost of all bonds and insurance policies, including premiums and incidentals, shall be included in mobilization. Unless otherwise approved by the City, the price bid for Mobilization, Bonds and Insurance shall not exceed 5% of the total contract amount.

No additional compensation will be allowed for additional mobilizations required, including but not limited to, delays caused by the relocation of existing utility facilities shown on the Plans or discovered during construction operations.

The deletion of work or the addition of extra work as provided for herein shall not affect the price paid for Mobilization.

Payment for "Mobilization, Bonds, & Insurance" will be made at the Contract Lump Sum price included in the Bid Schedule. Said price shall constitute full compensation for all such work. Payment for Mobilization will be made as follows:

70% of the bid item for Mobilization will be paid on the first progress payment.

100% of the bid item for Mobilization will be paid on the second progress payment, unless all the Mobilization items listed herein have not been completed, at which point payment will be withheld until all the items are completed.

10-2.02 REMOVE EXISTING ASPHALT PAVEMENT

Existing asphalt concrete pavement shall be removed to the limits and to the depth shown on the Plans. Saw cut the existing pavement at the limits of work so that the visible edge of the remaining asphalt form a neat straight line. Asphalt concrete pavement removed shall be properly disposed of offsite by the Contractor.

The Contractor's attention is directed to the existence of in-pavement electrical flashers at the crosswalk lines. The in-pavement flashers will be de-energized by the City prior to the start of work by the Contractor. The electrical flashers shall be removed and salvaged prior to the commencement of asphalt pavement removal.

Payment for **Remove Existing Asphalt Concrete Pavement** and existing in-pavement flashers shall be included in the unit price per square foot paid for asphalt removal and shall include full compensation for furnishing all labor, materials, tools, equipment and incidentals and for doing all the work involved with asphalt concrete pavement removal and disposal and removal of in-pavement flashers as shown on the Plans, as specified in the Standard Specifications, these Specifications and as directed by the City and no additional compensation shall be allowed.

10-2.03 ROADWAY EXCAVATION

After removal of the existing asphalt pavement, the contractor shall excavate the roadway section to the lines and grades shown on the plans. All materials removed during Roadway Excavation shall become the property of the Contractor and shall be removed promptly from the job site.

The Contractor's attention is directed to the existence of electrical conductors in conduit that serve the in-pavement flashers. The electrical conductors will be de-energized by the City prior to excavation. The Contractor shall take care to intercept the existing electrical lines in a PVC conduit at the edge of the roadway, and shall neatly cut the conduit and conductors two (2) feet out from the lip of the gutter. The existing conduit and conductors shall be protected during the remaining excavation, and during the subsequent backfill of the roadway.

The Contractor's attention is directed to the existence of other utilities on Bodega Avenue. These utilities shall be protected in place during the roadway excavation and subsequent backfill operation.

Payment for **Roadway Excavation** shall be included in the unit price per cubic yard paid for roadway excavation and shall include full compensation for furnishing all labor, materials, tools, equipment and incidentals and for doing all the work involved with roadway excavation, including protection of existing utilities, as shown on the Plans, as specified in the Standard Specifications, these Specifications and as directed by the City and no additional compensation shall be allowed.

10-2.04 BIAXIAL GEOGRID TYPE 2

After removal of existing asphalt pavement, and roadway excavation to the depth and to the limits shown on the Plans and as specified in these Specifications, the Contractor shall grade and compact the remaining subbase or base rock material to not less than 95% Relative Compaction per ASTM D1557. Contractor shall furnish and place Biaxial Geogrid Type 2 Pavement Reinforcement Material on the prepared subbase or base rock material in accordance with the manufacturer's recommendations. The biaxial geogrid type 2 material furnished and installed shall be Tencate Mirafi BXG 120, or approved equal, and shall conform to the following product properties:

Product Properties

Index Properties	Units	MD Values ¹	XMD Values ¹
▪ Aperture Dimensions ²	mm (in)	25 (1.0)	33 (1.3)
▪ Minimum Rib Thickness ²	mm (in)	1.27 (0.05)	1.27 (0.05)
▪ Tensile Strength @ 2% Strain ³	kN/m (lb/ft)	6.0 (410)	9.0 (620)
▪ Tensile Strength @ 5% Strain ³	kN/m (lb/ft)	11.8 (810)	19.6 (1,340)
▪ Ultimate Tensile Strength ³	kN/m (lb/ft)	19.2 (1,310)	28.8 (1,970)
Structural Integrity			
▪ Junction Efficiency ⁴	%	93	
▪ Flexural Stiffness ⁵	mg-cm	750,000	
▪ Aperture Stability ⁶	m-N/deg	0.65	
Durability			
▪ Resistance to Installation Damage ⁷	%SC / %SW / %GP	95 / 93 / 90	
▪ Resistance to Long Term Degradation ⁸	%	100	
▪ Resistance to UV Degradation ⁹	%	100	

Notes

1. Unless indicated otherwise, values shown are minimum average roll values determined in accordance with ASTM D4759-02. Brief descriptions of test procedures are given in the following notes.
2. Nominal dimensions.
3. True resistance to elongation when initially subjected to a load determined in accordance with ASTM D6637-01 without deforming test materials under load before measuring such resistance or employing "secant" or "offset" tangent methods of measurement so as to overstate tensile properties.
4. Load transfer capability determined in accordance with GRI-GG2-05 and expressed as a percentage of ultimate tensile strength.
5. Resistance to bending force determined in accordance with ASTM D5732-01, using specimens of width two ribs wide, with transverse ribs cut flush with exterior edges of longitudinal ribs (as a "ladder"), and of length sufficiently long to enable measurement of the overhang dimension. The overall Flexural Stiffness is calculated as the square root of the product of MD and XMD Flexural Stiffness values.
6. Resistance to in-plane rotational movement measured by applying a 20 kg-cm (2 m-N) moment to the central junction of a 9 inch x 9 inch specimen restrained at its perimeter in accordance with U.S. Army Corps of Engineers Methodology for measurement of Torsional Rigidity.
7. Resistance to loss of load capacity or structural integrity when subjected to mechanical installation stress in clayey sand (SC), well graded sand (SW), and crushed stone classified as poorly graded gravel (GP). The geogrid shall be sampled in accordance with ASTM D5818-06 and load capacity shall be determined in accordance with ASTM D6637-01.
8. Resistance to loss of load capacity or structural integrity when subjected to chemically aggressive environments in accordance with EPA 9090 immersion testing.
9. Resistance to loss of load capacity or structural integrity when subjected to 500 hours of ultraviolet light and aggressive weathering in accordance with ASTM D4355-05.

All cost for preparation of the base rock or subgrade material and for furnishing and placement of the biaxial geogrid pavement reinforcement material in accordance with manufacturer's recommendations shall be included in the unit price per square foot of Biaxial Geogrid installed and shall include full compensation for furnishing all labor, materials, tools, equipment and incidentals and for doing all the work involved as shown on the Plans, as specified in the Standard Specifications, these Specifications and as directed by the City and no additional compensation will be allowed.

10-2.05 CLASS 1 AGGREGATE SUBBASE

Aggregate Subbase shall Class 1, and shall conform to Section 26, "Aggregate Bases," of the State Specifications, and these Specifications.

Aggregate subbase shall be produced from commercial quality aggregate consisting of broken stone, crushed gravel, clean, rough-surfaced gravel and sand, or a combination thereof. The grading of the material shall conform to Caltrans specifications. Spreading and compacting shall be performed by methods that will produce a uniform subbase when firmly and properly compacted free from pockets of coarse or fine material. Compact aggregate subbase material to not less than 95% Relative Compaction per ASTM D1557

The contract unit price paid per Ton of **Class 1 Aggregate Subbase** shall include full compensation for furnishing all labor, materials, tools, equipment, incidentals, and for doing all work involved in excavating, placing, and compacting Class 1 Aggregate Subbase as shown on the Plans, as specified in the Standard Construction Specifications, these Specifications, and as directed by the City and no additional compensation will be allowed.

10-2.06 CLASS 2 AGGREGATE BASE

Aggregate base shall be Class 2 and shall conform to Section 26, "Aggregate Bases," of the State Specifications, and these Specifications.

Aggregate base shall be produced from commercial quality aggregate consisting of broken stone, crushed gravel, clean, rough-surfaced gravel and sand, or a combination thereof. The grading of the material shall be three-fourth inch (3/4") maximum. Spreading and compacting shall be performed by methods that will produce a uniform base when firmly and properly compacted free from pockets of coarse or fine material. Compact aggregate base material to not less than 95% Relative Compaction per ASTM D1557

Finished grade tolerances shall conform to the State Standard Specifications.

The contract unit price paid per Ton of **Class 2 Aggregate Base** shall include full compensation for furnishing all labor, materials, tools, equipment, incidentals, and for doing all work involved in excavating, placing, and compacting Class 2 Aggregate Base as shown on the Plans, as specified in the Standard Construction Specifications, these Specifications, and as directed by the City and no additional compensation will be allowed.

10-2.07 ASPHALT CONCRETE TYPE A

Asphalt concrete shall be Type A and shall conform to the provisions of Section 39 of the State Standard Specifications.

Emulsion shall be applied to both the vertical edges of the existing pavement or the existing curb and gutter prior to placing new asphalt concrete. Asphaltic emulsions shall conform to “Asphaltic Emulsions Binder (Tack Coat)” of the Standard Construction Specifications and shall be included in the unit bid price for Asphalt Concrete Type A and no additional compensation shall be allowed therefore. If the final lift of pavement is not placed on the same day as the initial pavement course, a tack coat shall be placed on the surface of the initial pavement course prior to placement of the final pavement course.

The paving asphalt shall be Performance Grade (PG) 64-10 per AASHTO M320-04 Specifications, as approved by the City. The amount of asphalt binder will be determined by the Contractor in accordance with CAL 367. Tolerance, upper and lower limit, will be determined to meet stability air voids and potential flushing requirements.

The aggregate gradation shall be one-half inch (1/2”) maximum, medium gradation. The asphalt concrete shall be placed in two, 2 inch thick, (finished nominal thickness), lifts. The Contractor shall construct finished pavement lifts for the vehicle travel lanes (typically, each 11 feet, 6 inches wide) before placing the finished pavement lifts for the parking lanes, constructed each side of the travel lanes. Finished grade tolerances shall conform to the State Standard Specifications. The final pavement elevation shall be $\pm 1/4$ ” higher than the adjacent lip of gutter.

The contract unit price paid per Ton of **Asphalt Concrete, Type A** shall include full compensation for furnishing all labor, materials, tools, equipment, incidentals, and for doing all work involved in the production, delivery, and placement of Type A Asphalt Concrete as shown on the Plans, as specified in the Standard Specifications, these Specifications, and as directed by the City and no additional compensation will be made therefore.

10-2.08 COMPENSATION ADJUSTMENTS FOR PRICE INDEX FLUCTUATIONS

The provisions of this section shall apply only to the following contract item:

- A. Asphalt Concrete, Type A

The compensation payable for the above listed items will be increased or decreased in conformance with the provisions of this section for paving asphalt price fluctuations exceeding 10 percent (I_u/I_b is greater than 1.10 or less than 0.90) which occur during performance of the work.

The adjustment in compensation will be determined in conformance with the following formulae when the above listed items are included in a monthly estimate:

Total monthly adjustment = AQ

- A. For an increase in paving asphalt price index exceeding 10 percent:
 $A = 0.90 (I_u/I_b - 1.10) I_b$
- B. For a decrease in paving asphalt price index exceeding 10 percent:
 $A = 0.90 (I_u/I_b - 0.90) I_b$
- C. Where:
 - 1. A = Adjustment in dollars per ton of paving asphalt used to produce asphalt concrete and asphaltic emulsion residue used as paint binder rounded to the nearest \$0.01.
 - 2. I_u = The California Statewide Paving Asphalt Price Index which is in effect on the first business day of the month within the pay period in which the quantity subject to adjustment was included in the estimate.
 - 3. I_b = The California Statewide Paving Asphalt Price Index for the month in which the bid opening for the project occurred.
 - 4. Q = Quantity in tons of paving asphalt that was used in producing the quantity of asphalt concrete shown on the monthly estimate using the amount of asphalt determined by the Engineer plus the quantity in tons of paving asphalt that would have been used as residue in the asphaltic emulsion (paint binder) shown on the monthly estimate.

The adjustment in compensation will also be subject to the following:

- A. The compensation adjustments provided herein will be shown separately on payment estimates. The Contractor shall be liable to the City for decreased compensation adjustments and the City may deduct the amount thereof from moneys due or that may become due the Contractor.
- B. Compensation adjustments made under this section will be taken into account in making adjustments in conformance with the provisions in Section 4-1.03B, "Increased or Decreased Quantities," of the State Standard Specifications.
- C. In the event of an overrun of contract time, adjustment in compensation for paving asphalt included in estimates during the overrun period will be determined using the California Statewide Paving Asphalt Price Index in effect on the first business day of the month within the pay period in which the overrun began.

The California Statewide Paving Asphalt Price Index is determined each month on the first business day of the month by the City using the median of posted prices in effect as posted by Chevron, Mobil, and Unocal for the Buena Vista, Huntington Beach, Kern River, Long Beach, Midway Sunset, and Wilmington fields.

In the event that the companies discontinue posting their prices for a field, the City will determine an index from the remaining posted prices. The City reserves the right to include in the index determination the posted prices of additional fields.

The California Statewide Paving Asphalt Price Index is available on the Division of Engineering Services website at: http://www.dot.ca.gov/hq/esc/oe/asphalt_index/astable.html

10-2.09 WEDGE GRIND

Wedge grinding shall consist of cold planing a 5 to 10 foot wide continuous section of asphalt pavement to the limits shown on the Project Plans. The depth of the planing below the gutter lip shall be 1 ¾". The pavement overlay grade shall be ¼" higher than the adjacent lip of gutter.

The wedge grinding of asphalt concrete pavement shall be performed by cold planing. The cold planing machine shall have a cutter head at least five (5) feet wide and shall be operated so as not to produce fumes or smoke. The depth, width, and shape of the cut shall be as shown on the Project Plans, or as directed by the City. The final cut shall result in a uniform surface. The outside lines of the planed area shall be neat and uniform. The road surfacing to remain in place shall not be damaged in any way. The planed road surface shall not be damaged or spalled.

Following planing operations, no drop-off will be allowed at any time adjacent to driveways or around the edges of manhole rims, drain inlets, vaults, valve boxes, and any other roadway appurtenances. Where transverse joints are planed in the pavement at conform lines, no drop-off shall remain between the existing pavement and the planed area when the pavement is opened to public traffic.

If permanent asphalt concrete has not been placed to the level of existing pavement before the pavement is to be opened to public traffic, a temporary asphalt concrete taper shall be constructed. Asphalt concrete for temporary tapers shall be placed to the level of the existing pavement and tapered in five (5) feet to the level of the planed area. Asphalt concrete for tapers shall be commercial quality and may be spread and compacted by any method that will produce a smooth riding surface. Asphalt concrete tapers shall be completely removed, including removing all loose material from the underlying surface, before placing the permanent surfacing. Full compensation for furnishing asphalt concrete for temporary tapers and for constructing, maintaining, removing, and disposing of the tapers shall be considered as included in the contract price paid per square yard for wedge grinding and no additional compensation will be allowed therefore.

All material planed from the roadway surface, including material deposited in existing gutters or the adjacent traveled way, shall be immediately removed from the surface and disposed of off-site as directed in these Specifications or by the City. The removal crew shall follow within fifty (50) feet of the planer.

All planed material, not used to replace unsuitable material removed from the project area, shall be transported and properly disposed of offsite. Transport and off-loading of material shall be considered incidental and included in the unit price paid for this item.

Planed pavement shall not remain exposed to traffic for more than five (5) calendar days before paving. It shall be the responsibility of the Contractor to schedule planning and paving operations to meet this requirement. Planing operations shall be considered to be road construction and shall conform to Section 6-13 of the Standard Specifications and "Traffic Control," Part III – Section 31, Specifications.

Wedge grinding will be measured by the square yard. The quantity to be paid will be the actual area of pavement cold planed, irrespective of the number of passes required to obtain the specified depth.

The contract unit price paid per square yard of **Wedge Grind** shall include full compensation for furnishing all labor, materials, tools, equipment, incidentals and for doing all work involved in the wedge grind as shown on the Plans, as specified in the Standard Construction Specifications, these Specifications and as directed by the City and no additional compensation will be allowed, therefore.

10-2.10 ADJUST SEWER MANHOLE TO GRADE

The Sewer Manhole shall be adjusted to grade in accordance with City Standard Specifications. The location of the sewer manhole shall be referenced prior to the placement of the final asphalt pavement and the location of the sewer manhole shall be painted on the asphalt surface immediately after paving.

The sewer manhole opening shall be covered during the entire operation so that no debris can fall into the manhole and block the flow of sewage. At the Contractor's expense, any debris falling into the manhole shall be immediately removed.

The contract unit price for **Adjust Sewer Manhole To Grade** shall include full compensation for furnishing all labor, materials, tools, equipment and incidentals and for doing all work in adjusting the sewer manhole to grade as specified in the City Sebastopol Specifications, these Specifications, the Plans, the Sebastopol Standard Construction Drawing or as directed by the City and no additional compensation will be allowed.

10-2.11 ADJUST WATER VALVE COVERS TO GRADE

Water valve covers shall be adjusted to grade in accordance with City Standard Specifications. All water valve covers shall be carefully referenced prior to the placement of the final asphalt pavement and the location of the water valve covers shall be painted on the asphalt surface immediately after paving.

Roadway excavation may entail removal of the existing water valve riser. The riser shall be replaced with a new riser in accordance with City specifications.

The water valve box covers shall be adjusted to grade per City Std. W-2.1. Adjustment of water valve covers to finished grade shall be accomplished by removing the existing frame and cover, removing the existing concrete encasement, paving a new concrete encasement, resetting the existing frame and cover and then placing 2" thick asphalt concrete over the concrete encasement.

The water valve opening shall be covered during the entire operation so that no debris can fall into the valve opening and damage the valve. Prior to the placement of the new concrete grade ring, the Contractor shall demonstrate to the satisfaction of the City that each water valve is operating properly and has not been damaged by the Contractor's operations. At the Contractor's expense, any water valve damaged during the construction of the pavement reconstruction improvements shall be replaced with a new, City standard, water valve matching the size, type and valve manufacturer and model of the valve replaced.

All materials removed during adjusting the water valve covers to grade shall become the property of the Contractor and shall be properly disposed of offsite. If, in the City's judgement, existing valve frame or cover are unsuitable and were damaged by the Contractor's operations, they shall be replaced by the Contractor with a new valve frame and cover at no cost to the City.

The contract unit price for **Adjust Water Valve To Grade** shall include full compensation for furnishing all labor, materials, tools, equipment and incidentals and for doing all work in adjusting water valve covers to grade as specified in the City Sebastopol Specifications, these Specifications, the Plans, the Sebastopol Standard Construction Drawing or as directed by the City and no additional compensation will be allowed.

10-2.12 THERMOPLASTIC PAVEMENT MARKINGS

Thermoplastic pavement markings shall conform to the provisions in Sections 84-1, "General" and 84-2, "Thermoplastic Traffic Stripes and Pavement Markings", of the Standard Specifications and these Specifications.

Section 84-2.02, "Materials" of the Standard Specifications is deleted.

The thermoplastic material shall conform to State Specifications 8010-41G-21. Glass beads to be applied to the surface of the molten thermoplastic material shall conform to the requirements of State Specification 8010-22L-22 (Type II), or AASJTP Designation: M 247 (Type 1).

State Specifications for thermoplastic material and glass beads may be obtained from the Transportation Laboratory, P.O. Box 19128, Sacramento, CA. 95819, (916) 739-2400.

Thermoplastic material for pavement markings shall be applied at a minimum thickness of 0.125-inch.

A primer of the type recommended by the manufacturer of the thermoplastic material shall be applied over all existing painted stripes and pavement legends to be covered with thermoplastic material as shown on the Plans.

12" White Crosswalk Striping will be measured and paid for by the lineal foot of stripe. Thermoplastic pavement markings will be measured and paid for by the square foot of the striping detail involved per the Standard Specifications.

Full compensation for furnishing all labor, materials, tools, equipment and incidentals and for doing all the work involved with placing **Thermoplastic Pavement Markings**, as specified in these Specifications, as shown on the Plans and as directed by the City shall be considered as included in the contract square foot price for Thermoplastic Pavement Markings and no additional compensation will be allowed.

10-2.13 RAISED PAVEMENT MARKERS

Raised Pavement markers shall be installed as shown on the plan. The work includes installing Detail 23 with yellow markers, and Detail 23 with white markers, all per the California Manual of Uniform Traffic Control Devices (CA MUTCD), except as noted.

Raised Pavement Markers shall comply with, and shall be installed per the CA MUTCD.

Full compensation for placing **Raised Pavement Markers** shall be made at the contract unit price bid for raised pavement markers, and shall include all labor, materials, tools, equipment and incidentals and for doing all the work involved with, as specified in these Specifications, as shown on the Plans and as directed by the City, and no additional compensation will be allowed.

10-2.14 ELECTRICAL HANDHOLE

The Contractor shall install Electrical Handholes over the existing electrical conduits where shown on the plans.

The Electrical Handhole shall be a Detector Handhole, and shall comply with Caltrans Std. ES-05d. Installation of the Handhole shall comply with Caltrans standards.

The Contractor shall intercept and cut the existing conduit and conductors that serve the existing in-pavement flashers. The City will de-energize the conductors prior to the start of construction. The existing conduit and conductors on the supply side of the circuit shall be swept up into the detector handhole and preserved for future connection. The remaining portion of the conduit and conductors shall be removed by the Contractor.0

Full payment for **Electrical Handholes** shall be made at the contract unit price bid for electrical handholes, and shall include all labor, tools, materials and equipment required to install the electrical handholes, including intercepting the existing conduit and conductors, and no additional compensation shall be made.

10-12.15 FINAL CLEAN-UP: Before final inspection of the work, the Contractor shall clean the work and all ground occupied by him in connection with the work, of all rubbish, excess materials (including liquid asphalt), and equipment. The sidewalks and curbs shall be thoroughly swept clean of all dirt, dust and foreign material. All parts of the work shall be left in neat and presentable condition. Payment for cleaning of sidewalks and curbs, and clean up in general, shall be considered as included in the unit bid price for other contract items and no additional payment shall be made.

10-2.16 WATER POLLUTION CONTROL PROGRAM (WPCP): The Contractor shall comply with Section 10-1.02 of these Specifications and Appendix A – General Guidelines for Construction Activities contained herein.

The Contractor shall be paid for the work of preparing, implementing, inspecting, maintaining, and removing the WPCP on a lump sum basis as indicated in the Bid Schedule. Payment will be based on the percentage of work completed to date.

.....

APPENDIX A

CITY OF SEBASTOPOL General Guidelines for Construction Activities Erosion and Sediment Control and Minimization of Hazardous Materials Contact with Stormwater

General

1. The *Erosion and Sediment Control Field Manual, Third Edition, June 1999*, by the California Regional Water Quality Control Board, San Francisco Bay Region, forms the basis for these requirements, and is incorporated herein in its entirety. A copy of the *Field Manual* may be obtained from the California Environmental Protection Agency State Water Resources Control Board Water Quality home page, <http://www.waterboards.ca.gov/stormwtr/training.html> under "Publications Available".
2. The City shall periodically inspect the Contractor's work to ensure that work conforms to these erosion control guidelines and requirements.
3. For public projects, the City shall perform erosion control follow-up and maintenance and be responsible for post construction stormwater protection following completion of the project, in accord with the provisions of the *Field Manual* and the City's Storm Water Management Plan.
4. The Contractor shall conform to all of the requirements contained in the approved plans and these contract documents and specifications and any other documents referenced herein.

EROSION CONTROL

Contractor shall conform with the requirements contained in Part IV, Specifications, Section 02770, Soil Erosion Control, and these guidelines.

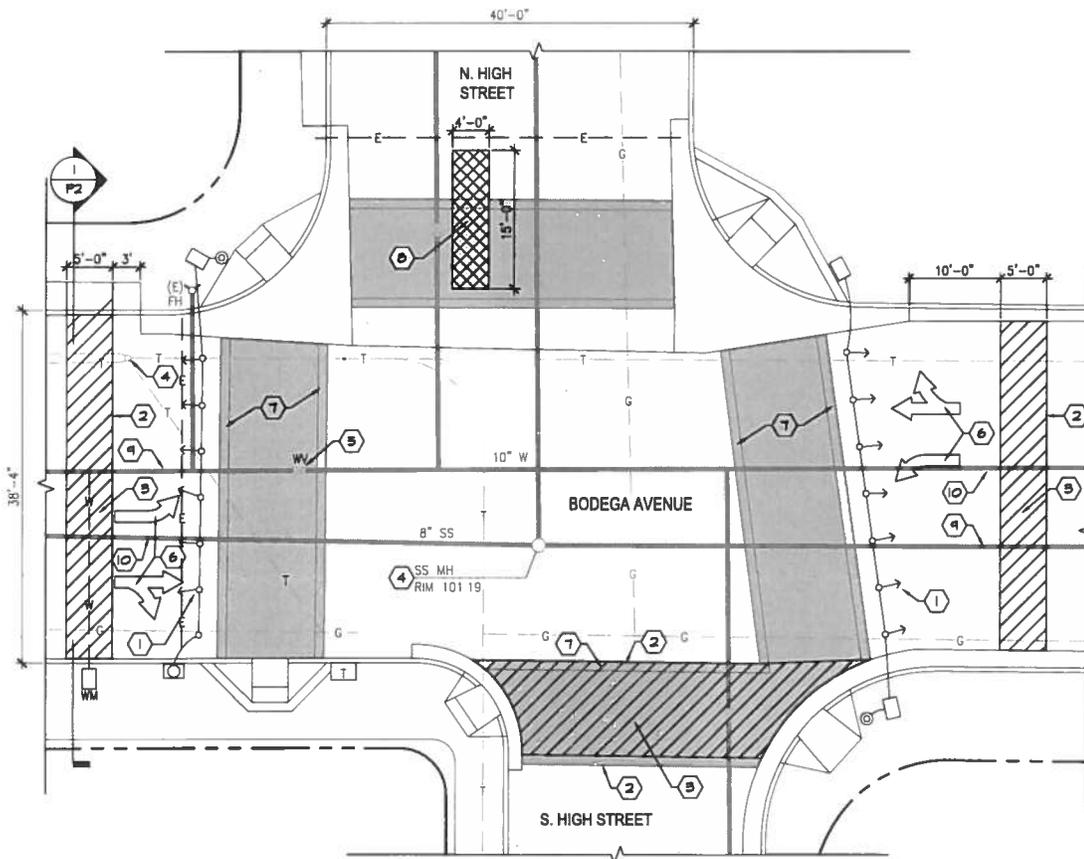
GENERAL PRACTICES TO MINIMIZE HAZARDOUS MATERIALS CONTACT WITH STORM WATER (to be used in conjunction with the *Field Manual*)

1. **Scheduling:** The key to keeping potentially hazardous construction materials (PHCM) out of storm water is to perform most of the construction (earthwork and foundation work) during the dry season. All erosion control facilities shall be in place by October 15, or before the first rains - which ever comes first. All PHCMs shall be covered with tarps and elevated off the ground if rain is predicted.
2. **Chemical Storage:** Chemicals shall be stored in their original containers or in well-labeled, sealed containers in designated areas.
3. **Drainage:** PHCMs shall not be transported, applied, or washed within areas which drain to the City Storm Drain System.
4. **Construction Equipment and Vehicles - Maintenance**
 - a. Maintain all construction equipment to prevent oil or other fluid leaks.
 - b. Use drip pans for any oil or fluid changes that are required for maintenance of equipment. Keep vehicles and equipment clean. Do not allow excessive build-up of oil and grease.

- c. Use off-site repair shops as much as possible.
 - d. Always use secondary containment, such as a drain pans or drop cloths, to catch spills or leaks when removing or changing fluids.
 - e. Place stockpiled spill cleanup materials where they will be readily accessible. Regularly inspect on-site vehicles and equipment for leaks, and repair immediately. Check incoming vehicles and equipment (including delivery trucks, and employee and subcontractor vehicles) for leaking oil and fluids. Do not allow leaking vehicles or equipment on-site.
 - f. Segregate and recycle wastes, such as greases, used oil or oil filters, antifreeze, cleaning solutions, automotive batteries, and hydraulic and transmission fluids.
5. Construction Equipment and Vehicles – Fueling
- a. Use off site fueling stations as much as possible.
 - b. If fueling must occur on-site, use designated areas, located away from drainage. Locate on-site fuel storage tanks over a retention area designed to hold the total tank volume.
 - c. Cover the retention area with an impervious material and install it in a manner to ensure that any spills will be contained in the retention area.
 - d. Discourage "topping-off" of fuel tanks, as it frequently leads to fuel spillage.
 - e. Always use secondary containment, such as a drain pans or drop cloths, when fueling to catch spills/leaks.
 - f. Place stockpiled spill cleanup materials where they will be readily accessible.
 - g. Avoid mobile fueling of mobile construction equipment around the site; transport the equipment to designated fueling areas.
6. Construction equipment and Vehicles – Washing
- a. Use off-site commercial washing businesses as much as possible.
 - b. Washing vehicles and equipment outdoors or in areas where wash water flows onto paved surfaces or into drainage pathways can pollute storm water. If you wash a large number of vehicles or pieces of equipment, conduct this work at an off-site commercial facility.
 - c. Do not permit steam cleaning on-site. Steam cleaning can generate significant pollutant concentrations.
7. Construction Equipment and Vehicles – Storage
- a. Locate vehicle and equipment storage, cleaning, and maintenance areas in designated, confined areas. These areas should be located away from significant drainage courses.
 - b. Direct any concentrated storm water run-on/runoff around storage and service areas. Minimize contact of storm water and run-on/runoff with stored equipment by raising equipment on pallets or other similar devices.

8. Toxic Materials: Through proper material use, waste disposal, and training of employees, the discharge of toxic pollutants can be prevented. Such methods include the following:
- a. Dispose of all wastes in accordance with Federal, State, and local regulations.
 - b. Use the entire product before disposing of the container.
 - c. Do not remove the container's original product label prior to disposal. It contains important safety and disposal information.
 - d. Do not clean out brushes or paint containers on dirt or into streets, gutters, storm drains, or streams. "Paint out" brushes as much as possible. Rinse water-based paints to the sanitary sewer. Filter and reuse thinners and solvents. Dispose of excess oil-based paints and sludge as hazardous waste.
 - e. Select and site designated hazardous waste storage areas.
 - f. Store hazardous materials and wastes in covered containers and protect from vandalism. Place hazardous material and waste containers in secondary containment.
 - g. Do not mix wastes. Mixing can cause chemical reactions, make recycling impossible, and complicate disposal.
 - h. Recycle any useful material such as oil or water-based paint. Provide a summary of available recycling and disposal services.
 - i. Make sure that toxic liquid wastes and chemicals are not disposed of in dumpsters designated for construction debris.
 - j. Arrange for regular waste collection before containers overflow.
 - k. Make sure that hazardous waste is collected, removed, and disposed of only at authorized disposal areas.

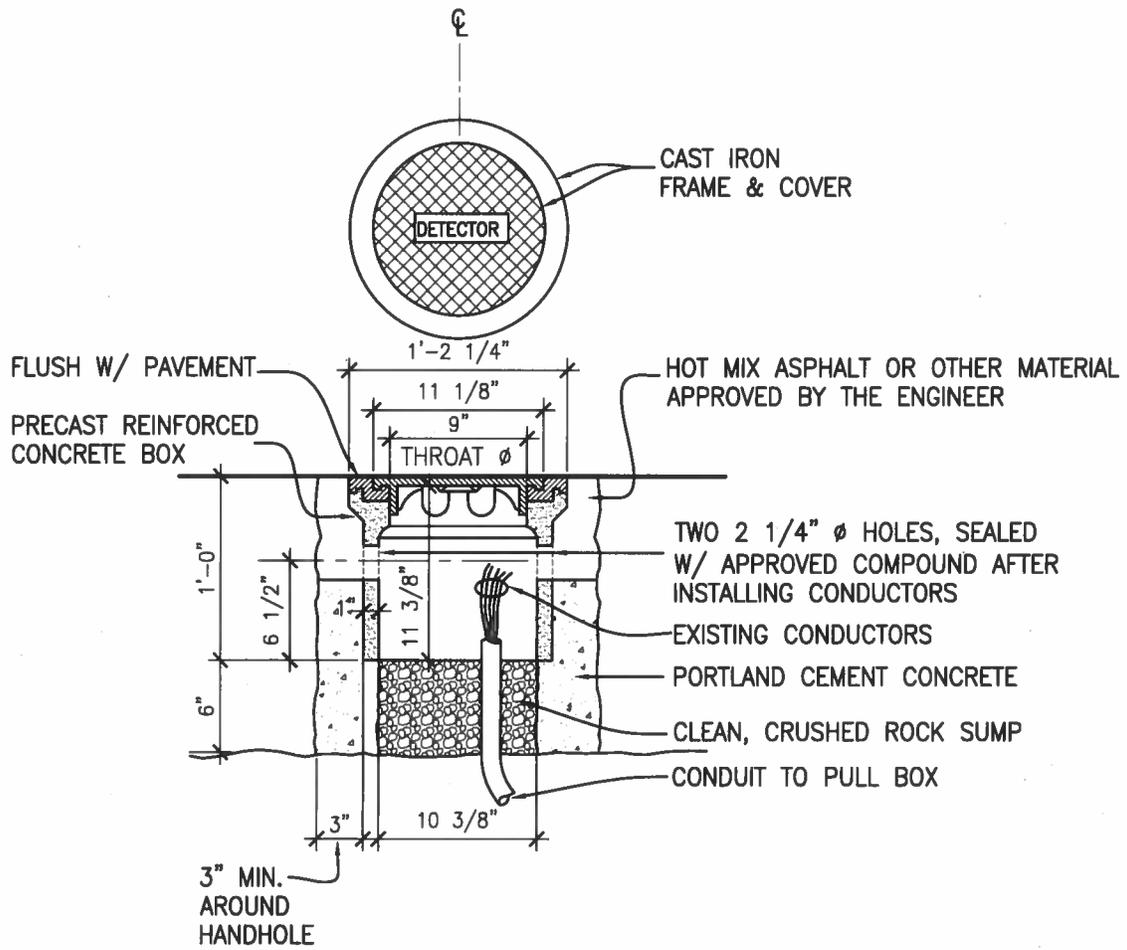
APPENDIX B
PROJECT PLANS



KEY NOTES:

- ① EXISTING CROSSWALK PAVMENT FLASHERS. CONTRACTOR TO DIG UP EXISTING CONDUIT & CUT OFF. AFTER COMPLETION OF ROAD REPAIRS RE-INSTALL W/ HANDHOLE @ EACH SIDE OF STREET.
- ② SAWCUT EXISTING A/C
- ③ GRIND EXISTING A/C
- ④ ADJUST EXISTING MANHOLE TO GRADE
- ⑤ ADJUST EXISTING WW TO GRADE
- ⑥ REPLACE EXISTING DIRECTIONAL ARROW
- ⑦ INSTALL 12" YELLOW LINE
- ⑧ REMOVE EXISTING A/C. COMPACT EXISTING BASEROCK. REPAVE W/ NEW A/C.
- ⑨ REPLACE DETAIL 23 STRIPE
- ⑩ REPLACE DETAIL 23 STRIPE W/ WHITE MARKERS

NORTH
 PROPOSED PLAN
 Scale: 1" = 10'-0"



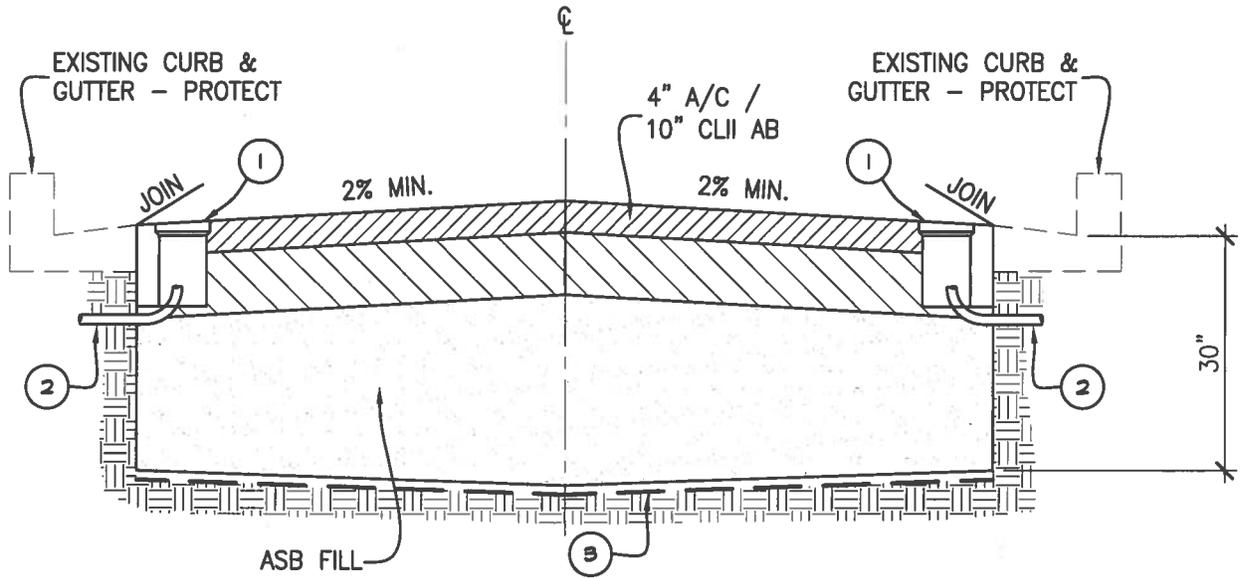
DETECTOR HANDHOLE DETAIL

Scale: 1" = 1'-0"



NOTES:

- ① DETECTOR HANDHOLE PER CALTRANS STD. ES-5D
- ② INTERRUPT EXISTING PVC CONDUIT & CONDUCTORS. ROUTE NEW CONDUIT INTO HANDHOLES.
- ③ MIRAFI GEOGRID



TYPICAL SECTION

Not to Scale



BODEGA AVENUE/HIGH STREET INTERSECTION IMPROVEMENTS

CONTRACT NO. 2016-16

ENGINEER'S ESTIMATE

January 3, 2017

ITEM NO.	DESCRIPTION	ESTIMATED QUANTITY	UNIT	UNIT PRICE	BID ITEM TOTAL
1	Traffic Control	1	LS	\$12,000.00	\$12,000.00
2	Water Pollution and Erosion Control	1	LS	7,300.00	7,300.00
3	Construction Area Signs	1	LS	5,000.00	5,000.00
4	Mobilization, Bonds and Insurance	1	LS	10,900.00	10,900.00
5	Remove Existing Asphalt Pavement	3,480	SF	10.00	34,800.00
6	Roadway Excavation	330	CY	85.00	28,050.00
7	Biaxial Geogrid Type 2	3,480	SF	30.00	104,400.00
8	Class 1 Aggregate Subbase	31	TONS	75.00	2,325.00
8	Class 2 Aggregate Base	20	TONS	85.00	1,700.00
9	Asphalt Concrete Type A	9	TONS	150.00	1,350.00
10	Wedge Grind	81	SY	12.00	972.00
11	Adjust Sewer Manhole to Grade	1	EA	2,000.00	2,000.00
12	Adjust Water Valve Covers to Grade	2	EA	700.00	1,400.00
13	Detail 23 Striping	20	LF	8.00	160.00
14	12" White Crosswalk Striping	188	LF	8.00	1,504.00
15	Pavement Markings	82	SF	9.00	738.00
16	Install Electrical Handhole	2	EA	1,000.00	2,000.00
SUBTOTAL					\$216,599.00
CONTINGENCIES @ 10%					21,700.00
TOTAL					\$238,299.00