PAUL AMGULO, ÇPA, AUDITOR-ÇONTROL FISCAL PROCEDURES APPROVED

FORM APPROVED COUNTY COUNSEL

Consent

Per Exec. Ofc.:

 \boxtimes

Dep't Recomm.:

SUBMITTAL TO THE BOARD OF SUPERVISORS **COUNTY OF RIVERSIDE, STATE OF CALIFORNIA**

SUBMITTAL DATE:

FROM: Economic Development Agency

SUBJECT: 11th Street Jail Demolition - Total Project Budget

August 4, 2011

RECOMMENDED MOTION: That the Board of Supervisors:

- 1. Adopt the Mitigated Negative Declaration (MND) and the Mitigation Monitoring Reporting Program (MMRP) both attached hereto for EA FM08110004032 based on the findings incorporated therein;
- 2. Approve the plans and specifications for the 11th Street Jail Demolition Project and authorize the

oncur	Clerk of the Board to advertise for bids;											
ntal C	3. Approve th	ne total project budget	of \$864,2	22;								
Departmental Concur	(Continued)		_	Red his								
·)				Robert Field Assistant County	Executive Offic	er/EDA						
	FINANCIAL	Current F.Y. Total Cost: Current F.Y. Net County		\$ 864,222 \$ 0	In Current Year Budget Adjustm	_	Yes No					
i C	DATA	Annual Net County Cost:		\$ O	For Fiscal Year:		2011/12					
5	COMPANION ITEM ON BOARD OF DIRECTORS AGENDA: No											
	SOURCE OF FUI	NDS: Tobacco Securit	tization F	unds		Positions Deleted Pe						
						Requires 4/	5 Vote					
	C.E.O. RECOMM	ENDATION:	APPRO	VE ////	6. 6							
Policy			BY:	aubille	la C							
	County Executiv	e Office Signature	/ Jen	nifer/L. Sarger u								
\boxtimes				V								

Prev. Agn. Ref.: 3.50 of 4/26/11; 3.27 of 4/20/10

District: 2

Agenda Nuffi

Form 11 (Rev 06/2003)

EDA-001a-F11-Departmental Concurre

ATTACHMENTS FILED WITH THE CLERK OF THE BOARD

(Rev 08/2010)

Economic Development Agency
11th Street Jail Demolition – Total Project Budget
August 4, 2011
Page 2

RECOMMENDED MOTION (Cont.)

- 4. Re-appropriate Tobacco Securitization Funds, in the amount of \$864,222, from the HUB Jail project to demolition of the 11th Street Jail; and
- 5. Upon completion of the bid process, authorize the Assistant County Executive Officer/EDA to submit the contract for award of the bid to the lowest responsive and responsible bidder to the Chairman of the Board, and authorize the Chairman to execute the agreement on behalf of the board; provided that, if any of the following occur, the award will be submitted to the Board for action: there is a bid protest, the lowest bid exceeds the estimated construction budget, the low bidder is disqualified, two or bids are the same and are the lowest, or a bidder requests relief from its bid due to an error; and
- 6. Delegate project management authority for the project to the Assistant County Executive Officer/EDA in accordance with Board policies.

BACKGROUND:

As the lead agency, the County of Riverside, Economic Development Agency (EDA), prepared an initial study for the proposed project.

In accordance with the California Environmental Quality Act (CEQA) (Public Resources Code Section 21000-21177) and California Code of Regulations Section 15063, the initial study was analyzed for the proposed project to determine if any potential significant impacts upon the environment would result from construction and implementation of the project.

The results of the analysis demonstrate that the project would not have any significant impacts on the environment with the implementation of the mitigation measures contained in the initial study. The Initial Study/Mitigated Negative Declaration (IS/MND) public comment period ended on Tuesday, August 2, 2011.

A seismic evaluation report of the 30,000 square foot jail structure found this facility to be a health and safety hazard subject to water intrusion, structural cracking, and deteriorated electrical, plumbing and mechanical systems.

The jail structure is not considered to be a historic resource, but it is adjacent to the Historic County Courthouse. They are two separate structures connected with utility conduits and walkways. Any utilities such as electrical, mechanical, phone and data connection between the jail building and the courthouse will be disconnected and rerouted to ensure the courthouse remains open and operational during the demolition.

The connecting architectural/structural elements between the jail and courthouse will be removed without damage to the existing courthouse. Repairs to the existing courthouse floors, facades and parapet will be completed with regard to the historical significance of the courthouse building. All repairs will match exactly to the existing architectural details of the building.

Demolition of the structure is projected to commence in September 2011. All demolition activity will be performed at night and on weekends in order to minimize disturbance to pedestrians, traffic and neighborhood businesses.

(Continued)

Economic Development Agency 11th Street Jail Demolition – Total Project Budget August 4, 2011 Page 3

BACKGROUND: (Continued)

On April 20, 2010, the Board of Supervisors approved an architectural and engineering services agreement between the County of Riverside and Miller Architectural Corporation for the 11th Street Jail Demolition project.

The bid documents are now complete and EDA requests approval to solicit bids for construction of this project. In order to keep the project moving forward and meet project schedule commitments, staff recommends the Board of Supervisors authorize the Assistant County Executive Officer/EDA to determine award of the project in accordance with Board Policy B-11, and authorize the Chairman of the Board to execute the agreement on behalf of the Board of Supervisors, provided that the lowest bid falls within the allotted project budget amount for construction.

PROJECT BUDGET:

The approximate allocation of the project budget is as follows:

Design	72,307
Specialty Inspection and Testing	33,640
Construction	625,408
Project Management	54,301
Project Contingency	78,566
TOTAL	\$ 864,222

All costs associated with this project will be fully funded by Tobacco Securitization Funds, thus, no net county costs will be incurred.

SPECIFICATIONS AND CONTRACT DOCUMENTS FOR

Riverside Old Jail Demolition FM08110004032



PREPARED BY
COUNTY OF RIVERSIDE
ECONOMIC DEVELOPMENT AGENCY
PROJECT MANAGEMENT OFFICE
JULY 2011

FORM APPROVED COUNTY COUNSEL.

BY: WARSHAL, VICTOR DATE

TABLE OF CONTENTS

Notice Inviting Bids	1
Instructions to Bidders	2
Contractor's Proposal	4
Bid Bond	1
Agreement Form	1
Payment Bond	1
Performance Bond	1
Contractor's Certificate Regarding Workers' Compensation	1
General Conditions	44
Specifications (Set)	1

NOTICE INVITING BIDS

COUNTY OF RIVERSIDE, herein called Owner, invites sealed proposals for :

RIVERSIDE COUNTY OLD JAIL DEMOLITION

This Project includes the demolition of all components of the old jail, protection of adjacent building, walks, streets and infrastructure, back filling the basement level, leaving the site level with adjacent walks and finished with 4" of decomposed granite.

Proposals shall be delivered to the Clerk of the Board of Supervisors, on the 1st floor of the County Administrative Center located at 4080 Lemon Street, Riverside, CA 92501 no later than **time** am on **month day** 2011 and will be promptly opened in public at said address.

Each Proposal shall be in accordance with the Plans, Specifications, and other Contract Documents and prepared by the Economic Development Agency, County of Riverside. A nonrefundable fee will be charged for each set of Plans and Specifications furnished to Contractors. Plans and Specifications may be obtained from Mission Reprographics, 2050E. La Cadena Drive Suite L Riverside, CA 92507, 951-686-8828.

Pursuant to the Labor Code, the Governing Board of the Owner has obtained from the Director of the Department of Industrial Relations, State of California, his determination of general prevailing rates of per diem wages applicable to the work, and for holiday and overtime work, including employer payments for health and welfare, pension, vacation, and similar purposes, as set forth on the schedule which is on file at the principal office of the Owner, and which will be made available to any interested person upon request.

The Contract General Conditions for this project will contain provisions allowing successful contractor to substitute securities for monies withheld by the County to ensure performance (Public Contract Code 22300).

A Performance Bond and Payment Bond shall be required for this Project.

i ne Contractor will be required, per Public Contracts Code, Section 3300 a	ina tor this	contract,	to nav	e a Si	ate
of California contractor's license classification B – General Building Contrac	ctor or C-2	1 Demolit	ion Co	ntrac	tor.
A mandatory pre-bid job walk inspection will be held on		2011 at		a.	m.,
meeting,	California	a. <u>No</u>	bids	will	be
accepted from bidders who have not attended the pre-bid job walk.					

For further information, contact Nahid Selbe at the Economic Development Agency, located at 3133 Mission Inn Avenue, Riverside, CA 92507-4199 whose telephone number is (951) 955-4728.

INSTRUCTIONS TO BIDDERS

- A. <u>FORM OF PROPOSAL:</u> The Proposal must be made on the attached Contractor's Proposal Form which must be filled out completely, dated and signed by the bidder or duly authorized agent in accordance with the directions on the Proposal Form. Each Proposal shall include a complete list of the Subcontractors proposed for every portion of the work, in accordance with Public Contract Code, Section 4100-4114, inclusive.
- B. <u>SUBMISSION OF THE PROPOSAL:</u> Signed copies of each Proposal shall be sealed in an envelope labeled with Title of Bid and Opening Time. Proposals shall be submitted at the place designated in the Notice Inviting Bids at or before the time specified in said notice. Before that time a proposal may be withdrawn, but only in person by the bidder or someone authorized by him in writing, and not by telephone or telegram.
- C. <u>DRAWINGS AND SPECIFICATIONS:</u> All drawings, herein enclosed, become a part of the Bid Documents. Additional sets may be provided if requested by bidders and deemed necessary and if there is sufficient time, for a non-refundable fee. Plans and Specifications may be obtained from Mission Reprographics, located at 2050 E.La Cadena Dr. Suite L, Riverside, 951-686-882, Attn: Mario Silva. All fees are due at the time of request and must be paid by check or money order made payable to "Mission Reprographics".
- D. <u>INTERPRETATION OF THE DOCUMENTS:</u> Discrepancies in and omissions from the Plans, Specifications or other Contract Documents or questions as to their meaning shall, at once, be brought to the attention of the Owner. Any interpretation of the Documents will be made only by Addenda duly issued and a copy of such Addenda will be mailed or delivered to each person or firm receiving a set of such documents. The Owner will not be responsible for any other explanations or interpretations. Should anything in the scope of the work or any of the sections of the Specifications be of such nature as to be apt to cause disputes between the various trades involved, such information shall be promptly called to the attention of the Owner.
- E. <u>ADDENDA TO THE DOCUMENTS:</u> The Owner reserves the right to issue such Addenda to the documents as it may desire at any time prior to the time fixed for receiving Proposals. A copy of all such Addenda will be promptly mailed or delivered to each bidder. The number and date of each Addenda shall be listed on the Contractor's Proposal in the space provided.
- F. OWNER'S RESERVATION OF RIGHTS: The Owner reserves the right to reject any or all Proposals and to waive any informalities in a bid or in the bidding. No bidder may withdraw his bid for a period of sixty (60) days after the time set for the opening thereof.
- G. <u>BIDDER'S CHECK OR BOND</u>: Each Proposal must be accompanied by a certified or cashier's check or by a bid bond on the form supplied by the Owner, drawn in favor of the Owner in an amount not less than ten percent (10%) of the total Proposal. This check or bond shall be given as a guarantee that the bidder, if awarded the contract, will execute and deliver the Contract Documents and the required Payment and Performance Bonds and proof of insurance in accordance with his Proposal accepted by the Owner. In default of execution of the Contract upon award and/or delivery of said Payment and Performance Bonds, such Proposal bond or check shall be held subject to payment to the Owner of the difference in money between the amount of the bidder's Proposal and the amount for which the Owner may legally contract with another party to perform the said work, together with the costs to the Owner of redrafting, redrawing and publishing documents and papers shall, in addition, be held subject to all other actual damages suffered by the Owner, as set forth on the Contract Documents. Said check or bond will be returned upon the close of the period mentioned in Paragraph F above, and to the successful bidder upon execution of the Contract Documents.

 NO BONDS WILL BE ACCEPTED UNLESS SUBMITTED ON THE FORM SUPPLIED BY OWNER.
- H. <u>AWARD OF CONTRACT:</u> The Contract shall be awarded upon a Resolution or Minute Order to that effect duly adopted by the Governing Board of the Owner. Execution of the Contract Documents shall constitute a written memorial thereof.

- I. <u>ADDITIONAL INFORMATION:</u> The Owner reserves the right to require of a bidder, information regarding financial responsibility or such other information as the Owner determines is necessary to ascertain whether a bid is in fact the lowest responsible bid submitted, All references to an Architect shall be deemed to refer to the Owner where no Architect has been employed by the Owner.
- J. PROMPT ACTION BY THE CONTRACTOR: After the award of the Contract by the Governing Board and within four (4) days after the Agreement Forms are presented to the Contractor for signing, he shall return to the Owner the signed Agreements, along with all necessary Bonds and insurance.
- K. <u>PRE-BID CONFERENCE:</u> There will be a mandatory pre-bid conference for this project that will be held at the site. No bids will be accepted from bidders who have not attended the pre-bid conference.
- L. <u>BIDS:</u> Under the bidding items listed on the Contractor's Proposal, bidders shall state prices for each basis for bid given hereinafter.
 - 1. Base Bid shall be the entire work complete in accordance with the contract documents, but not including work indicated or specified to be provided under any of the other bid items.
 - 2. Please note that a separate cost quotation for Contractor's Course of Construction insurance is required per General Conditions Section 2.3.6.

The basis for award will be the qualified bidder with the lowest total of the Base Bid with Course of Construction Insurance and all alternates. Alternates may be awarded in any order after determination of the lowest responsible and responsive bidder.

CONTRACTOR'S PROPOSAL

Date:

TO THE GOVERNING BOARD OF THE COUNTY OF RIVERSIDE:

			
Bidder:			
Inviting Bids, the Instruction of the Rivers apparatus, facilities, tra	ng carefully examined the proposetions to Bidders, the Agreement I side Old Jail hereby proposes a insportation, labor and materials ecifications, including all work specifications.	Form, the Bond Forms, the only agrees to furnish all to necessary to complete the	General Conditions for the ols, equipment, services, work in strict conformity
	Addendum No.	Date	_
	Addendum No.	_ Date	_
	Addendum No.	_ Date	_
For the total Base Bid including all applicable	taxes, permits, licenses, AND <u>C</u>	dollars (\$ ourse of Construction In), surance.
	ate # 1: Contractor to provide en stamped by a registered Califor		
Alternate 1	\$		dollars.
Description of Alterna	ate # 2: Deductive price to exclu	de salvage described on th	ne plans.
Alternate 2	\$	Written	dollars.
And, Cost of Contractor's Co and deductible \$	ourse of Construction Insurance .	do	llars (\$)

Bids must be submitted on all items. Failure to bid on all items may result in the bid being rejected as non-responsive. The basis for award will be the qualified bidder with the lowest total of the Base Bid WITH COURSE OF CONSTRUCTION INSURANCE and all alternates. Alternates may be awarded in any order after determination of the lowest responsible and responsive bidder.

DESIGNATION OF SUBCONTRACTORS

In compliance with Section 4104 of the Public Contract Code the undersigned submits the following complete list of each Subcontractor who will perform work or labor or render service in or about the construction/installation in an amount in excess of 1/2 of 1% of said total bid.

PORTION OF THE WORK	SUBCONTRACTOR	LOCATION	
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DESIGNATION OF SUBCONTRACTORS (continued)

In compliance with Section 4104 of the Public Contract Code the undersigned submits the following complete list of each Subcontractor who will perform work or labor or render service in or about the construction/installation in an amount in excess of 1/2 of 1% of said total bid.

PORTION OF THE WORK	SUBCONTRACTOR	LOCATION	
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AWARD OF CONTRACT

The undersigned fully understands that a Contract is formed upon the acceptance of this Proposal by the Owner and the undersigned further agrees that upon request he will promptly execute and deliver to Owner a written memorial of the Contract together with the required Payment and Performance Bonds and proof of insurance.

BID GUARANTEE

The enclosed certified or cashier's check or bidder's bond on approved form, made payable to the Owner in the amount of ten percent of the total bid submitted herewith, is hereby given as a guarantee that the bidder will execute and deliver the above mentioned written memorial and required bonds and insurance if awarded the contract, and in the event that the undersigned fails or refuses to execute and deliver said documents, such check or bond is to be charged with the costs of the damages experienced by the Owner as a result of such failure or refusal, including but not limited to publication costs, the difference in money between the amount of the bid of the said principal and the amount for which obligee may legally contract with another party to perform the said work if such amount be in excess of the former, building lease or rental costs, transportation costs and additional salary costs that result from the delay due to the principal's default on the awarded contract. In no event, however, shall the Surety's liability exceed the penal sum hereof.

Name of Bidder:		_
Type of Organization:		_
Signed By:		
Title of Signer:		Affix Seal
Address of Bidder:		If
		Corporation
		 -
Telephone No.:		_
Contractor's License No.:		_
Classification:	Expiration Date:	

LICENSURE STATEMENTS ARE MADE UNDER PENALTY OF PERJURY

If bidder is a corporation, and signer is <u>not</u> President or Secretary, attach a certified copy of By-Laws or resolution authorizing execution. If bidder is a corporation, affix corporate seal. If signer is an agent, attach Power of Attorney. If bidder is not an individual, list names of other persons authorized to bind the organization.

NONCOLLUSION AFFIDAVIT TO BE EXECUTED BY BIDDER AND SUBMITTED WITH BID

State of California) ss. County of Riverside)		
	, being firs	st duly sworn, deposes and says:
That he or she is the party making the foregoing bid; that the bid is	of	
person, partnership, company, association, org collusive or sham; that the bidder has not directly false or sham bid, and has not directly or indirectly anyone else to put in a sham bid, or that anyone manner, directly or indirectly, sought by agreemed price of the bidder or any other bidder, or to fix are of any other bidder, or to secure any advantage interested in the proposed contract; that all state bidder has not, directly or indirectly, submitted his thereof, or divulged information or data relative to partnership, company association, organization effectuate a collusive or sham bid.	anization, or corporation; to y or indirectly induced or solid by colluded, conspired, connive e shall refrain from bidding; ent, communication, or confe by overhead, profit, or cost ele e against the public body average and the bid sor her bid price or any breathereto, or paid, and will not p	hat the bid is genuine and not cited any other bidder to put in a yed, or agreed with any bidder or that the bidder has not in any grence with anyone to fix the bid ement of the bid price, or of that warding the contract of anyone are true; and, further, that the akdown thereof, or the contents bay, any fee to any corporation,
	Signature	
Subscribed and sworn to before me this	day of	, 2011.
	Signature of officer add	ministering oath

Bid Bond

KNOWN TO	ALL ME	N BY TH				undersigned		, as	Suret	, are
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and truly to b successors a			eby jointly an	ıd sev	erally bind o	ourselves, our l	neirs, e	executors, ad	ministra	ators,
WHEREAS,	the	said	Principal	is	herewith	submitting	its	Proposal	for	the
									·	
the Contract of execute a writer faithful Performent that the Prince costs of the expublication conformed which the excess of the from the delay liability excees. The Surety, for shall be in no bid; and said	upon sai tten mer mance I ipal fails damage ost, the o obligee former; y due to d the pe or value way imp Surety o	d Proposition of Prop	sal and shall, the awarded d proof of instefuses to execute enced by the in money be ally contract lease or rentable in bereof. If, hereby stip affected by a eby waive no	within Contrurance ecute a countrurance with a al cost on the culates any exitice or	the required act and subre, then this of and deliver ser as a resunction the amount in other party ts, transports awarded Control and agrees tension of the fany such e	that if the aford number of day mit the required obligation shall laid documents alt of such refut to fithe bid of the to perform the ation cost, and contract. In no extension.	ys after Labor be null this Bo said, independent he said waddition event he tions on ich the	the notice of and Material I and void; and will be cha cluding but north if such a nal salary costowever, shall as Surety e Owner may	such averaged with a such a su	ward, at and event th the ed to, nount be in result rety's bond such
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(Busi	ness Ad	ldress)			······································			Aff	ix Seal If	
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(Corp	oration	Name -	Surety)		· · · · · · · · · · · · · · · · · · ·					
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AGREEMENT FORM

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	RATION, FILI												 	
	resident of Co ecretary of Co	•										'	Corpo	ration
	is organized	under the	e laws		of									
Owner:	COUNTY O	F RIVERS	SIDE											
Signature: Title:	Chairman -	Board of S	Superv	/isors										
Attest: By: Title:	Clerk - Boar	•		s										

PAYMENT BOND

(Public Work - Civil Code Section 3247 et seq.)

The makers of this Bond are								as	Princi	pal and	d Ori	ginal (Contrac	tor an	d
				a corporation					•					-	
and th	nis Bond is			ion with that						t dated	t				_,
2011	between	Principal	and	County dollars (\$					•		_		owner AMOU		
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												·			
of this	Bond are a ents to exte	s is set fort	h in Se ne for	s is stated in ctions 3248, performanc	3249	9, 3250	and 3	252	of said	Code.	. Wi	thout	notice,	Sure	ty
Signe	d and Seale	ed this		Da	y of			2	011.						
	(Firm Na	me - Princip	pal)												
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	ATTORN	IEY-IN-FAC	Т												
	(Title-Atta	ach Power o	of Attori	ney)											

PERFORMANCE BOND

The	makers of this Bond, _			_, as Principal, and
		as Surety, are h	neld and firmly bound u	nto County of Riverside,
hereir	nafter called the Owner, in the	e sum of		Oollars (\$)
	e payment of which sum			, our heirs, executors,
	nistrators, and successors, jo			
	•	,	•	
The o	condition of this obligation is	such, that whereas the Pr	incipal entered into a	certain contract, hereto
	ned, with the Owner, dated			
		,,,		
Now 1	herefore, if the Principal sha	ill well and truly perform an	d fulfill all the undertal	kings covenants, terms
	tions and agreements of sai	•		=
	of that may be granted by the			
			-	•
	intee required under the Con			
	nants, terms, conditions, and		•	
	nay thereafter be made, the			
	out notice, Surety consents to	· · · · · · · · · · · · · · · · · · ·	formance, change in r	equirements, change in
comp	ensation or prepayment und	er said Contract.		
٥.			0044	
Signe	d and Sealed this	Day of	, 2011.	
	(Firm Name - Principal)			
				Affix Seal
	(Business Address)			if
				Corporation
Ву:				
	(Signature - Attach Notary	r's Acknowledgment)		
	(Title)			
	(Corporation Name - Sure	atry)		
	(oorporation value care	47		
				Affix
	(Business Address)			Corporate
	(Dusiness Address)			Seal
D				Jeal
Ву:	/Cionatura Attack Notes	de A elemente de la		
	(Signature - Attach Notar	y's Acknowledgment)		
	ATTORNEY			
	ATTORNEY-IN-FACT			
	(Title-Attach Power of Atta	rnev)		

CONTRACTOR'S CERTIFICATE REGARDING WORKERS' COMPENSATION

Labor Code Section 3700

Every employer, except the State and all political subdivisions or institutions thereof, shall secure the payment of compensation in one or more of the following ways:

- (a) By being insured against liability to pay compensation in one or more insurers duly authorized to write compensation insurance in this State.
- (b) By securing from the Director of Industrial Relations, a Certificate of Consent to Self-Insure, which may be given upon furnishing proof satisfactory to the Director of Industrial Relations of ability to self-insure and to pay any compensation that may become due to his employees

I am aware of the provisions of Section 3700 of the Labor Code which requires every employer to be insured against liability for Workers' Compensation or to undertake self-insurance in accordance with the provisions of that Code, and I will comply with such provisions before commencing the performance of this Contract.

 Principal
Principal
 Title

(In accordance with Article 5 [commencing at Section 1860], Chapter, Part 7, Division 2 of the Labor Code, the above Certificate must be signed and filed with the Owner prior to performing any work under this Contract.)

GENERAL CONDITIONS TABLE OF CONTENTS

ARTICLE 1	GENERAL PROVISIONS	1 -
	1.1 - Definitions	
	1.2 - Authorities and Limitations	
	1.3 - Legal Requirements	
	1.4 - Standard References	4 -
	1.5 - Permits, Licenses, Fees & Taxes	
	1.6 - Separate Contracts	
	1.7 - County's Authorized Representative, Inspector(s)	
	& Architect	5 -
ARTICLE 2	BONDS & INSURANCE	6 -
	2.1 - Bids of \$25,000 or Less	6 -
	2.2 - Performance and Payment Bonds	6 -
	2.3 - Insurance	6 -
	2.4 - Indemnification	9-
ARTICLE 3	SITE CONDITIONS	9-
	3.1 - Differing Site Conditions	
	3.2 - Site Investigation and Conditions Affecting the Work	
	3.3 - Dimensions and Measurements	10 -
ARTICLE 4	SPECIFICATIONS AND DRAWINGS	10 -
	4.1 - General Provisions	
	4.2 - Summary of the Order of Precedence	
	4.3 - Clarifications/Request for Information and Additional Instructions	12 -
ARTICLE 5	SHOP DRAWINGS AND SUBMITTALS	
	5.1 - Shop Drawings, Product Data, Coordination Drawings and Schedules	
	5.2 - Samples	
	5.3 - Substitutions	15 -
ARTICLE 6	SCHEDULES	
	6.1 - Construction Schedule	15 -
ARTICLE 7	TIME, LIQUIDATED DAMAGES AND EXTENSIONS	16 -
	7.1 - Time of Work	
	7.2 - Liquidated Damages	
	7.3 - Unavoidable Delays	16 -
	7.4 - Request for Time Extension	17 -
ARTICLE 8	PERFORMANCE	
	8.1 - Supervision & Construction Procedures	
	8.2 - Supervision	
	8.3 - Conduct of Work	
	8.4 - Protection of Work & Property	
	8.5 - Contractor's Responsibility For Work	
	8.6 - Utilities	
	8.7 - Working Hours	20 -

	8.8 - Material & Workmanship	20 -
	8.9 - Layout of Work	
	8.10 - Use of Premises	
	8.11 - Operations & Storage	
	8.12 - Heat/Power/Light	
	8.13 - Cleaning Up	
ARTICLE 9	SAFETY & HEALTH	22 -
	9.1 - Accident Prevention	22 -
	9.2 - Sanitary Facilities	22 -
	9.3 - Responsibility for Compliance With Cal- OSHA	22 -
	9.4 - Toxic and Hazardous Materials and Waste	23 -
ARTICLE 10	COUNTY-FURNISHED PROPERTY	
	10.1 - County-Furnished Property	23 -
ARTICLE 11	BENEFICIAL OCCUPANCY	24 -
	11.1 - Beneficial Occupancy	24 -
ARTICLE 12	INSPECTION AND TESTING	
	12.1 - Inspection and Testing	
	12.2 - Inspection by Other Jurisdictions	
	12.3 - Final Inspection and Tests	26 -
ARTICLE 13	ACCEPTANCE	
	13.1 - Acceptance of the Work	26 -
ARTICLE 14	WARRANTY AND GUARANTEES	
	14.1 - Contractor's Warranty and Guarantee	26 -
ARTICLE 15	ENVIRONMENTAL PROTECTION	
	15.1 - Dust Control	
	15.2 - Excessive Noise	
	15.3 - Pollution Control, Cleaning	28 -
ARTICLE 16	EMPLOYMENT PRACTICES	
	16.1 - Qualifications for Employment and Apprenticeship Standards	
	16.2 - Wages & Records	
	16.3 - Notice of Labor Disputes	
	16.4 - Nondiscrimination	30 -
ARTICLE 17	SUBCONTRACTING.	
	17.1 - Subcontractors	
	17.2 - Relations of Contractor and Subcontractor	
ARTICLE 18	TAXES	_ 27 =
ARTICLE 10	18.1 - Sales and Payroll Taxes	32 -
ARTICLE 19	<u>CHANGES</u>	_ 32 _
	10.1 - Change Order Work	_ 32 _

	19.2 - Change Orders and Labor Rates Guidelines	35 -
	19.3 – Audit	36 -
ARTICLE 20	PAYMENT	37 -
	20.1 - Payment	
	20.2 - Final Payment	- 38 -
ARTICLE 21	SUSPENSION OF WORK, TERMINATION	39 -
	21.1 - Non-Compliance With Contract Requirements	39 -
	21.2 - Termination	- 40 -
ARTICLE 22	DISPUTES/CLAIMS	43 -
	22.1 - Claims	43 -
	22.2 - Claim Format/Requirements	
	22.3 - Notice of Third Party Claims	

GENERAL CONDITIONS OF THE CONTRACT

ARTICLE 1 GENERAL PROVISIONS

1.1 **DEFINITIONS**

THE CONTRACT DOCUMENTS - The Contract Documents consist of the Contract, the Performance Bond and Payment Bond and any other bond required by the Contract, the drawings, the specifications, addenda issued prior to execution of the Contract, and all modifications thereto.

THE CONTRACT - The Contract Documents form the Contract. The Contract represents the entire and integrated agreement between the parties hereto, and supersedes all prior negotiation, representations, or agreements, either written or oral, including the bidding documents.

ACT OF GOD - An Act of God is an earthquake of magnitude 4.5 or greater on the Richter scale, flood, tornado, or other cataclysmic phenomenon of nature, or rain, snowstorm, windstorm, high water, or other natural phenomenon in excess of the normal as established by National Oceanic and Atmospheric Administration weather data.

ACCEPTANCE - Acceptance is when the County determines all of the Contract requirements have been completed. Execution of the Notice of Completion will signify acceptance. A copy of the Notice of Completion will be sent to the Contractor after execution by the County. Upon receipt of the Notice of Completion, the Contractor will be relieved of the duty of protecting the work, and the County will initiate final settlement and payment.

ARCHITECT - The use of the term Architect shall mean the individual, partnership, corporation, association or joint venture contracted by the County for the design of this Work, as designated on the title sheet of these specifications and Contract Documents.

BENEFICIAL OCCUPANCY - The right of the County to occupy all or any portion of the project prior to final Acceptance of the Work. Such occupancy does not constitute acceptance or completion by the Contractor of the Work or any portion thereof, nor will it relieve the Contractor of the responsibility for correcting defective work or materials found at any time before Acceptance of the Work.

COUNTY - The term County when used herein shall mean the Board of Supervisors of the County of Riverside, a political subdivision of the State of California.

CHANGE ORDER - A Change Order is the document issued by the County authorizing any change or adjustment to the Contract Documents in accordance with Article 19 of this Contract.

CONTRACT DRAWINGS - "Contract drawings" or "drawings" means and includes (a) all drawings which have been prepared on behalf of the County and are included in the Contract Documents and all clarification drawings issued by notice to the bidders thereto; (b) all drawings submitted pursuant to the terms of the Contract by the Contractor to the County during the progress of the Work, which are accepted by the County.

CONTRACTOR'S AGENT - The representative of the Contractor, approved by the County, who shall be present at the Work and be authorized to receive and act upon instructions from the County and to execute and direct the Work on behalf of the Contractor.

CONTRACTOR - When used herein, Contractor means the prime or principal Contractor licensed to perform work in the State of California, including all joint ventures. References to subcontractor or others are only for convenience and all such references shall be considered to refer to the Contractor. The prime or principal Contractor shall be responsible for all subcontractors, and all subcontractors shall require their subcontractors to comply with the relevant provisions of the prime or principal contract.

CRITICAL PATH METHOD(CPM) - "Critical Path Method" is a schedule technique.

DAY - The use of "day" herein means calendar day and shall include every day including Saturdays, Sundays, and legal holidays.

DIRECTOR - The use of "Director" shall mean the Assistant County Executive Officer/EDA of the County or his designated representative.

INSTALL - When used herein, "install" shall mean the complete installation, in place, of any item, equipment or material.

MATERIAL - Material shall be construed to include machinery, equipment, manufactured articles, or construction such as form work, fasteners, etc., and any other classes of material to be furnished in connection with the Contract. All materials shall be new.

NOTICE OF COMPLETION - The Notice of Completion ("NOC") shall be issued at that point in the Contract when the Contractor has completed all Work required in the Contract Documents. The time for issuance shall be determined by the County through a final inspection. The NOC shall be issued by the Board of Supervisors.

NOTICE TO PROCEED - The Notice to Proceed is the written notification from the County giving the Contractor notice to commence with the Work. The Notice to Proceed will specify the start date for the Work and the completion date.

REQUEST FOR INFORMATION - (RFI) The form and procedure established for communication between the Contractor and the County to clarify or interpret the Contract Documents.

REQUEST FOR QUOTATION - (RFQ) A document consisting of supplemental details, instruction, or information issued by the Architect, through the County, for the purpose of obtaining price quotations for possible changes in the Work.

SHALL - When used herein, "shall" means anything, which is mandatory to be performed by the Contractor.

SPECIFICATIONS - The term "Specifications" means that portion of the Contract Documents consisting of the written requirements for materials, equipment, construction systems, standards and workmanship for the Work.

SUBCONTRACTOR - The term "Subcontractor" means a person or firm that has a contract with Contractor or with another subcontractor to perform a portion of the Work. Unless otherwise specifically provided, the term Subcontractor includes Subcontractors of any tier, suppliers, manufacturers, and distributors. The term Subcontractor is referred to throughout the Contract Documents as if singular in number.

WORK - The term "Work" comprises the services and materials required by the Contract Documents, as may be amended, and includes all labor necessary to produce the construction required by the Contract Documents, and all materials and equipment incorporated or to be incorporated in such construction.

1.2 AUTHORITIES AND LIMITATIONS

- 1.2.1 The Board of Supervisors alone have the power to bind the County and to exercise the rights, responsibilities, authorities, and functions vested therein by the Contract Documents, except that they shall have the right to designate authorized representatives to act for them.
- 1.2.2 Neither the Contract, nor any part thereof, nor moneys due or to become due there under may be assigned by the Contractor without the prior written approval of the County, with the exception of the assignments to County which may be required under the terms of this Contract.

1.3 LEGAL REQUIREMENTS

- 1.3.1 Contractor shall keep informed of, and comply with, all federal, state and county laws, ordinances, rules, and regulations applicable to the Work or to those engaged or employed in the Work of this Contract, especially (but not limited to) those laws relating to hours of employment, prevailing wages, payment of wages, sanitary and safety conditions for workers, workers' compensation insurance, type and kind of materials that can be used, non-discrimination in employment and affirmative action programs. Failure to identify a specific provision in these Contract Documents shall not excuse the Contractor from complying with such applicable statutory requirements.
- 1.3.2 If conflict arises between provisions of the Contract Documents and any such laws, rules, or regulations, the Contractor shall notify the County at once in writing. If, before receiving clarification, Contractor performs any portion of the Work affected by such apparent conflict, such performance shall be at Contractor's own risk. Contractor shall not be entitled to any additional compensation or time by reason of the conflict or its later correction.
- 1.3.3 All work and materials shall be in full accordance with the latest applicable (or otherwise noted) codes, rules, and regulations including, but not limited to, the following:

.Uniform Building Code

.Uniform Plumbing Code

.Uniform Mechanical Code

.Uniform Fire Code

State Fire Marshal

.State Industrial Accident Commission's Safety Orders

Rules of Local Utilities

- 1.3.4 Nothing in the specifications is to be construed to permit work not conforming to the above, and expense incurred complying with the above shall be borne by the Contractor. Whenever the specifications and working details require higher standards than those required by the ordinances, codes and statutes, the specifications and working details shall take priority over the ordinances, codes and statutes.
- 1.3.5 In submitting a bid on this public works projects, or any subcontractor agreeing to supply goods, services, or materials, and entering a contract pursuant thereto, the contractor and\or subcontractor do offer and agree to assign the County 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. Section 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 acknowledgement by the parties.

1.4 STANDARD REFERENCES

- 1.4.1 All documents and publications (such as, but not limited to, manuals, handbooks, codes, standards, and specifications) which are cited in this Contract for the purpose of establishing technical (non-administrative) requirements applicable to equipment, materials, or workmanship under this Contract, shall be deemed to be incorporated herein as though fully set forth.
- 1.4.2 Whenever reference is made to any particular document or publication, the Contractor shall comply with the requirements set out in the edition specified in this Contract, or if not specified, the latest edition or revision thereof, in effect on the date of the solicitation of bid on this project, except as modified by, as otherwise provided in, or as limited to type, class, or grade, in the specifications of this Contract.

1.5 PERMITS, LICENSES, FEES & TAXES

1.5.1 COUNTYS RESPONSIBILITIES

- a. The County will apply for all plan checks and will apply for and obtain the Building Permit(s), the Grading Permit and Construction Permits required by the County of Riverside, paying all fees in connection therewith.
- b. The County will furnish, at no expense to the Contractor, all on-site inspection of the Work and will arrange and pay for off-site inspection only as noted in the Contract Documents.

1.5.2 CONTRACTOR'S RESPONSIBILITIES

- a. The Contractor shall obtain and pay for all other permits and licenses required for the Work, including excavation permit and for plumbing, mechanical and electrical work and for operations in or over public streets or right of way under jurisdiction of public agencies other than the County.
- b. Exclusive of off-site inspection specified herein to be the County's responsibility, the Contractor shall arrange and pay for all off-site inspection of the Work, including certification, required by the specifications, drawings, or by governing authorities.
- c. Before Acceptance of the project by the County, the Contractor shall submit all licenses, permits, and certificates of inspection to the County.

1.6 SEPARATE CONTRACTS

1.6.1 The County reserves the right to perform work related to this project with its own forces, and to award separate contracts in connection with other portions of the project or other work on the site. The Contractor shall cooperate with others in the prosecution of all work and shall not interfere with material, appliances or workmen of the County or any other contractor engaged by the County at the site of the Work. In case of disagreement regarding such use, the matter shall be referred to the County whose decision relative to said use shall govern.

- 1.6.2 The Contractor shall afford the County and separate contractors reasonable opportunity for the introduction and storage of their materials and equipment and the execution of their work, and shall properly connect and coordinate Contractor's Work with theirs.
- 1.6.3 If any part of the Contractor's Work depends for proper execution or results upon the work of the County or any separate contractor, the Contractor shall inspect and promptly report to the County any discrepancies or defects in such other work that render it unsuitable for such proper execution and results. Failure of the Contractor to so inspect and report shall constitute an acceptance of the County's or the separate contractor's work as fit and proper to receive the Work, except as to defects which may develop in the other separate contractor's work after the execution of the Contractor's Work.
- 1.6.4 Should the Contractor cause damage to the work or property of any separate contractor on the Project, the Contractor shall, upon due notice, settle with such other contractor by agreement, if both will so settle. If such separate contractor sues the County because of any damage alleged to have been so sustained, the Contractor agrees to indemnify and defend the County in such proceedings with the County retaining the right to select and hire independent counsel for the County paid by the Contractor.
- 1.6.5 Any cost caused by defective or ill-timed work shall be borne by the party responsible therefore.

1.7 COUNTY'S AUTHORIZED REPRESENTATIVE, INSPECTOR(S), & ARCHITECT

1.7.1 AUTHORIZED REPRESENTATIVE

The County shall designate a representative during the Work, who shall have the right to be present at the job site during construction and shall supervise any additional representatives appointed by the County.

1.7.2 INSPECTOR(S)

The Inspector(s) shall have the right to observe the installation of all materials and equipment to be incorporated into the Work and the placing of such material and equipment to determine in general if the Work is proceeding in accordance with the Contract Documents. The Inspector(s) is not authorized to make changes in the Contract Documents. On the basis of his observations, he shall keep the County informed as to the progress of the Work. The Inspector shall not be responsible for means, methods, techniques, sequences, or procedures of construction nor for safety precautions and programs in connection with the Work. Nor will the inspector be responsible for the Contractor's failure to carry out the Work in accordance with the Contract Documents.

1.7.3 ARCHITECT

- a. The County has retained an Architect for this project. The Architect will advise and consult with the County, and the County will issue instructions to the Contractor. The Architect will be requested to interpret the requirements of the Contract. When requested by the County, the Architect will, within a reasonable time, render such interpretations as he may deem necessary for the proper execution of the Work.
- b. The Architect will make periodic visits to the job site to familiarize himself generally with the progress and quality of the Work and to determine in general whether the work is proceeding in accordance with the Contract Documents. Based on such observations he will recommend approval of applications for progress payments made by Contractor. The Architect shall not be responsible for means, methods, techniques, sequences, or procedures of construction nor for safety precautions and programs in connection with the Work. Nor

will the Architect be responsible for the Contractor's failure to carry out the Work in accordance with the Contract Documents.

ARTICLE 2 BONDS AND INSURANCE

2.1 BIDS OF \$25,000 OR LESS

2.1.1 If the total amount bid on the Work is \$25,000 or less, the payment bond and performance bond are not required, provided that one payment of all compensation shall be made following Acceptance of all work.

2.2 BONDS

2.2.1 GENERAL REQUIREMENTS

- a. Before commencing any Work under this Contract, the Contractor shall file four of each bond with the County. These bonds shall be in the amounts and for the purposes specified below. They shall be surety bonds issued by:
 - (1) Either a California Admitted Surety OR a current Treasury Listed Surety (Federal Register).

And

- (2) Either a current A.M. Best A VIII rated Surety OR an admitted surety insurer which complies with the provisions of the <u>Code of Civil Procedure</u>, § 995.660.
- b. Should any surety or sureties upon said bonds or any of them become insufficient, Contractor shall renew said bond or bonds with good and sufficient sureties within ten (10) calendar days after receiving notice from the County that the surety or sureties are insufficient. Cost of bonds shall be included in the bid price.

2.2.2 PERFORMANCE BOND

The successful bidder shall deliver to the County an executed Performance Bond on the attached form in an amount equal to 100% of the accepted bid as security for the faithful performance of the Contract.

2.2.3 PAYMENT BOND

The successful bidder shall deliver to the County an executed Payment Bond on the attached form in an amount equal to 100% of the accepted bid as security for the payment of all persons performing labor and furnishing materials in connection with the Work.

2.3 INSURANCE

2.3.1 GENERAL REQUIREMENTS

Before commencing this Work under the Contract, and without limiting or diminishing CONTRACTOR'S obligation to indemnify and hold the COUNTY harmless, the Contractor shall procure and maintain, or cause to be maintained at its sole cost and expense, the following insurance coverages during the term of this Contract.

2.3.2 WORKERS' COMPENSATION INSURANCE

Contractor shall secure Workers' Compensation Insurance (Coverage A) as prescribed by the laws of the State of California. Policy shall include Employers' Liability (Coverage B) including Occupational Disease with limits not less than \$1,000,000 per person per accident. Policy shall be endorsed, if applicable, to provide a Borrowed Servant/Alternate Employer Endorsement, and contain a Waiver of Subrogation in favor of the County of Riverside Pursuant to Section 3700 of the Labor Code of the State of California, Contractor shall file with the County before commencing the Work the following signed certification:

"I am aware of the provisions of Section 3700 of the Labor Code, which requires every employer to be insured against liability for workers' compensation or to undertake self-insurance in accordance with the provisions of that Code, and I shall comply with such provisions before commencing the performance of the Work of this Contract."

2.3.3 COMMERCIAL GENERAL LIABILITY:

Commercial General Liability insurance coverage, including but not limited to, premises liability, contractual liability, products/completed operations if applicable, personal and advertising injury – which may arise from or out of CONTRACTOR'S operations, use, and management of the premises, or the performance of its obligations hereunder. Policy shall name the County of Riverside—it's Director's, Officers, special Districts, Board of Supervisors, employees, agents or representatives as Additional Insured, and contain a Waiver of Subrogation in favor of the County of Riverside. Policy limits shall not be less than \$1,000,000 per occurrence combined single limits. If such insurance contains a general aggregate limit, it shall apply separately to this agreement or be no less than two (2) times the occurrence limit. Policy shall also contain coverage for \$5,000 Medical Payments coverage per accident, per person, and Fire Legal Liability in an amount not less than \$50,000.

2.3.4 VEHICLE LIABILITY:

If CONTRACTOR'S vehicles or licensed mobile equipment are used on County property, or used in any manner on behalf of the County, CONTRACTOR shall maintain auto liability insurance for all owned, non-owned and hired automobiles in an amount not less than \$1,000,000 per occurrence combined single limit, \$2,000,000 in the aggregate. Policy shall name the County of Riverside, its Director's Officers, Special Districts, Board of Supervisors, employees, agents, or representatives as Additional Insured, and provide a Waiver of Subrogation in favor of the County of Riverside.

2.3.5 PROPERTY (PHYSICAL DAMAGE):

All-Risk property insurance coverage for the full replacement value of all CONTRACTOR'S equipment, improvements/alterations, temporary structures, and systems (Care, Custody, and Control of CONTRACTOR) used on COUNTY property, or used in any way connected with the accomplishment of the Work performed in this contract.

2.3.6 COURSE OF CONSTRUCTION INSURANCE

CONTRACTOR shall provide All Risk Builder's Risk (Course of Construction) insurance, including earthquake and flood if in an earthquake or flood zone (required on financed or bond financing arrangements), covering the COUNTY, the CONTRACTOR and every subcontractor of every tier for the entire project including property to be used in the construction of the project while such property is at off site storage locations or while in transit. Policy shall include coverage for collapse, faulty workmanship, debris removal, expediting expense, Fire Department Service charges, valuable papers and records, trees, grass, shrubbery and

plants. If scaffolding, falsework and temporary buildings are insured separately by the CONTRACTOR or others, evidence of such separate coverage shall be provided to COUNTY prior to the start of the work. Policy shall be written on a completed value form. Policy shall also provide coverage for temporary structures (onsite offices, etc.), fixtures, machinery and equipment being installed as part of the construction project. (The Base Bid including course of construction insurance shall be used for determination of lowest bid, unless otherwise stated in the bid form.)

CONTRACTOR shall provide a bid price with Course of Construction insurance as outlined herein, and shall also separately provide the cost of the Course of Construction insurance and deductible; and shall declare all terms, conditions, coverages and limits upon request of COUNTY. COUNTY RETAINS THE RIGHT TO CHOOSE TO USE ITS OWN COURSE OF CONSTRUCTION PROGRAM. If the COUNTY program is chosen, CONTRACTOR shall assume the cost of any and all applicable policy deductibles (currently \$50,000 per occurrence), and shall insure its own machinery, equipment, tools, etc., from any loss of any nature whatever. If COUNTY elects the CONTRACTOR's All Risk Builder's Risk Program, CONTRACTOR shall be responsible for any and all policy deductibles.

2.3.7 GENERAL INSURANCE PROVISION – ALL LINES:

- a. Any insurance carrier providing insurance coverage hereunder shall be admitted to the State of California unless waived, in writing, by the County Risk Manager. Carrier(s) shall have an A.M. BEST rating of not less than an A:VIII. Insurance deductibles or self-insured retentions must be declared by the carrier(s), and such deductibles and retentions shall have the prior written consent from the County Risk Manager. At the election of the Risk Manager, carriers shall provide written notification, and shall either 1) reduce or eliminate such deductibles or self-insured retentions, or 2) procure a bond which guarantees payment of losses and related investigations, claims administration, and defense costs and expenses. If no written notice is received from the County Risk Manager within ten (10) days of the acceptance of agreement, then such deductibles or self-insured retentions shall be deemed acceptable.
- b. Cause its insurance carrier(s) to furnish the County of Riverside with either 1) a properly executed original Certificates(s) of Insurance and certified original copies of Endorsements effecting coverage as required herein, or 2) if requested to do so in writing by the County Risk Manager, provide original Certified copies of policies including all Endorsements and all attachments thereto, showing such insurance is in full force and effect. The County of Riverside, its Director's and Officers, Special Districts, Board of Supervisors, elected officials, employees, agents or representatives are named as Additional Insureds. Further, said Certificates(s) and policies of insurance shall contain the covenant of the insurance carrier(s) that shall provide no less than thirty (30) days written notice be given to the County of Riverside prior to any material modification or cancellation of such insurance. In the event of a material modification or cancellation of coverage, this Agreement shall terminate forthwith, unless the County of Riverside receives, prior to such effective date, another properly executed original Certificate of Insurance and original copies of endorsements or certified original policies, including all endorsements and attachments thereto evidencing coverages set forth herein and the insurance required herein is in fullforce and effect. CONTRACTOR shall not take possession, or use the Premises, or commence operations under this Agreement until the County of Riverside has been furnished original Certificate(s) of Insurance and certified original copies of Endorsements or policies of insurance including all Endorsements and any and all other attachments as required in this Section. The original Endorsements for each policy and the Certificate of Insurance shall be signed by an individual authorized by the insurance carrier to do so on its behalf.
- c. It is understood and agreed to by the parties hereto and the insurance company(s), that the

Certificate(s) of Insurance and policies shall so covenant and shall be construed as primary, and the COUNTY'S insurance and/or deductibles and/or self-insured retentions or self-insured programs shall not be construed as contributory.

The County of Riverside's Reserved Rights-Insurance. The County of Riverside reserves the right to adjust the monetary limits of insurance coverage's during the term of this agreement or any extension thereof-if in the County Risk Manager's reasonable judgment, the amount or type of insurance carried by the CONTRACTOR becomes inadequate.

d. CONTRACTOR shall pass down the insurance obligations contained herein to all tiers of subconsultants working under this Agreement.

2.4 INDEMNITY AND HOLD HARMLESS

- 2.4.1 CONTRACTOR agrees to and shall indemnify and hold the COUNTY-its officers, employees and agents free and harmless from any and all claims, actions, damages and liabilities of whatsoever kind and nature arising from death, personal injury, property damage or other cause asserted or, based upon any negligent act or omission of CONTRACTOR, its employees, agents, invitees, or any subcontractor of CONTRACTOR relating to or in any way connected with the accomplishment of the work or performance of services under this Agreement, regardless of the existence or degree of fault or negligence on the part of the COUNTY or any officer or employee of said COUNTY, other than the sole active negligence or willful misconduct of COUNTY-its Directors and Officers, Special Districts, Board of Supervisors, elected officials, employees, agents or representatives. As part hereto of the foregoing indemnity CONTRACTOR agrees to protect and defend at its own expense, including attorneys' fees the COUNTY-its Directors and Officers, Specials Districts, Board of Supervisors, elected officials, employees, agents or representatives from any and all legal action based upon any acts or omissions, as stated hereinabove, by any person or persons.
- 2.4.2 If any such claim, action, or proceeding is brought against County or County's officers, agents, employees, or independent contractors, Contractor, upon notice from County, shall defend the same at Contractor's expense by counsel satisfactory to County.
- 2.4.3 County shall promptly notify Contractor of any claim, action, or proceeding against County or County's officers, agents employees, independent contractors, and consultants relating to the performance, or omission to perform, any term or condition of this Contract. County shall cooperate fully in the defense of such claim, action, or proceeding.
- 2.4.4 County shall not be liable or responsible for any accident, loss or damage occurring to the Work prior to the completion and Acceptance of same, unless otherwise specifically agreed to at the time of occupancy by the County.

ARTICLE 3 SITE CONDITIONS

3.1 DIFFERING SITE CONDITIONS

- 3.1.1 The Contractor shall have reviewed and ascertained pertinent local conditions such as location, accessibility, and general character of the site and satisfy himself as to the conditions under which the Work is to be performed. No claim for allowances shall be made because of Contractor's error or negligence in acquainting himself with the conditions at the site.
- 3.1.2 The Contractor shall carefully study and compare the Contract Documents with each other and with information furnished by County. The Contractor shall promptly report in writing to County any errors,

inconsistencies, or omissions in the Contract Documents or inconsistencies with applicable code requirements observed by Contractor.

- 3.1.3 If Contractor performs any construction activity which it knows or should know involves an error, inconsistency, or omission without notifying and obtaining the written consent of County, Contractor shall be responsible for the resultant losses, including, without limitation, the costs of correcting defective work.
- 3.1.4 The County will furnish surveys necessary to properly locate the property and establish the boundaries thereof with general reference points as well as to enable the Contractor to proceed with the Work.
- 3.1.5 The Contractor shall provide competent engineering services to lay out the Work and all parts thereof and to establish all grades and elevations in accordance with the Contract requirements. He shall verify the figures shown on the survey and approach drawings before undertaking any construction work and shall be responsible for the accuracy of the finished work.
- 3.1.6 The Contractor shall protect and preserve established bench marks and monuments and shall make no changes in locations without the written approval of the County. Any bench marks or monuments that are lost or destroyed shall be replaced by the Contractor subsequent to notification and approval from County.

3.2 SITE INVESTIGATION AND CONDITIONS AFFECTING THE WORK

3.2.1 The Contractor acknowledges by submission of his/her bid that he has satisfied himself as to the character, quality, and quantity of surface and subsurface materials or obstacles to be encountered insofar as this information is reasonably ascertainable from an inspection of the site, including any exploratory work deemed necessary by the Contractor. Any failure of the Contractor to take the actions described and acknowledged in this paragraph will not relieve the Contractor from responsibility for estimating the difficulty and cost of successfully performing the Work, or for proceeding to successfully perform the Work without additional expense to the County.

3.3 DIMENSIONS AND MEASUREMENTS

3.3.1 All dimensions shown for existing conditions and all dimensions required for work that is to connect with work now in place, shall be verified and calculated by the Contractor by actual measurement of the existing work. Any discrepancies between the Contract Documents and the existing conditions shall be referred to the authorized representative of the County before any work affected thereby has been performed. Failure to notify the County before starting work will be considered acceptance by the Contractor. Where doubts as to dimensions exist, County shall determine the correct dimensions.

ARTICLE 4 SPECIFICATIONS AND DRAWINGS

4.1 GENERAL PROVISIONS

4.1.1 SUBDIVISIONS

For convenience, the specifications are arranged into several sections, but such separation shall not be considered as the limits of the work required of any separate trade. The terms and conditions of such limitations are wholly between the Contractor and his subcontractors. Requirements contained in any section are required as if contained in all sections and are the responsibility of the Contractor. The Contractor, prior to awarding subcontracts, will assure the Work required as a whole has been coordinated among the subcontracts.

4.1.2 RECORD DOCUMENTS

- a. The Contractor shall keep on the Work site a copy of the awarded construction documents (drawings and specifications) and shall at all times give the County and Architect access thereto.
- b. The Contractor will be given one set of drawings and specifications which shall be kept at the site of the Work at all times and updated weekly. Payment may be withheld if drawings are not kept current. Exact locations of all pipes and conduits and all changes in construction and details shall be indicated and dimensions provided upon these drawings, and all changes in materials and equipment installed shall be indicated in these specifications. Upon completion and prior to Acceptance of the Work, a final reproducible (transparencies) set of project record documents and specifications shall be submitted to the County by the Contractor. County will furnish a set of reproducibles.
- c. The working details will indicate dimensions, position, and kind of construction, and the specifications, qualities, and methods. Any Work indicated on the working details and not mentioned in the specifications, or vice versa, shall be furnished as though fully set forth in both. Work not particularly detailed, marked, or specified shall be the same as similar work that is detailed, marked, or specified.
- d. In case of discrepancy in the documents, the matter shall be promptly submitted to the County, who shall make a determination in writing. Any adjustment by the Contractor without such a determination shall be at its own risk and expense. The County shall furnish from time to time such detailed information as considered necessary to clarify the Work.
- e. Where the word "similar" occurs on the drawings, it shall have a general meaning and not be interpreted as meaning identical, and all details shall be worked out in relation to their location and their connection with other parts of the work.
- f. Standard details or specification drawings are applicable when listed, bound with specifications, noted on the drawings or referenced elsewhere in the specifications. Where the notes on the drawings indicate modifications, such modifications shall govern.
- g. All drawings, specifications and copies thereof furnished to the Contractor are the property of the County and shall not be used on other work without its consent. Upon completion of this project, all copies of the drawings and specifications shall be returned to the County.

4.2 SUMMARY OF THE ORDER OF THE PROCEDURE

- 4.2.1 In case of conflicts between the Contract Documents, the order of precedence shall be as follows:
 - 1) Modifications or changes last in time are first in precedence.
 - 2) Addenda.
 - 3) County-Contractor agreement.
 - General Conditions except for specific modifications thereto stated in the Supplementary Conditions.
 - 5) Supplementary Conditions.
 - 6) Division One Specifications.
 - 7) Division Two through Sixteen Specifications.
 - 8) Drawings as between figured dimensions given on drawings and the scaled measurements, the figured dimension shall govern; as between large-scale drawings and small-scale drawings, the larger scale shall govern.

- 9) Structural drawings
- 10) Architectural drawings.
- As between detailed drawings and typical details bound within the specifications, the detailed drawings govern.
- 12) In the event provisions of codes, safety orders, contract documents, referenced manufacturer's specifications or industry standards are in conflict, the more restrictive and higher quality shall govern.
- 13) Schedules shown on the drawings take precedence over conflicting information given on other drawings.
- 14) Mechanical drawings.
- 15) Electrical drawings.

4.3 CLARIFICATIONS/REQUEST FOR INFORMATION AND ADDITIONAL INSTRUCTIONS

4.3.1 NOTIFICATION BY CONTRACTOR

- a. Should Contractor discover what he perceives to be conflicts, omissions, or errors in the Contract Documents, or have any question concerning interpretation or clarification of the Contract Documents, or if it appears that the work to be done or any matters relative thereto are not sufficiently detailed or explained in the Contract Documents, then, before proceeding with the work affected, Contractor shall notify County's authorized representative in writing, and request interpretation, clarification, or additional detailed information concerning the work. The Contractor shall ask for the clarification (Request for Information) immediately upon discovery but no less than 14 calendar days prior to the start date of the activities related to the clarification, based on the latest updated version of the accepted Progress Schedule. County, whose decision shall be final and conclusive, shall resolve such questions and issue instructions to Contractor. Should Contractor proceed with work affected before receipt of instructions from County, Contractor shall remove and replace or adjust work which is not in accordance with the instructions from County and shall be responsible for resultant damage, defect or added cost. In event of failure to agree as to scope of Contract requirements, Contractor shall follow the procedure set forth in the DISPUTES article.
- b. The Contractor shall not be entitled to any compensation for delays, disruptions, inefficiencies or additional administrative effort caused by the Contractor's untimely review of the Contract Documents for potential conflicts, omissions, discrepancies or ambiguities.
- c. County may charge back to the Contractor, time and expense associated with RFI's, as may be reasonably determined by the County to be unnecessary.

4.3.2 ADDITIONAL DETAILED INSTRUCTIONS

a. The County may furnish additional detailed written instructions on any Request for Information to further explain the Work. If in the opinion of Contractor, the additional detailed instructions constitute work in excess of the scope of the Contract, he must submit written notice thereof immediately to the County, but no later than seven (7) calendar days following receipt of such instruction(s), and in any event prior to commencement of work thereon. The Contractor shall not be entitled to additional compensation due to any additional instructions unless the Contractor shall have given the appropriate written notice. County will then consider such notice and, if in its judgment it is justified, the County instructions will be revised or extra work shall be authorized by Change Order. In the event of a dispute hereunder, attention is directed to the DISPUTES article.

ARTICLE 5 SHOP DRAWINGS AND SUBMITTALS

5.1 SHOP DRAWINGS, PRODUCT DATA, COORDINATION DRAWINGS AND SCHEDULES

- 5.1.1 Shop drawings are drawings submitted to the County by the Contractor showing detail of the proposed fabrication and assembly of structural elements and the installation (i.e., form, fir, and attachment details) of materials or equipment. It includes drawings, diagrams, layouts, schematics, descriptive literature, illustrations, schedules, fabrication, erection and setting drawings, manufacturers' scale drawings, wiring and control diagrams, cuts or entire catalogs, pamphlets, and performance and test data, and similar materials furnished by the Contractor to explain in detail specific portions of the Work required by the Contract. The County may duplicate, use, and disclose in any manner and for any purpose shop drawings delivered under this Contract.
- 5.1.2 The Contractor shall coordinate all shop drawings and review them for accuracy, completeness, and compliance with Contract requirements, and shall indicate its approval thereon as evidence of such coordination and review. Shop drawings submitted to the County without evidence of the Contractor's approval shall be returned for resubmission. The Architect will indicate review for compliance of the shop drawings, and if not in compliance as submitted, shall indicate the reasons therefore. Any work done before such review shall be at the Contractor's risk. Review by the Architect shall not relieve the Contractor from responsibility for any errors or omissions in such drawings, nor from responsibility for complying with the requirements of this Contract, except with respect to variations described and approved in accordance with paragraph 5.1.3.
- 5.1.3 If shop drawings show any variations from the Contract requirements, the Contractor shall describe such variations in writing, separate from the drawings, at the time of submission. If the Architect approves any such variation, no change in time or price will be allowed for Contractor changes. Should the Architect make changes on the shop drawings which affect time and/or cost, the Contractor will immediately notify the County with a Request for Information. If the Contractor fails to issue the Request for Information within seven (7) calendar days from receipt of the returned shop drawing, the Contractor shall have waived his right to any potential Change Order.
- 5.1.4 The Contractor shall submit shop drawings, coordination drawings, and schedules for review as required by the Contract Documents. The Contractor will provide a submittal schedule listing all shop drawings and submittals, the submission dates by the Contractor, and return dates from the Architect. This schedule will be provided fourteen (14) calendar days after the Notice to Proceed.
- 5.1.5 Shop drawings and schedules, other than catalogs, pamphlets, and similar printed material, shall be submitted with one reproducible plus one copy.
- **5.1.6** Each shop drawing or coordination drawing shall have a blank area 4 by 4 inches located adjacent to the title block. The title block shall display the following:
 - 1) Number and title of drawing
 - 2) Date of drawing or revision
 - 3) Name of project building or facility
 - 4) Name of Contractor and (if appropriate) name of subcontractor submitting drawings
 - 5) Clear identity of contents and location on the work
 - Project title and project number
 - 7) Submittal number
- 5.1.7 Unless otherwise provided in this Contract or otherwise directed by County, shop drawings, coordination drawings, and schedules shall be submitted to the Architect with a letter, sufficiently in advance of construction requirements to permit no less than twenty (21) calendar days for checking and appropriate action.

5.2 SAMPLES

- 5.2.1 After the award of the Contract, the Contractor shall deliver samples required by the specifications to the County for approval. The Contractor shall prepay any shipping charges. Any materials or equipment for which samples are required shall not be used in the Work until reviewed by County.
- **5.2.2** Each sample shall have a label indicating:
 - 1) Name of project building or facility, project title, and project number.
 - 2) Name of Contractor and, if appropriate, name of subcontractor.
 - 3) Identification of material or equipment with specification requirement.
 - 4) Place of origin.
 - 5) Name of manufacturer and brand (if any).
 - 6) Identify by specification section.
- 5.2.3 Samples of finished materials shall have additional markings that will identify them in reference to the finish schedules.
- 5.2.4 The Contractor shall mail a letter in triplicate under separate cover submitting each shipment of samples and containing the information required in paragraph 5.2.2. He shall enclose a copy of this letter with the shipment and send a copy to the County representative on the project. Approval of a sample shall be only for the characteristics or use `named in such review and shall not be construed to change or modify any Contract requirement. Substitutions will not be permitted unless they are approved under paragraph 5.3.
- 5.2.5 Approved samples not destroyed in testing will be sent to the County. Approved samples of hardware in good condition will be marked for identification and may be used in the Work. Materials and equipment incorporated in the Work shall match the approved samples. Other samples not destroyed in testing or not approved will be returned to the Contractor at his expense if so requested at time of submission.
- 5.2.6 Failure of any material to pass the specified tests will be sufficient cause for refusal to consider any further samples of the same brand or make of that material or equipment under this Contract.
- 5.2.7 Samples of various materials or equipment delivered on the site or in place, may be taken by the County for testing. Samples failing to meet Contract requirements will automatically void previous approvals of the items tested. The Contractor shall replace such materials or equipment found not to have met Contract requirements, or there shall be a proper adjustment of the Contract price as determined by the County.
- 5.2.8 Unless otherwise specified, when tests are required, only one test of each sample proposed for use will be made at the expense of the County. Samples which do not meet specification requirements will be rejected. Requests for testing of additional samples by Contractor may be made by the County at the expense of the Contractor.

5.3 SUBSTITUTIONS

5.3.1 Wherever the name, or brand, or manufacturer of an article is specified in the Contract Documents, it is used as a measure of quality and utility or a standard. Except in those instances where the product is designated to match others presently in use, specifications calling for a designated material, product, thing or service by specific brand or trade name shall be deemed to be followed by the words "or equal" so that bidders may propose any equal material, product, thing or service in their bid. If the Contractor desires to use any other brand or manufacturer of equal quality and utility to that specified, he shall list definite particulars of that which he considers equivalent to the specified item in his bid. The Contractor shall have thirty-five (35) days after the

- award of the Contract for submission of data substantiating substitution of "equal" items. The County will then determine whether or not the proposed name brand or article is equal in quality and utility to that specified in the Contract Documents, and its written decision shall be final.
- 5.3.2 No proposal will be considered unless accompanied by complete information and descriptive data necessary to determine the equality of the offered materials, articles, or equipment. Samples shall be provided when requested by the County.
- 5.3.3 The burden of proof as to the comparative quality or suitability of the offered materials, articles, or equipment shall be upon the Contractor. The County shall be the sole judge as to such matters. In the event that the County rejects the use of such alternative materials, articles, or equipment, then one of the particular products designated by brand name in the specifications shall be furnished.
- 5.3.4 The County will examine Contractor's submittals with reasonable promptness. Return of the submittals to the Contractor shall not relieve the Contractor from responsibility for deviations and alternatives from the Contract Documents nor shall it relieve him from responsibility for errors in the submittals. A failure by the Contractor to identify, in his letter of transmittal, material deviations from the Contract Documents shall void the submittal and any action taken thereon by the County. When specifically requested by the County, the Contractor shall resubmit such shop drawing(s), descriptive data, and samples as may be required.
- 5.3.5 If any mechanical, electrical, structural, or design revisions are required for the proper installation and fit of alternative materials, articles, or equipment, or because of deviations from the Contract Documents, such changes shall not be made without the consent of the County's authorized representative, and shall be made without additional cost to the County, such costs, including the fees of the Architect, to be borne by the Contractor.

ARTICLE 6 SCHEDULES

6.1 CONSTRUCTION SCHEDULE

- 6.1.1 The Contractor shall prepare and submit to the County a practicable schedule showing the order in which the Contractor proposes to perform the work, and the dates on which the Contractor contemplates starting and completing the salient features of the work (including acquiring materials and equipment). The schedule shall be in the form of a CPM (critical path method) schedule, of suitable scale to indicate appropriately the percentage of work scheduled for completion by any given date during the period. The scheduled completion date shall be the same as the contractual completion date, for the initial schedule and subsequent updates. Any proposed early completion date shall show the difference between that date and the contract completion date as Float, which shall belong to both the County and Contractor.
- 6.1.2 If, in the opinion of the County, the Contractor falls behind the approved schedule, the Contractor shall take steps necessary to improve its progress, without additional cost to the County. The Contractor shall submit any supplementary schedule or schedules in CPM form as the County deems necessary to demonstrate how the approved rate of progress will be regained.
- 6.1.3 All schedule updates must accurately reflect the as-built schedule. There shall be no change to the Critical Path without the County's written consent.

ARTICLE 7 TIME, LIQUIDATED DAMAGES AND EXTENSIONS

7.1 TIME OF WORK

The Contractor shall commence work on this project immediately upon receipt of the written Notice to Proceed and shall perform the work diligently to completion within the number of calendar days specified in the Contract. Neither site access nor physical work shall be commenced before the Contract is fully executed, and bonds, insurance and the schedule are submitted as required by the Contract Documents. No work shall be done on Saturday, Sunday and holidays and no work shall be performed outside of normal working hours without the prior written consent of the County, unless required by these Specifications. See: Working Hours.

7.2 LIQUIDATED DAMAGES

If the Work is not completed within the time required, damage will be sustained by the County. It is and will be impracticable and extremely difficult to ascertain and determine actual damage which County will sustain by reason of such delay; and it is therefore agreed that Contractor will pay to County the sum of \$1,000.00 per day for each and every day's delay in finishing the Work beyond the time prescribed. If the Contractor fails to pay such liquidated damages, the County may deduct the amount thereof from any money due or that may become due the Contractor under the Contract.

7.3 UNAVOIDABLE DELAYS

7.3.1 TIME EXTENSION

- a. The Contractor will be granted an extension of time for completion of the Work beyond that named in the Contract Documents, for delays which may result through causes beyond the control of the Contractor and which he could not have avoided by the exercise of care, prudence, foresight and diligence. The appropriate extension of time shall constitute full compensation. Costs associated with extended overhead will not be considered.
- b. If the Contractor is allowed extensions of time in which to complete the Work equal to the sum of all unavoidable delays, plus any adjustments of contract time due to contract change orders, during such extension of time liquidated damages shall not be charged to the Contractor.
- c. Unavoidable delays within the meaning of this section shall be those caused by Acts of God or of the public enemy, fire, epidemics, or strike. There will be no liquidated damages for delays as described within this paragraph.
- d. Delays in the performance of parts of the work which may in themselves be unavoidable, but do not necessarily prevent or delay the performance of critical activity(s) while the activity(s) is on the Critical Path, will not be considered as unavoidable delays within the meaning of the contract and shall not be the basis of a claim for delay.

7.3.2 WEATHER

Inclement weather shall not be a prima facie reason for granting a time extension. The Contractor shall make every effort to continue work under prevailing conditions. However, if the inclement weather prevents the Contractor from beginning at the usual starting time, or prevents the Contractor from proceeding with seventy-five percent (75%) of the normal labor and equipment force towards completion of the day's current Critical Path activities (shown on the most current, and accepted schedule update) for a period of at least five (5) hours, and the crew is dismissed as a result thereof, the County will designate such time as unavoidable delay and grant a one (1) calendar day, non-compensable, time extension.

7.3.3 NOTICE OF DELAYS

- a. Whenever the Contractor foresees any delay in the performance of a Critical Path work activity, and in any event immediately upon the occurrence of any delay which he regards as an unavoidable delay, the Contractor shall notify the County in writing of such delay and its cause, in order that the County may take immediate steps to prevent, if possible, the occurrence or continuance of the delay, and may determine whether the delay is to be considered avoidable or unavoidable, how long it continues, and to what extent the prosecution and completion of the work are to be delayed thereby.
- b. After the completion of any part or the whole of the Work, the County, in calculating the amount due the Contractor, will assume that any and all delays which have occurred have been avoidable delays, except such delays as shall have been called to the attention of the County at the time of their occurrence and found by the County to have been unavoidable as substantiated by a change order. The Contractor shall make no claims that any delay not called to the attention of the County at the time of its occurrence has been an unavoidable delay.

7.4 REQUEST FOR TIME EXTENSION

- 7.4.1 In the event the Contractor requests an extension of contract time for unavoidable delay, justification shall be submitted no later than seven (7) calendar days after the initial occurrence of any such delay. When requesting time for proposed change orders, the request(s) must be submitted with the proposed change order with full justification. If the Contractor fails to submit justification he shall waive his right to a time extension at a later date. Justification must be based on the currently accepted contract schedule as updated at the time of occurrence of delay or execution of work related to any change(s) in the scope of work. The justification must include a schedule, including, but not limited to, the following information:
 - a. The duration to perform the activity relating to the change(s) in the work and the resources (manpower, equipment, material, etc.) required to perform these activities within the stated duration.
 - b. Logical activity ties to the contract schedule for the proposed changes and/or delay showing the activity/activities in the schedule whose start or completion dates are affected by the change and/or delay.
- 7.4.2 The County, after receipt of such justification and supporting evidence, shall make its finding of fact. The County's decision shall be final and conclusive and the County will advise the Contractor in writing of such decision. If the County finds that the Contractor is entitled to any extension of Contract time, the County's determination as to the total number of days of extension shall be based upon the latest updated version of the approved contract schedule.
- 7.4.3 In the event the Contractor disagrees with the County's decision, the Contractor shall be required to submit a claim pursuant to the DISPUTE article.

ARTICLE 8 PERFORMANCE

8.1 SUPERVISION & CONSTRUCTION PROCEDURES

8.1.1 The Contractor shall supervise and direct the work. The Contractor shall be solely responsible for all

construction means, methods, techniques, sequences, procedures, project safety, and shall coordinate all portions of the Work under the Contract, including the relations of the various trades to the progress of the Work, in accordance with the provisions of the Contract Documents.

- 8.1.2 The Contractor shall be responsible to the County for the acts and omissions of the Contractor's employees, subcontractors, and their agents and employees, and any other persons performing any of the work under a contract with the Contractor.
- 8.1.3 The Contractor is an independent contractor and nothing in the Contract Documents shall be interpreted to make the Contractor an agent of the County.

8.2 SUPERVISION

- 8.2.1 Within seven (7) days after the Notice to Proceed, the Contractor shall provide to the County an organization chart outlining key job personnel. The Contractor will also provide a Letter of Authority or Corporate Resolution for the individual(s) authorized to sign documents on its behalf, i.e., payment requests, change orders, inspection reports, etc.
- 8.2.2 The Contractor shall employ, during the progress of the Work, a competent Project Superintendent and any necessary assistants, as approved by the County. The Project Superintendent shall not be changed except with the consent of the Authorized Representative of County, unless the Superintendent proves to be unsatisfactory to the Contractor or ceases to be in his employ. The County shall be notified immediately of any new Superintendent appointed to the Work and the Contractor shall submit qualifications for approval. The Superintendent shall represent the Contractor and all directions given to him shall be as binding as if given to the Contractor.
- 8.2.3 The County shall be supplied at all times with the name and telephone number of a person in charge of or responsible for the Work, who can be reached for emergency work twenty-four (24) hours a day, seven (7) days a week.

8.3 CONDUCT OF WORK

8.3.1 In connecting one kind of work with another, marring or damaging same will not be permitted and, in the event such occurs, shall be corrected by the Contractor at its cost prior to acceptance by the County. Should improper work of any trade be covered by another which results in damage or defects, the whole work affected shall be made good by the Contractor without expense to County.

8.4 PROTECTION OF WORK & PROPERTY

- 8.4.1 The Contractor shall continuously maintain adequate protection of the Work from damage and shall protect the County's property from injury or loss in connection with this Contract. He shall make good any such damage, injury, or loss, except what may be directly due to errors in the Contract Documents or caused by agents or employees of the County. He shall adequately protect adjacent property as provided by law and the Contract Documents.
- 8.4.2 The Contractor shall preserve and protect all structures, equipment, and vegetation (such as trees, shrubs, and grass) on or adjacent to the Work site which are not to be removed and which do not unreasonably interfere with the work required under this Contract.
- 8.4.3 The Contractor shall protect from damage all existing improvements and utilities at or near the Work site and on adjacent property of a third party, the locations of which are made known to or should be known by the

Contractor. The Contractor shall repair any damage to those facilities, including those that are the property of a third party, resulting from failure to comply with the requirements of this Contract or failure to exercise reasonable care in performing the Work. If the Contractor fails to repair the damage promptly, the County may have the necessary work performed and charge the cost to the Contractor.

8.5 CONTRACTOR'S RESPONSIBILITY FOR WORK

- 8.5.1 Until Acceptance of the Work by the County, Contractor shall have the charge and care thereof and shall bear risk of injury or damage to any part of the Work by action of the elements. If a separate Contractor sues the Owner, on account of any loss so sustained, the County shall notify the Contractor, who shall indemnify and hold harmless the County against any expenses, or judgment arising therefrom.
- 8.5.2 Contractor, at its cost, shall rebuild, repair, restore and make good all damages from the elements to any portion of the Work occasioned by such causes before its Acceptance.
- **8.5.3** No advertising of any description will be permitted in or about the Work, except by order of the County.
- 8.5.4 Contractor shall not create or permit the continued existence of any nuisance in or about the Work.

8.6 UTILITIES

- 8.6.1 Unless otherwise provided for under separate sections herein, Contractor will arrange all water, gas, and electricity required for construction purposes until acceptance of the Work. Contractor shall pay for such services unless otherwise specifically noted.
- **8.6.2** Utilities shall not be interrupted except with the approval of the County. A two (2) work day written notice is required prior to any and all interruptions. Interruptions shall be scheduled so as to minimize duration and disruption to existing operations.
- **8.6.3** a. The Contractor shall send notices, make all necessary arrangements, and perform all other services required in the care and maintenance of all public utilities.
 - b. Enclosing or boxing in, for protection of any public utility equipment, shall be done by the Contractor. Upon completion of the Work, the Contractor shall remove all enclosures, and leave in a finished condition.
 - c. All connections to public utilities shall be made and maintained in a manner so as not to interfere with the continuing use of same by the County during the entire progress of the Work.

8.7 WORKING HOURS

- 8.7.1 All work shall be performed on a calendar day basis during the customary working hours of the trades involved unless otherwise specified in this Contract. Work performed by the Contractor of his own volition outside such established working hours shall be at no additional expense to the County and without County approval.
- 8.7.2 It is expressly stipulated that no laborer, workman, or mechanic employed at any time by the Contractor or by any subcontractor(s) under this Contract upon the Work or any part thereof, shall be required or permitted to work thereon more than eight (8) hours during any one calendar day and forty (40) hours during any one calendar week, except, as provided by Section 1815 of the California Labor Code. It is further expressly stipulated that for each and every violation of Sections 1811-1815, inclusive, of the California Labor Code, all

the provisions of which are deemed to be incorporated herein, said contractor shall forfeit, as a penalty to County, twenty-five dollars (\$25.00) for each laborer, workman, or mechanic employed in the execution of this Contract by contractor for each calendar day during which said laborer, workman, or mechanic is required or permitted to work more than eight hours in any one calendar day and forty hours in any one calendar week in violation of the provisions of said Sections of the Labor Code.

- 8.7.3 The Contractor, and each subcontractor, shall keep an accurate record showing the names of and actual hours worked each calendar day and each calendar week by all laborers, workmen, and mechanics employed by them in connection with the Work contemplated by this Contract, which record shall be open at all reasonable hours to the inspection of the County or its officers or agents and to the Division of Labor Standards Enforcement of the Department of Industrial Relations.
- 8.7.4 No construction work shall be done on Saturdays, Sundays or County holidays and no work shall be performed outside of normal working hours without the prior written consent of the County. In any event, all work shall be subject to approval of the County. Prior to start of such work, the Contractor shall arrange with the County for the continuous or periodic inspection of the Work and testing of materials, when necessary. If requests are made by the Contractor for permission to work overtime, nights, Saturdays, Sundays or County holidays, and such requests are granted, the Contractor shall bear all extra expense to the County for inspection and other incidental expenses caused by such overtime work. If contractors are requested, in the interest of the County, to work overtime by the County, or if overtime work is specifically required by these specifications, all extra expense of inspection will be paid by the County.

8.8 MATERIAL & EQUIPMENT

- 8.8.1 Materials, equipment, and articles incorporated into the Work shall be new and of equal quality to the types and grades specified. When not particularly specified, the Contractor shall submit for approval satisfactory evidence as to the kind and quality of material. See SUBSTITUTION provision 5.3 concerning "or equal" requirements and procedure for submitting alternative material, articles, or equipment.
- 8.8.2 All materials shall be delivered so as to insure a speedy and uninterrupted progress of the Work. All materials shall be stored so as to cause no obstruction and so as to prevent overloading of any portion of the structure on the Work site, and the Contractor shall be entirely responsible for damage or loss by weather, theft, vandalism, or other cause.
- 8.8.3 Materials shall be stored to assure the preservation of their quality and fitness for the Work. Stored materials shall be reasonably accessible for inspection. When considered necessary by the County, stored materials shall be placed on wooden platforms or on other hard, clean surfaces and not directly on the ground, and shall be placed under cover when so directed.

8.9 LAYOUT OF WORK

8.9.1 The Contractor shall lay out its work from established base lines and bench marks indicated on the drawings, and shall be responsible for all measurements in connection with the layout. The Contractor shall furnish, at its own expense, all stakes, templates, platforms, equipment, tools, material, and labor required to lay out any part of the Work. The Contractor shall be responsible for executing the Work to the lines and grades that may be established or indicated in the Contract Documents. The Contractor shall also be responsible for maintaining and preserving all stakes and other marks established by the County until authorized to remove them. If such marks are destroyed by the Contractor before their removal is authorized, the County may replace them and deduct the expense of the replacement from any amounts due or to become due to the Contractor.

8.10 USE OF PREMISES

8.10.1 The Contractor shall maintain the entire premises under his control in an orderly condition. He shall store his apparatus, materials, supplies and equipment in such a manner as will not interfere with the progress of his work or the work of other contractors.

8.11 OPERATIONS & STORAGE

- **8.11.1** The Contractor shall confine all operations (including storage of materials) on County premises to areas authorized or approved by the County.
- **8.11.2** Temporary buildings (e.g., storage sheds, shops, offices) and utilities may be erected by the Contractor only with the approval of the County and shall be built with labor and materials furnished by the Contractor without expense to the County. The temporary buildings and utilities shall remain the property of the Contractor and shall be removed by the Contractor at his expense upon completion of the work.
- 8.11.3 The Contractor shall, under regulations prescribed by the authority having jurisdiction, use only established roadways, or use temporary roadways constructed by the Contractor when and as authorized by the authority having jurisdiction. When materials are transported in performance of the Work, vehicles shall not be loaded beyond the loading capacity recommended by the manufacturer of the vehicle or prescribed by any Federal, State, or County regulation. When it is necessary to cross curbs or sidewalks, the Contractor shall protect them from damage. The Contractor shall repair, or pay for the repair, of any damaged curbs, sidewalks, or roads.

8.12 HEAT/POWER/LIGHT

- **8.12.1** Unless otherwise specified or already provided by the County, the Contractor shall:
 - a. Provide heat, as necessary to protect all work, materials, and equipment against injury from dampness and cold;
 - b. Provide heat as necessary in the area where work is to be done to provide the minimum temperature recommended by the supplier or manufacturer of the material;
 - c. Provide electric power and light as required for performance of the Work.

8.13 CLEANING UP

8.13.1 The Contractor shall at all times keep the work area, including storage areas, free from accumulations of waste materials. Before completing the Work, the Contractor shall remove from the work and premises any weeds, rubbish, tools, scaffolding, equipment, and materials that are not the property of the County. Upon completing the Work, the Contractor shall leave the work area in a clean, neat, and orderly condition satisfactory to the County.

ARTICLE 9 SAFETY & HEALTH

9.1 ACCIDENT PREVENTION

- 9.1.1 In performing this Contract, the Contractor shall provide for protecting the lives and health of employees and other persons; preventing damage to property, materials, supplies, and equipment; and avoiding work interruptions. For these purposes, the Contractor shall:
 - a. Provide a copy of its safety program;

- b. Provide appropriate safety barricades, signs, and signal lights;
- Comply with standards issued by the U.S. Government, State, County and City, and other governing agencies having jurisdiction;
- Ensure that any additional measures the County determines to be reasonably necessary for this purpose are taken.
- 9.1.2 The Contractor shall maintain an accurate record of exposure data on all accidents incident to work performed under this Contract resulting in death, traumatic injury, occupational disease, or damage to property, materials, supplies, or equipment. The Contractor shall report this data in the manner prescribed by the County.
- **9.1.3** Before beginning excavation for a trench 5 feet or more in depth, Contractor shall provide evidence of having obtained a permit from the authority having jurisdiction.
- 9.1.4 Nothing herein shall be deemed to allow use of shoring, sloping, or protective systems less effective than those required by the Construction Safety Orders of the California Division of Industrial Safety.

9.2 SANITARY FACILITIES

9.2.1 Contractor shall supply and maintain at its expense such toilets and other sanitary facilities including those which are accessible by the disabled as per ADA and Title 24 requirements necessary for use by visitors and workers employed at the job site. Such facilities shall be approved by the County.

9.3 RESPONSIBILITY FOR COMPLIANCE WITH CAL-OSHA

- 9.3.1 All work, materials, work safety procedures and equipment shall be in full accordance with the latest Cal-OSHA rules and regulations.
- 9.3.2 Contractor warrants that he and each of his subcontractors shall, in performance of this Contract, comply with each and every compliance order issued pursuant to Cal-OSHA. The Contractor assumes full and total responsibility for compliance with Cal-OSHA standards by his subcontractors as well as himself. The cost of complying with any order and/or payment of any penalty assessed pursuant to Cal-OSHA shall be borne by the Contractor. Nothing contained therein shall be deemed to prevent the Contractor and his subcontractors from otherwise allocating between themselves responsibility for compliance with Cal-OSHA requirements; provided, however, that the Contractor shall not thereby, in any manner whatsoever, be relieved of his responsibility to the County as herein set forth.

9.4 TOXIC AND HAZARDOUS MATERIALS AND WASTE

9.4.1 ASBESTOS

Operations which may cause release of asbestos fibers into the atmosphere shall meet the requirements of <u>Title 8 CCR General Industrial Safety Orders, Section 5208</u> and California law. Some operations which may cause such concentrations include sanding, grinding, abrasive blasting, sawing, drilling, shoveling, or otherwise handling materials containing asbestos so that dust will be raised.

9.4.2 TOXIC MATERIALS

Operations which release toxic materials into the atmosphere shall meet the requirements of Title 8 CCR.

<u>General Industrial Safety Orders</u>. Some operations which may release such materials include use of adhesives, sealants, paint, and other coatings.

9.4.3 LEAD-BASED PAINT

Lead-based paint is prohibited. Lead-based paint is defined as:

- a. Any paint containing more than five-tenths of one percentum lead by weight (calculated as lead metal in the total non-volatile content of the paint) or the equivalent measure of lead in the dried film of paint applied or both; or
- b. For paint manufactured after June 22, 1977, any paint containing more than six onehundredths of one percentum lead by weight (calculated as lead metal) in the total content of the paint or the equivalent measure of lead in the dried film or paint already applied.

9.4.4 HAULING AND DISPOSAL

All hauling and disposal shall meet requirements of Title 22 CCR, Division 4. Chapter 30, "Minimum Standards for Management of Hazardous and Extremely Hazardous Wastes."

9.4.5 ASBESTOS PROHIBITED

No products or materials containing asbestos shall be incorporated into the Work without the prior written approval of the County.

ARTICLE 10 COUNTY-FURNISHED PROPERTY

10.1 COUNTY-FURNISHED PROPERTY

- 10.1.1 The County may furnish to the Contractor property as identified in the specification(s) to be incorporated or installed into the Work or used in performing the Contract. The listed property will be furnished f.o.b. railroad cars at the place specified in the Contract or f.o.b. truck at the project site. The Contractor is required to accept delivery. When the property is delivered, the Contractor shall verify its quantity and condition and acknowledge receipt in writing to the County within twenty-four (24) hours of delivery, also specifying any damage to or shortage of the property as received. All such property shall be installed or incorporated into the Work at the expense of the Contractor, unless otherwise indicated in this Contract.
- 10.1.2 Each item of property to be furnished under this clause shall be identified by the Contractor in a schedule by quantity, item, and description. Schedule form will be provided by the County.
- 10.1.3 The Contractor shall be held responsible for all material delivered to him and deductions will be made from any moneys due him to make good any shortages and deficiencies, from any cause whatsoever, which may occur after such delivery.
- 10.1.4 The Contractor shall set up accounting records and establish an inspection procedure as approved by the County.

ARTICLE 11 BENEFICIAL OCCUPANCY

11.1 BENEFICIAL OCCUPANCY

- 11.1.1 The County shall have the right to take possession of or use any completed or partially completed portion of the Work. The County's possession or use shall not be deemed an acceptance of any Work under the Contract. The Contractor will continue to pay for any portion of the utilities which he is using.
- 11.1.2 While the County has such possession or use, the Contractor shall be relieved of the responsibility for the loss of or damage to that portion of the Work resulting from the County's possession or use. If Contractor believes the partial possession or use by the County will delay the progress of the Work or will cause additional expense to the Contractor, Contractor shall immediately submit a written request for an equitable adjustment in the Contract price or the time of completion. County will then consider such request and, if in its judgment it is justified, the County will modify the contract in writing accordingly. In the event the Contractor disagrees with the County's decision, the Contractor shall be required to submit a claim pursuant to the DISPUTE article.

ARTICLE 12 INSPECTION AND TESTING

12.1 INSPECTION AND TESTING

- 12.1.1 The Contractor shall maintain an adequate inspection system and perform such inspections as will ensure that the work called for by this Contract conforms to contract requirements. The Contractor shall maintain complete inspection records and make them available to the County. The County shall at all times have access to the Work, and the Contractor shall provide proper facilities for such access and for inspection.
- 12.1.2 County inspections and tests are for the sole benefit of the County and do not:
 - a. Relieve the Contractor of responsibility for providing adequate quality control measures;
 - b. Relieve the Contractor of responsibility for damage to or loss of the material before Acceptance;
 - c. Constitute or imply Acceptance; or
 - d. Affect the continuing rights of the County after Acceptance regarding latent defects, gross mistakes, fraud or the County's rights under any warranty or guarantee.
- 12.1.3 The presence or absence of a County inspector does not relieve the Contractor from any Contract requirement, nor is the inspector authorized to change any term or condition of the specifications without the County's written authorization.
- 12.1.4 The Contractor shall promptly furnish, without additional charge, all facilities, labor, and material reasonably needed for performing such safe and convenient inspections and tests as may be required by the County. The County may charge to the Contractor any additional cost of inspection or test when work is not ready at the time specified by the Contractor for inspection or test, or when prior rejection makes reinspection or retest necessary. Special, full size, and performance tests shall be performed as described in the Contract.
- 12.1.5 The Contractor shall, without charge, replace or correct work found by the County not to conform to contract requirements, unless in the public interest the County consents to accept the work with an appropriate adjustment in Contract price. The Contractor shall promptly segregate and remove rejected material from the premises.
- 12.1.6 If, before Acceptance of the Work, the County decides to examine already completed work by removing it or tearing it out, the Contractor, on request, shall promptly furnish all necessary facilities, labor, and material. If

the work is found to be defective or nonconforming in any material respect due to the fault of the Contractor or its subcontractors, the Contractor shall defray the expenses of the examination and of satisfactory reconstruction. However, if the work is found to meet Contract requirements, the County shall issue a Change Order for such removal and reinstallation.

- 12.1.7 The Contractor shall at all times maintain proper facilities and provide safe access for inspection by the County to all parts of the work, and to the shops wherein the work is in preparation. Where the specifications require work to be specially tested or approved, it shall not be tested or covered up without timely notice to the County of its readiness for inspection and without the approval or consent of County. Should any such work be covered up without such notice, approval, or consent, it must, if required by County, be uncovered for examination at the Contractor's expense.
- 12.1.8 The Contractor shall notify the County at least one (1) work day in advance of the time scheduled for the inspection. Should the Contractor fail to notify the County and proceed with work requiring inspection, all such work is rejected, and no further work shall be done on that portion of the project until the rejected work is accepted by the County. Should the Contractor request acceptance of such rejected work the County shall, at the Contractor's expense, secure the services of private material testing laboratories, consulting engineers or licensed land surveyors, who shall certify that said work does in fact conform to the requirements of the Contract Documents. The work previously rejected shall be accepted by the County after receipt of such certification if the County approves of such certification.
- 12.1.9 If the Contractor does not promptly replace or correct rejected work, the County may (1) by contract or otherwise, replace or correct the work and charge the cost to the Contractor or (2) terminate for default the Contractor's right to proceed.
- 12.1.10 Construction review of the Contractor's performance by the County is not intended to include the review of the adequacy of the Contractor's safety measures, in, on, or near the construction site.
- 12.1.11 The County will pay for initial testing services specified to be performed by the County. When initial tests indicate non-compliance with the Contract Documents, subsequent retesting occasioned by the non-compliance shall be performed by the same testing agency, and costs thereof will be deducted by the County from the Contract sum.

12.2 INSPECTION BY OTHER JURISDICTIONS

Whenever any part of the Work to be performed is under the jurisdiction or control of another public entity, including but not limited to: The United States Government, State of California, or City, such work shall be subject to inspection by the officials of such entities and it must pass inspection, in addition to County inspection, and such other inspections as may otherwise be provided for in the Contract Documents.

12.3 FINAL INSPECTION AND TESTS

The Contractor shall give the County at least ten (10) calendar days advance written notice of the date the Work will be fully completed and ready for final inspection and tests. Final inspection and tests will be started within ten (10) calendar days from the date specified in the aforementioned notice unless the County determines that the Work is not ready for final inspection and so informs the Contractor.

ARTICLE 13 ACCEPTANCE

13.1 ACCEPTANCE OF THE WORK

- 13.1.1 After the final inspection by County and all the contract documentation has been received, it will be recommended to the County Board of Supervisors to accept the Work and file a Notice of Completion. Upon approval of the Notice of Completion, a copy will be sent to the Contractor. (See final payment clause.) Upon Acceptance of the Work, Contractor will be relieved of the duty of maintaining and protecting the Work. Neither determination by the County that the Work is complete, nor Acceptance thereof, shall operate as a bar to County's claim against Contractor pursuant to Contractor's warranty and guarantees.
- 13.1.2 Partial payments shall not be construed as acceptance of any part of the Work.
- 13.1.3 In judging the Work, no allowance for deviations from the drawings and specifications will be made, unless already approved in writing at the time and in the manner as called for herein.
- 13.1.4 County shall be given adequate opportunity to make any necessary arrangements for fire insurance and extended coverage.
- 13.1.5 The Acceptance of the Work will not be recommended until all requirements of the Contract Documents are complete and approved by the County. This shall include, but is not limited to, all construction, guarantee forms, parts lists, schedules, tests, operating instructions, as-built drawings, and all other documentation identified by the Contract Documents.

ARTICLE 14 WARRANTY AND GUARANTEES

14.1 CONTRACTOR'S WARRANTY AND GUARANTEE

- 14.1.1 Contractor warrants that all materials and equipment furnished under this Contract shall be new unless otherwise specified, and that all Work performed under this Contract conforms to the Contract requirements and is free of any defect whether performed by the Contractor or any subcontractor or supplier.
- 14.1.2 This warranty shall continue for a period of one (1) year from the date of filing of Notice of Completion on the Work. The Performance Bond shall remain in force during the warranty period.
- 14.1.3 The Contractor shall remedy at the Contractor's expense any damage to County-owned or controlled real or personal property, when that damage is the result of:
 - a. The Contractor's failure to conform to Contract requirements or
 - b. Any defect of equipment, material, workmanship, or design furnished by the Contractor.
- 14.1.4 The Contractor shall restore any work damaged in fulfilling the terms and conditions of this Article. The Contractor's warranty with respect to work repaired or replaced will run for one (1) year from the date of repair or replacement.
- 14.1.5 The County shall notify the Contractor, in writing, within a reasonable time after the discovery of any failure, defect, or damage. The Contractor shall within ten (10) calendar days after being notified in writing by the County of any work not in accordance with the requirements of the Contract or any defects in the Work, commence, and perform with due diligence, all work necessary to fulfill the terms of this Article. If the Contractor fails to remedy any defect, or damage within fourteen (14) calendar days after receipt of notice, the County shall have the right to replace, repair, or otherwise remedy the defect, or damage at the Contractor's expense. Payment due to the Architect from the County for extra architectural services required in the enforcement of Contractor's guarantee after Acceptance of the Work shall be paid to the County by the Contractor.

- 14.1.6 In the event of any emergency constituting an immediate hazard to health or safety of County employees, property, or licensees, when caused by work of the Contractor that is not in accordance with the Contract requirements, the County may undertake at Contractor's expense and without prior notice, all work necessary to correct such hazardous condition(s).
- 14.1.7. With respect to all warranties, express or implied, from subcontractors, manufacturers, or suppliers for work performed and materials furnished under this Contract, the Contractor shall:
 - Obtain all warranties that would be given in normal commercial practice;
 - b. Require all warranties to be executed, in writing, for the benefit of the County, unless directed otherwise by the County; and
 - c. Enforce all warranties for the benefit of the County, unless otherwise directed by the County.
- 14.1.8 This warranty shall not limit the County's rights under the Inspection and Acceptance section(s) of this Contract with respect to latent defects, gross mistakes, or fraud.

ARTICLE 15 ENVIRONMENTAL PROTECTION

15.1 DUST CONTROL

- 15.1.1 The Contractor shall provide any and all dust control required.
- 15.1.2 Whenever the Contractor is negligent in providing dust control, the County shall order the Contractor to provide such dust control. If the Contractor does not comply promptly with such order, the County shall have the authority to provide such dust control and charge the Contractor therefore by deducting the cost from progress payments to the Contractor as such costs are incurred by the County. The County shall not be held responsible for schedule delays due to actions taken by County to mitigate the failure of the Contractor in providing dust control.

15.2 EXCESSIVE NOISE

- 15.2.1 The Contractor shall use only such equipment on the Work and in such state of repair, that the emission of sound therefrom is within the noise tolerance level of that equipment as established by CAL-OSHA.
- 15.2.2 Should the County determine that the muffling device on any equipment used on the Work is ineffective or defective so that the noise tolerance of such equipment is exceeded, such equipment shall not, after such determination by the County, be used on the Work until its muffling device is repaired or replaced so as to bring the noise tolerance level of such equipment within such standards.

15.3 POLLUTION CONTROL, CLEANING

15.3.1 The Contractor shall not, in connection with the Work, discharge any smoke, dust, or other contaminants into the atmosphere which are in violation of South Coast Air Quality Management District standards or discharge any fluids or materials into any lake, river, stream, or channel as will violate regulations of State of California Water Resources Board. The Contractor shall control accumulation of waste materials and rubbish and dispose of waste materials and rubbish off-site at a minimum of weekly intervals. Burning of materials is not permitted.

ARTICLE 16 EMPLOYMENT PRACTICES

16.1 QUALIFICATIONS FOR EMPLOYMENT AND APPRENTICESHIP STANDARDS

- 16.1.1 In accordance with Section 1735 of the California <u>Labor Code</u>, no person under the age of 16 years and no person currently serving sentence in a penal or correctional institution shall be employed to perform any Work under this Contract. No person whose age or physical condition is such as to make his employment dangerous to his health or safety or to the health or safety of others shall be employed to perform Work under this Contract; provided that this requirement shall not operate against any physically handicapped persons otherwise employable where such persons may be safely assigned to Work which they ably perform.
- 16.1.2 This contract is subject to the provisions of Sections 1777.5 and 1777.6 of the California <u>Labor Code</u> concerning the employment of apprentices by the Contractor or any subcontractor under him. Section 1777.5 as amended, requires the Contractor or subcontractor employing tradesmen in any apprenticeable occupation to apply to the Joint Apprenticeship Committee nearest the site of this project and which administers the apprenticeship program in that trade for a certificate of approval. The certificate will also fix the ratio of apprentices to journeymen that will be used in the performance of the Contract.
- 16.1.3 The Contractor is required to make contributions to funds established for the administration of apprenticeship programs if he employs registered apprentices or journeymen in any apprenticeable trade on such contracts and if other contractors on the public works site are making contributions.
- 16.1.4 All employees engaged in work on the project under this Contract shall have the right to organize and bargain collectively through representatives of their own choosing, and such employees shall be free from interference, restraint, and coercion of employers in the designation of such employees for the purpose of collective bargaining or other mutual aid or protection, and no person seeking employment under this Contract shall be required as a condition of initial or continued employment to join any company, union, or to refrain from joining, organizing, or assisting a labor organization of such person's own choosing. No person in the employment of the County shall be employed by this contractor.

16.2 WAGES & RECORDS

16.2.1 WAGE RATES

- a. Pursuant to Section 1770 and 1773 et seq. of the Labor Code of the State of California, the Director of Industrial Relations has ascertained the general prevailing rate of per diem wages and the rates for overtime and holiday work in the locality in which the work is to be performed for each craft, classification, or type of workman needed to execute the contract which will be awarded to the successful bidder, copies of which are on file and available upon request at the Clerk of the Board, Board of Supervisors, 4080 Lemon St., 14th Floor, Riverside, CA 92501-3655, and shall be posted at the job site.
- b. It shall be mandatory upon the Contractor and upon any subcontractor under him, to pay not less than the said specified rates to all laborers, workmen, and mechanics employed in the execution of the Contract. It is further expressly stipulated that the Contractor shall, as a penalty to County, forfeit twenty-five dollars (\$25.00) for each calendar day, or portion thereof, for each laborer, workman, or mechanic paid less than the stipulated prevailing rates for any work done under this Contract by him or by any subcontractor under him; and Contractor agrees to comply with all provisions of Section 1770 et. seq. of the <u>Labor Code</u>.
- c. In case it becomes necessary for the Contractor or any sub-contractor to employ on the

project under this Contract any person in a trade or occupation (except executives, supervisory, administrative, clerical, or other non-manual workers as such) for which no minimum wage rate is herein specified, the Contractor shall immediately notify the County who will promptly thereafter determine the prevailing rate for such additional trade or occupation and shall furnish the Contractor with the minimum rate based thereon. The minimum rate thus furnished shall be applicable as a minimum for such trade or occupation from the time of the initial employment of the person affected and during the continuance of such employment.

d. The County will not recognize any claim for additional compensation because of the payment by the Contractor of any wage rate in excess of the prevailing wage rate set forth as provided herein. The possibility of wage increases is one of the elements to be considered by the Contractor in determining his bid, and will not under any circumstances be considered as the basis of a claim against the County on the Contract.

16.2.2 WAGE RECORDS

a. The Contractor and each subcontractor shall keep or cause to be kept an accurate record (certified payroll) showing the names and occupations of all laborers, workers, and mechanics employed by him in connection with the execution of this Contract or any subcontract thereunder. The record shall show the actual per diem wages paid to each of said workers, which records shall be provided to the County, and to the Division of Labor Standards Enforcement upon its request. Copies provided will include one which has the name and social security numbers marked out.

16.3 NOTICE OF LABOR DISPUTES

- 16.3.1 If the Contractor has knowledge that any actual or potential labor dispute is delaying or threatens to delay the timely performance of this Contract, the Contractor shall immediately give notice, including all relevant information, to the County.
- 16.3.2 The Contractor agrees to insert the substance of this clause, including this paragraph into any subcontract in which a labor dispute may delay the timely performance of this Contract; except that each subcontract shall provide that in the event its timely performance is delayed or threatened by delay by any actual or potential labor dispute, the subcontractor shall immediately notify the next higher tier subcontractor or the prime Contractor, as the case may be, of all relevant information concerning the dispute.

16.4 NONDISCRIMINATION

16.4.1 EQUAL EMPLOYMENT OPPORTUNITY

a. Contractor agrees for the duration of this Contract that it will not discriminate against any employee or applicant for employment because of race, color, religion, sex, national origin, age, political affiliation, marital status, or handicap. The Contractor will take affirmative action to insure that employees are treated during employment or training without regard to their race, color, religion, sex, national origin, age, political affiliation, marital status, or handicap. Such action shall include, but not be limited to, the following: employment, upgrading, demotion, or transfer; recruitment or recruitment advertising; layoff or termination; rates of pay or other forms of compensation; and selection for training, including apprenticeship. The Contractor agrees to post in conspicuous places, available to employees and applicants for employment, notices to be provided setting forth the

provisions of this nondiscrimination clause.

- b. The Contractor will in all solicitations or advertisements for employees placed by or on behalf of the Contractor, state that all qualified applicants will receive consideration for employment without regard to race, color, religion, sex, national origin, age, political affiliation, marital status, or handicap.
- c. The Contractor will send to each labor union or other representative of workers with which it has a collective bargaining agreement or other contract or understanding, a notice advising the workers' representative of the Contractor commitments under this agreement.
- d. The Contractor agrees that it will comply with the provisions of Titles VI and VII of the Civil Rights Act, Revenue Sharing Act Title 31, U.S. Code Section 2716, and California Government Code Section 12990.
- e. The Contractor agrees that it will assist and cooperate with the County, the State of California and the United States Government in obtaining compliance with the equal opportunity clause, rules, regulations, and relevant orders of the State of California and United States Government issued pursuant to the Acts.
- f. In the event of the Contractor's non-compliance with the discrimination clause, the affirmative action plan of this contract, or with any of the said rules, regulations or orders, this Contract may be canceled, terminated, or suspended in whole or in part by the County.

16.4.2 HANDICAPPED NON-DISCRIMINATION

This project is subject to Section 504 of the <u>Rehabilitation Act of 1973 as amended, (29 U.S.C. 794)</u>, and the <u>Americans with Disabilities Act</u> of 1990, as amended, and all requirements imposed by the guidelines and interpretations issued thereto. In this regard, the County and all of its contractors and subcontractors will take all reasonable steps to ensure that handicapped individuals have the maximum opportunity for the same level of aid, benefit or service as any other individual.

16.4.3 FAIR EMPLOYMENT AND HOUSING ACT ADDENDUM

In the performance of this Contract, the Contractor will not discriminate against any employee or Applicant for employment because of race, sex, color, religion, ancestry, or national origin. The Contractor will take affirmative action to ensure that applicants are employed, and that employees are treated during employment, without regard to their race, sex, color, religion, ancestry, or national origin. Such action shall include, but not limited to, the following: employment, upgrading, emotion, or transfer; recruitment or recruitment advertising; layoff or termination; rates of pay or other forms of compensation; and selection for training, including apprenticeship. The Contractor shall post in conspicuous places, available to employees and applicants for employment, notices to be provided by the State or local agency setting forth the provisions of this Fair Employment and Housing Section.

16.4.4 ACCESS TO RECORDS

The Contractor will permit access to his records of employment, employment advertisements, application forms, and other pertinent data and records by the State Fair Employment and Housing Commission, or any other agency of the State of California designated by the awarding authority, for the purposes of investigation to ascertain compliance with the Fair Employment and Housing section of this Contract.

16.4.5 REMEDIES FOR WILLFUL VIOLATION

The State or local agency may determine a willful violation of the Fair Employment and Housing provision to have occurred upon receipt of a final judgment having that effect from a court in an action to which Contractor was a party, or upon receipt of a written notice from the Fair Employment and Housing Commission that it has investigated and determined that the Contractor has violated the Fair Employment and Housing Act and has issued an order or obtained an injunction under Government Code Sections 12900, et seq.

ARTICLE 17 SUBCONTRACTING

17.1 SUBCONTRACTORS

- 17.1.1 A subcontractor is an individual, firm or corporation having a direct contract with the Contractor or with any other subcontractor for the performance of a part of the Work. In accordance with Section 4104 of the <u>Public Contract Code</u>, each Contractor, in his bid, shall include the name and location of each subcontractor who will perform work or labor, or render services to the Contractor in or about the Work in an amount in excess of one half of 1% of the Contractor's total bid.
- 17.1.2 The County reserves the right to approve all subcontractors. Such approval shall be a consideration to the awarding of the Contract and unless notification to the contrary is given to the Contractor prior to the signing of the Contract, the list of subcontractors which is submitted with his proposal will be deemed to be acceptable.
- 17.1.3 The Contractor shall be as fully responsible to the County 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.
- 17.1.4 Nothing contained in the Contract Documents shall create any contractual relationship between any subcontractor and the County.
- 17.1.5 The divisions or sections of the specifications are not intended to control the Contractor in dividing the Work among subcontractors or to limit the work performed by any trade.

17.2 RELATIONS OF CONTRACTOR AND SUBCONTRACTOR

17.2.1 The Contractor agrees to bind every subcontractor by the terms of the Contract with the County, the General Conditions, Supplementary Conditions, and the drawings and specifications as far as applicable to his work, unless specifically noted to the contrary in a subcontract approved in writing as adequate by the County.

17.3 SUBCONTRACTS

- 17.3.1 Pursuant to the provisions of Sections 4100 to 4114 of the California <u>Public Contract Code</u>, inclusive, the Contractor shall not, without the consent of the County, either:
 - Substitute any persons as subcontractors in place of the subcontractors designated in his
 original bid without the consent of County. (The County's consent can only be given in cases
 permitted by <u>Public Contract Code</u> Section 4107.)
 - b. Permit any subcontract to be assigned or transferred or allow any work to be performed by anyone other than the original subcontractor listed in his bid.

c. Sublet or subcontract any portion of the work in excess of one-half of one percent of his bid to which his original bid did not designate a subcontractor.

Should the Contractor violate any of the provisions of Sections 4100 to 4114, inclusive, of the <u>Public Contract Code</u>, his so doing shall be deemed a violation of this Contract, and the County may either cancel the contract, or assess the Contractor a penalty in the amount of not more than ten (10) percent of the amount of the subcontract involved, or both.

ARTICLE 18 TAXES

18.1 SALES AND PAYROLL TAXES

18.1.1 Each Contractor, subcontractor, and material dealer shall include in their bid all applicable taxes including but not limited to sales tax and payroll taxes required by law.

ARTICLE 19 CHANGES

19.1 CHANGE ORDER WORK

- 19.1.1 The County reserves the right to make changes in the work without impairing the validity of the Contract. The County may make changes to the work, or suspend the work, and all such changes or suspension are within the contemplation of the parties and will not be a basis for compensable delay. Such changes may be made in accordance with any of the following methods:
 - a. By written change order to the Contract ordered by the Board of Supervisors.
 - b. By written change order, signed by the Assistant County Executive Officer/EDA, in the manner and amounts specified by Board Policy B-11.
 - c. By written authorization, issued by the Assistant County Executive Officer/EDA, for items of work done under unit prices. The cost or credit for such added or omitted work shall be determined by multiplying the number of units added to or omitted from the work by the applicable unit price.
- 19.1.2 Upon receipt of a proposed Change Order from County, the Contractor shall submit a proposal in accordance with the requirements and limitations set forth in this "Change Orders" article, for work involved in the contemplated change.
- 19.1.3 The Contractor must submit a cost proposal within fifteen (15) calendar days after receipt of the proposed change order. The Contractor must submit cost proposals in less than fifteen (15) calendar days if requested by the County or if required by schedule limitations.
- 19.1.4 If the Contractor fails to submit the cost proposal within the 15-day period (or as requested), the County has the right to order the Contractor in writing to commence the work immediately on a force account basis and/or issue a lump sum change to the contract price in accordance with the County's estimate of cost. If the change is issued based on the County estimate, the Contractor will waive his right to dispute the action unless within fifteen (15) calendar days following completion of the added/deleted work, the Contractor presents proof that the County's estimate was in error.
- 19.1.5 If the County disagrees with the proposal submitted by Contractor, it will notify the Contractor in writing and the Contractor may elect to proceed under the DISPUTE article of this Contract, or, in the event either party

contests the price or time extension of Change work, or time is of the essence, the County may issue a Construction Change Directive and the contractor shall proceed with the work. The County will provide its opinion of the appropriate price and/or time extension in a "Response to Change Order Request." If the contractor agrees with the County's estimate, a change order will be issued by the County. If no agreement can be reached, the County shall have the right to issue the Change Order Directive setting forth its unilateral determination of the reasonable additions or savings in costs and time attributable to the extra or deleted work. Such determination shall become final and binding if the Contractor fails to submit a Claim in writing to the County, within twenty-one (21) days of the Change Order Directive, disputing the terms of such Directive. No dispute, disagreement or failure of the parties to reach agreement regarding the amount, if any, of any adjustment to the contract sum or contract time shall relieve the Contractor from the obligation to proceed with performance of the work, including extra work, promptly and expeditiously."

- 19.1.6 The Contractor will give notice of a requested change on his letterhead within seven (7) calendar days of discovery and, if the County agrees, a proposed change order will be issued on the County's standard change order form.
- 19.1.7 If any change involves an increase or decrease in the cost of the Contractor's work, a change order shall state the amount to be added or deducted from the Contract amount, and the additional time, if any, needed for the performance of such work.
- 19.1.8 Any changes to the Contract amount shall be in a lump sum mutually agreed to by the Contractor and the County, except that when, in the opinion of the County, such basis is not feasible the change to the Contract amount shall be determined upon a cost-plus-percentage basis with a guaranteed maximum lump sum cost within the limitations provided by law.
- 19.1.9 Each lump sum quotation from the Contractor shall be accompanied by sufficiently detailed estimates to permit verification of totals in accordance with (a) through (d) in 19.1.11 below.
- 19.1.10 When the work is to be done on a cost-plus-percentage basis, the Contractor shall submit statements as required by the County showing all labor, material, and equipment costs incurred, and upon completion of the work, a summary of costs, including overhead and profit, and in accordance with Item (a) through (d) in 19.1.11 below.
- 19.1.11 Estimates for lump sum quotations and accounting for cost-plus-percentage work shall be limited to direct expenditures necessitated specifically by the subject extra work, and shall be segregated as follows:
 - a. Labor. The costs of labor will be the actual cost for wages prevailing locally for each craft or type of worker at the time the extra work is done, plus employer payments of payroll taxes and insurance, health and welfare, pension, vacation, apprenticeship funds, and other direct costs resulting from Federal, State or local laws, as well as assessment or benefits required by lawful collective bargaining agreements. The use of a labor classification which would increase the extra work cost will not be permitted unless the contractor establishes the necessity for such additional costs. Labor costs for equipment operators and helpers shall be reported only when such costs are not included in the invoice for equipment rental.
 - b. Materials. The cost of materials reported shall be at invoice or lowest current price at which such materials are locally available in the quantities involved, plus sales tax, freight and delivery.
 - c. Tool and Equipment Use. No payment will be made for the use of tools which have a

replacement value of \$100 or less. Regardless of ownership, the rates to be used in determining equipment use costs shall not exceed listed rates prevailing locally at equipment rental agencies, or distributors, at the time the work is performed.

- d. Overhead, Profit and Other Charges. The mark-up for overhead and profit on work added to the Contract shall be according to the following Schedule.
 - (1) For work performed by the Contractor's forces the added cost for overhead and profit shall not exceed fifteen (15%) percent of the net cost of the work, equipment, labor and materials.
 - (2) For work performed by a subcontractor, the added cost for overhead and profit shall not exceed fifteen (15%) percent of the net cost of the work, equipment, labor and materials, to which the Contractor may add five (5) percent of the subcontractor's price of the work.
 - (3) For work performed by a sub-subcontractor the added cost for overhead and profit shall not exceed fifteen (15 %) percent of the net cost for work, equipment, labor and materials to which sub-contractor and general contractor may each add an additional five (5 %) percent of the total price from the lower tier subcontractor.
 - (4) "Net Cost" is defined as consisting of costs of labor, materials and equipment use and/or rental only. The costs of applicable insurance and bond premium will be reimbursed to the Contractor and subcontractors at cost only, without mark-up.
 - (5) The cost of direct supervision, except when provided by working foreman whose time is included above, of change order work when done exclusively, and not in conjunction or at the same time as, other work performed on the job and when approved in advance by the County's authorized representative, including only payroll taxes, insurance, pension and direct costs for the labor of supervision may be charged to the change order. The cost of transportation, use of vehicle and other costs incurred by supervision will not be allowed.
- 19.1.12 For added or deducted work by subcontractors, the Contractor shall furnish to the County the subcontractor's signed detailed estimate of the cost of labor, material and equipment, including the markup by such subcontractor for overhead and profit. The same requirement shall apply to sub-subcontractors.
- 19.1.13 For added or deducted work furnished by a vendor or supplier, the Contractor shall furnish to the County a detailed estimate or quotation of the cost to the Contractor for such work, signed by such vendor or supplier.
- 19.1.14 Any change in the work involving both extras and credits shall show a new total cost, including subcontracts. Allowance for overhead and profit, as specified therein, shall be applied if the net total cost is an extra; overhead and profit allowances shall not be applied if the net total cost is a credit. The estimated cost of deductions shall be based on labor and material prices on the date the Contract was executed.
- 19.1.15 The Contractor shall identify any adjustment in time of the final completion of the Work as a whole which is directly attributable to the changed work within fifteen (15) calendar days of receipt of the proposed change order. The Contractor's request for a change in time will be supported by a detailed schedule analysis including a schedule indicating the activities which have been affected and the additional time being requested.

- a. For a change in time for the Work, the Contractor shall be entitled only to such adjustments where completion of the entire Work (critical path) is delayed due to the performance of the changed work. Failure to request extra time when submitting such estimate shall constitute waiver of the right to subsequently claim adjustment in time for final completion based upon such changed work.
- b. If the County and the Contractor fail to arrive at an agreement on the amount of extra cost, credit or time extension for a proposed change, a change order will be processed in the amount believed by the County to be reasonable, and the Contractor shall proceed with the work. If the Contractor believes that the amount or time stipulated in the change order is not reasonable for the work required, he may elect to issue a notification in accordance with the DISPUTES article for review by the County, stating therein the basis for his dispute with such change order.
- 19.1.16 Any change in the Work shall conform to the original Contract Documents insofar as they may apply without conflict to the conditions involved in the change.
- 19.1.17 Payment for additional work or extras, if any, shall become due and payable in accordance with the provisions for payment in the Contract.
- 19.1.18 Contractor shall not reserve a right to assess impact cost, extended job site costs, extended overhead, and/or constructive acceleration at a later date as related to any and all changes. All costs or estimated costs must be supported with full schedule and cost documentation with each proposed change within the prescribed submission times. If a request for a change is denied and the Contractor disputes the denial, the Contractor must supply the aforementioned documentation to support his claim under the DISPUTES article of this Contract. No claims shall be allowed for impact, extended overhead costs, and/or construction acceleration due to the multiplicity of changes and/or clarifications. Any attempt by Contractor to change or modify the change order form (sample included herein) shall void the form, including any letters the Contractor may issue in conjunction therewith.
- 19.1.19 All alterations, extensions of time, extra and additional work and other changes authorized by these specifications or any part of the Contract may be made without securing consent of the surety or sureties on the contract bonds.

19.2 CHANGE ORDERS AND LABOR RATES GUIDELINES

19.2.1 The following are guidelines for preparing change orders:

a. Labor Rates:

- (1) To establish the labor rate for each classification and trade, a breakdown shall be submitted to the County.
- (2) Labor rates are based on current prevailing state and federal wages. Only those benefits mandated by law or a valid labor contract are paid by the County.
- (3) Payroll taxes shall be paid as mandated by law. Labor related insurances shall be paid according to industry standard average.
- (4) No other costs related to labor shall be paid by County.

b. <u>Change Orders</u>:

- (1) Change orders shall be prepared in accordance with the project contract.
- (2) No insurance costs are paid by County, except for labor insurances specified in this guideline under section 1 titled "LABOR RATES".
- (3) Material cost shall be broken down on a separate sheet, and for those jobs designated as time and material shall be supported by valid invoices from suppliers.
- (4) Hours for non-productive labor, such as non-working foremen or general foremen, shall be paid only when justified in the opinion of the County, and approved by the County. The total number of nonproductive labor hours shall be limited to a maximum of 15% of the total number of productive labor hours.
- (5) Cost of use of special equipment shall be paid when justified in the opinion of the County, and approved by the County. Equipment refers to special equipment that is needed to perform that specific job, and does not include the usual tools customarily required for that trade. Small tools costs are not paid by County.
- (6) Material transportation costs are paid by County when justified in the opinion of the County, and approved by the County's authorized representative.
- (7) Overhead, profit and fees on subcontracts, are paid according to the contract.
- (8) No costs other than those designated above shall be paid by County. The percentages of overhead and fee allowed with change orders have been established to account for any other direct or indirect costs that might be incurred due to the change order.

19.3 **AUDIT**

- 19.3.1 The County shall have the right to examine and audit all books, estimates, records, contracts, documents, bid documents, subcontracts, and other data of the Contractor (including computations and projections) related to negotiating, pricing, or performing the modification in order to evaluate the accuracy and completeness of the cost or pricing data at no additional cost to the County.
- 19.3.2 The Contractor shall make available at its office at all reasonable times the materials described in paragraph 19.3.1 above, for examination, audit, or reproduction, until 4 years after final payment under this Contract.
- 19.3.3 The Contractor shall insert a clause containing all the provisions of this 19.3, including this paragraph, in all subcontracts over \$10,000 under this contract.

ARTICLE 20 PAYMENT

20.1 PROGRESS PAYMENTS

- 20.1.1 The County shall pay the Contractor the price as provided in this Contract.
- 20.1.2 The County shall make progress payments monthly as the Work proceeds, on estimates approved by the County. The Contractor shall furnish a breakdown of the total contract price, in a format provided by the

- County, showing the amount included therein for each principal category of the work, in such detail as requested, to provide a basis for determining progress payments.
- 20.1.3 Contractor shall submit to the County vouchers, schedule activities, or other satisfactory proof of the value of any work for which he claims payment on such account, and receipts showing that progress payments have been duly made on such contracts, and for materials furnished.
- 20.1.4 In the preparation of estimates, the County may authorize 75% of the value of material delivered and satisfactorily stored on the site, and preparatory work done to be taken into consideration for major equipment if:
 - a. Consideration is specifically authorized by this Contract; and
 - b. The Contractor furnishes certified receipt that it has acquired title and paid invoices for such material and that the material will be used to perform this Contract.
- 20.1.5 On the 25th of each month the Contractor will submit his request for payment. Prior to that submittal the County will review the requested percentage of completion for each activity. The payment request will be in the format as provided by the County and will refer to the schedule.
- 20.1.6 Upon receipt of a payment request, the County shall:
 - a. Review that request as soon as practicable after receipt for the purpose of determining that the payment request is a proper payment request; and
 - b. Any payment request determined not to be a proper request suitable for payment shall be returned to the Contractor as soon as practicable, but not later than seven (7) calendar days after receipt. The returned request for payment shall be accompanied by a document setting forth in writing the reasons why the payment request is not proper.
- 20.1.7 Any progress payment which is undisputed and properly submitted and remains unpaid for thirty (30) calendar days after receipt by County shall accrue interest to the Contractor equivalent to the legal rate set forth in subdivision (a) of Section 685.010 of the California Code of Civil Procedure. The number of days available to the County to make a payment without incurring interest pursuant to this section shall be reduced by the number of days by which the County exceeds the seven-day return requirement set forth in 20.1.6 above.
- 20.1.8 In making these progress payments, there shall be retained ten percent (10%) from the amount of each progress payment until the work is 50% complete. After the 50% completion point, if satisfactory progress is being made and at the sole discretion of the County, the retention may be reduced to a minimum of 5% of the contract.
- 20.1.9 Except as otherwise prohibited by law, the Contractor may elect to receive all payments due under the contract pursuant to this section without any retention, by posting securities in accordance with <u>Public Contract Code</u> Section 22300.
- 20.1.10 Contractor and each subcontractor shall pay each of its employees engaged in work under this Contract in full (less deductions made mandatory by law) in accordance with California law.
- 20.1.11 The County may withhold (in excess of retentions) or, on account of subsequently discovered evidence, nullify the whole or a part of any certificate to such extent as may be necessary to protect the County from loss on

account of:

- Defective work not remedied.
- b. Claims filed or reasonable evidence indicating probable filing of claims.
- Failure of the Contractor to make payments properly to subcontractors or for material or labor.
- d. Damage to another Contractor.
- e. Delays in progress toward completion of the work, with the stipulated amount of liquidated damages being withheld for each day of delay for which no extension is granted.
- f. Default of the Contractor in the performance of the terms of the Contract.
- 20.1.12 Should stop notices be filed with the County, County shall withhold the amount required plus 25% from certificates until such claims shall have been resolved pursuant to applicable law. California <u>Civil Code</u> Section 3179 et seq.
- 20.1.13 Contractor shall provide (1) forms of conditional releases of stop notice and bond rights upon progress payment, complying with California Civil Code Section 3262(d)(1), for all work performed during the time period covered by the current Application for Payment, signed by the Contractor and the subcontractors of every tier; and (2) forms of unconditional release of stop notice and bond rights upon progress payment, complying with Civil Code Section 3262(d)(2) for all work performed during the time period covered by previous Application for Payment, signed by Contractor and the subcontractors of every tier.
- 20.1.14 All material and work covered by progress payments made shall, at the time of payment, become the sole property of the County, but this shall not be construed as:
 - a. An acceptance of any work not in accordance with the Contract Documents; or
 - b. Waiving the right of the County to require the fulfillment of all of the terms of the contract.

20.2 FINAL PAYMENT

20.2.1 GENERAL

- a. The County shall pay the amount due the Contractor under this Contract after:
 - 1.) The Acceptance of all work and Notice of Completion per the terms of this Contract;
 - 2.) Presentation of a properly executed voucher;
 - 3.) Submission of conditional releases and waivers of stop notice and bond rights upon final payment in the form required by California Civil Code Section 3262(d)(3) executed by Contractor and by all the subcontractors of every Tier.
 - 4.) Presentation of release of all claims against the County arising by virtue of this Contract, other than claims and disputes in stated amounts, that the Contractor has

specifically excepted from the operation of the release.

b. The Contractor may, if any subcontractor refuses to furnish a release or receipt in full, furnish a bond satisfactory to the County, to indemnify him against any lien.

20.2.2 FINAL CERTIFICATE FOR PAYMENT

- a. When the work is ready for acceptance by the County, the Economic Development Agency will certify and submit to the Board of Supervisors a Notice of Completion. Upon approval of the Notice of Completion, a copy will be sent to the Contractor.
- b. Notice of Completion will be recorded by the County upon completion and Acceptance of the Work. Providing no stop notices have been filed, thirty-five (35) calendar days after filing of such Notice of Completion, payment due under the contract will become due to the Contractor and the County shall so certify authorizing the final payment.

20.2.3 FINAL PAYMENT

- a. After Acceptance of Work, the County will submit to Contractor a statement of the sum due Contractor under this contract, together with County payment in the amount thereof. Said statement shall take into account the contract price, as adjusted by any change orders; amounts already paid; sums to be withheld for incomplete work; liquidated damages; and for any other cause under the Contract.
- b. The Contractor shall, from the effective date of Acceptance until the expiration of four years after final settlement under this Contract, preserve and make available to the County, all its books, records, documents, and other evidence bearing on the costs and expenses of the Contractor under this Contract.

ARTICLE 21 SUSPENSION OF WORK/TERMINATION

21.1 NON-COMPLIANCE WITH CONTRACT REQUIREMENTS

- 21.1.1 In the event the Contractor, after receiving written notice from the County of non-compliance with any requirement of this Contract, fails to promptly initiate appropriate action to comply with the specified requirement, the County shall have the right to withhold payment for work completed under the Contract until the Contractor has complied with the notice or has initiated such action as may be appropriate to comply, within a reasonable period of time. The Contractor shall not be entitled to any extension of contract time or payment for any costs incurred for work under this article.
- 21.1.2 Should the Contractor abandon the Work called for under the Contract, or assign his Contract, or unnecessarily and unreasonably delay the work, or willfully violate or perform the work in bad faith, the County shall have the power to notify the Contractor to discontinue all work or any part thereof under this Contract, and thereupon the Contractor shall cease to continue said work or such part thereof as the County may designate, and the County shall have the power to employ such persons as it may consider desirable, and to obtain by contract, purchase, hire or otherwise, such implements, tools, material or materials as the County may deem advisable to work at and be used to complete the work herein described, or such part thereof as shall have not been completed, and to use such material as it may find upon the site of the work, and to charge the expense of such labor and material, implements and tools to the Contractor, and the expense so charged shall be deducted and paid by the County out of such monies as may either be due, or may at any time thereafter become due to the Contractor under the Contract.

21.2 TERMINATION

21.2.1 TERMINATION FOR BREACH

If the Contractor should be adjudged bankrupt or if he should make a general assignment for the benefit of his creditors, or if a receiver should be appointed on account of his insolvency, or if he or any of his subcontractors should violate any of the provisions of the Contract, the County may serve written notice upon him and his surety of its intention to terminate Contractor's performance hereunder, said notice shall contain the reasons for such intention to terminate Contractor's performance, and, unless within ten (10) calendar days after serving of said notice, such violation shall cease and satisfactory arrangements for correction thereof be made, Contractor's performance shall, upon the expiration of said ten (10) calendar days, cease and terminate. In the event of any such termination, the County shall immediately serve written notice thereof upon the surety and the Contractor, and the County may take over the Contractor's work and prosecute the same to completion by contract or by any other method it may deem advisable, for the account and at the expense of the Contractor, and the Contractor and his surety shall be liable to the County for any excess cost occasioned the County thereby, and in such event the County may without liability for so doing take possession of and utilize in completing the work, such materials, appliances, plants, and other property belonging to the Contractor as may be on the site of the work and necessary therefore.

21.2.2 TERMINATION FOR CONVENIENCE

- a. If the construction of the project herein is damaged, which damage is determined to have been proximately caused by an Act of God, in excess of 5% of the contract amount, provided that the work damaged is built in accordance with applicable building standards and the plans and specifications, then the County may, without prejudice to any other right or remedy, terminate the Contract.
- b. The County may terminate performance of work under this Contract in whole or in part, if the County determines that a termination is in the County's interest. The County shall terminate by delivering to the Contractor a Notice to Terminate specifying the extent of termination and the effective date.
- c. After receipt of such Notice, and except as directed by the County, the Contractor shall immediately proceed with the following obligations, regardless of any delay in determining or adjusting any amounts due under this clause:
 - (1) Stop work as specified in the notice.
 - (2) Place no further subcontracts or orders (referred to as subcontracts in this clause) for materials, services, or facilities, except as necessary to complete any continued portion of the Contract.
 - (3) To terminate all subcontracts to the extent they relate to the work terminated.
 - (4) With approval or ratification to the extent required by the County, settle all outstanding liabilities and termination settlement proposals arising from termination of subcontracts; the approval or ratification will be final for purposes of this clause.

- (5) As directed by the County, transfer title and deliver to the County (1) the fabricated or unfabricated parts; work in progress, completed work, supplies, and other material produced or acquired for the work terminated; and (2) the completed or partially completed plans, drawings, information, and other property that, if the contract had been completed, would be required to be furnished to the County.
- (6) Complete performance of work not terminated.
- (7) Take any action that may be necessary, or that the County may direct, for the protection and preservation of the property related to this contract that is in the possession of the Contractor and in which the County has or may acquire an interest.
- (8) Use its best efforts to sell, as directed or authorized by the County, any property of the types referred to in subparagraphs above; provided, however, that the Contractor (1) is not required to extend credit to any purchaser and (2) may acquire the property under the conditions prescribed by, and at prices approved by the County. The proceeds of any transfer or disposition will be applied to reduce any payments to be made by the County under this contract, credited to the price or cost of the work, or paid in any other manner directed by the County.
- d. After termination, the Contractor shall submit a final termination settlement proposal to the County in the form and with the certification prescribed by the County. The Contractor shall submit the proposal promptly, but no later than thirty (30) days from the effective date of termination. If the Contractor fails to submit the proposal within the time allowed, the County may determine, on the basis of information available, the amount, if any, due the Contractor because of the termination and shall pay the amount determined.
- e. Subject to subparagraph (2) above, the Contractor and the County may agree upon the whole or any part of the amount to be paid because of the termination. The amount may include a reasonable allowance for profit on work done. However, the agreed amount, may not exceed the total contract price as reduced by:
 - (1) the amount of payments previously made and;
 - (2) the contract price of work not terminated. The contract shall be amended with a Change Order, and the Contractor paid the agreed amount.
- f. If the Contractor and County fail to agree on the whole amount to be paid the Contractor because of the termination of work, the County shall pay the Contractor the amounts determined as follows:
 - (1) For contract work performed before the effective date of termination, the total (without duplication of any terms) of:
 - (i) The cost of this work;
 - (ii) The cost of settling and paying termination settlement proposals under terminated subcontracts that are properly chargeable to the terminated portion of the contract if not included in subdivision (i) above; and

- (iii) A sum, as profit on (i) above, determined by the County to be fair and reasonable; however, if it appears that the Contractor would have sustained a loss on the entire contract had it been completed, the County shall allow no profit under this subdivision (iii).
- (2) The reasonable costs of settlement of the work terminated including:
 - (i) Accounting, clerical, and other expenses reasonably necessary for the preparation of termination settlement proposals and supporting data; and
 - (ii) Storage, transportation, and other costs incurred, reasonably necessary for the preservation, protection, or disposition of the termination inventory.
- g. Except for normal spoilage, the County shall exclude from the amounts payable to the Contractor the fair value, as determined by the County, of defective work, and of property that is destroyed, lost, stolen, or damaged so as to become undeliverable.
- h. The Contractor shall have the right to make a claim under the DISPUTES article, from any determination made by the County.
- i. In arriving at the amount due the Contractor, there shall be deducted:
 - (1) All unliquidated advance or other payments to the Contractor under the terminated portion of this Contract;
 - (2) Any claim which the County has against the Contractor under this Contract; and
 - (3) The agreed price for, or the proceeds of sale of, materials, supplies, or other things acquired by the Contractor or sold under the provisions of this clause and not recovered by or credited to the County.
- j. If the termination is partial, the Contractor may file a proposal with the County for a Change Order of the price(s) of the continued portion of the Contract. The County shall process any Change Order agreed upon. Any proposal by the Contractor for an equitable adjustment under this clause shall be requested within thirty (30) days from the effective date of termination unless extended in writing by the County.
- k. The County may, under the terms and conditions it prescribes, make partial payments and payments against costs incurred by the Contractor for the terminated portion of the Contract, if the County believes the total of these payments will not exceed the amount to which the Contractor will be entitled. If the total payments exceed the amount finally determined to be due, the Contractor shall repay the excess to the County upon demand, together with interest.
 - Unless otherwise provided in this Contract or by statute, the Contractor will maintain all records and documents relating to the terminated portion of this Contract for 4 years after final settlement. This includes all books and other evidence bearing on the Contractor's costs and expenses under this Contract. The Contractor shall make these records and documents available to the County, State and/or the U.S. Government or their representatives at all reasonable times, without any direct charge.

ARTICLE 22 DISPUTES/CLAIMS

22.1 CLAIMS RESOLUTION

In accordance with <u>Public Contract Code</u> Sections 20104 20104.6 and other applicable law, public works claims of \$375,000 or less which arise between the Contractor and the Owner shall be resolved under the following the statutory procedure unless the Owner has elected to resolve the dispute pursuant to <u>Public Contract</u> Code Section 10240 et seq.

- a. All claims shall be submitted in writing and accompanied by substantiating documentation. Claims must be filed on or before the date of final payment unless other notice requirements are provided in the contract. "Claim" means a separate demand by the claimant for (1) a time extension, (2) payment of money or damages arising from work done by or on behalf of the claimant and payment of which is not otherwise expressly provided for or the claimant is not otherwise entitled, or (3) an amount the payment of which is disputed by the Owner.
- b. Claims Under \$50,000. The Owner shall respond in writing to the claim within 45 days of receipt of the claim, or, the Owner may request, in writing, within 30 days of receipt of the claim, any additional documentation supporting the claim or relating to defenses or claims the Owner may have. Of additional information is needed thereafter, it shall be provided upon mutual agreement of the Owner and the claimant. The Owner's written response shall be submitted 15 days after receiving the additional documentation, or within the same period of time taken by the claimant to produce the additional information, whichever is greater.
- c. Claims over \$50,000 but less than or equal to \$375,000. The Owner shall respond in writing within 60 days of receipt, or, may request in writing within 30 days of receipt of the claim, any additional documents supporting the claim or relating to defenses or claims the Owner may have against the claimant. If additional information is needed thereafter, it shall be provided pursuant to mutual agreement between the Owner and the claimant. The Owner's response shall be submitted within 30 days after receipt of the further documents, or within the same period of time taken by the claimant to produce the additional information or documents, whichever is greater. The Contractor shall make these records and documents available to the County, State and/or the U.S. Government or their representatives at all reasonable times, without any direct charge.
- d. If the claimant disputes the Owner's response, or if the Owner fails to respond within the statutory time period(s), the claimant may so notify the Owner within 15 days of the receipt of the response or the failure to respond, and demand an informal conference to meet and confer for settlement. Upon such demand, the Owner shall schedule a meet and confer conference within 30 days.
- e. If following the meet and confer conference, the claim or any portion thereof remains in dispute, the claimant may file a claim pursuant to Government Code 900 et seq. and Government Code 910 et seq. For purposes of those provisions, the time within which a claim must be filed shall be tolled from the time the claimant submits the written claim until the time the claim is denied, including any time utilized for the meet and confer conference.
- f. If a civil action is filed to resolve any claim, the provisions of Public Contract Code 20104.4 shall be followed, providing for nonbinding mediation and judicial arbitration.

22.2 CLAIM FORMAT/REQUIREMENTS

b.

- 22.2.1 The Contractor will submit the claim justification in the following format:
 - a. Summary of claim merit and price plus clause under which the claim is made.
 - List of documents relating to claim
 - (a) Specifications
 - (b) Drawings
 - (c) Clarifications (RFIS)
 - (d) Schedules
 - (e) Other
 - c. Chronology of events and correspondence
 - d. Analysis of claim merit
 - e. Analysis of claim cost
 - f. Analysis of Time in CPM format
 - g. Cover letter and certification (form included herein)
- 22.2.2 If any claim submitted includes a request for overhead, the County may request a Profit & Loss statement and supporting documentation from Contractor. If requested, such documentation must be submitted for the County to consider the claim.
- 22.2.3 Submission of a claim, properly certified, with all required supporting documentation, and written rejection or denial of all or part of the claim by County, is a condition precedent to any action, proceeding, litigation, suit, general conditions claim, or demand for arbitration by Contractor.

22.3 NOTICE OF THIRD PARTY CLAIMS

The County shall provide notification to the Contractor within a reasonable time after receipt of any third-party claim relating to the Construction Contract.

DIVISION 01: GENERAL REQUIREMENTS

DIVISION 01: GENERAL REQUIREMENTS

01 1000 SUMMARY

01 1200 Multiple Contract Summary 01 1400 Work Restrictions

01 3000 ADMINISTRATIVE REQUIREMENTS

01 3100 PROJECT MANAGEMENT AND COORDINATION

01 3300 SUBMITTAL PROCEDURES

01 3500 SPECIAL PROCEDURES

01 4000 QUALITY REQUIREMENTS

01 4100 REGULATORY REQUIREMENTS 01 4523 TESTING AND INSPECTION

01 5000 TEMPORARY FACILITIES AND CONTROLS

01 5200 DEMOLITION FACILITIES

01 5600 TEMPORARY BARRIERS AND ENCLOSURES

01 7000 EXECUTION AND CLOSEOUT REQUIREMENTS

01 7400 CLEANING AND WASTE MANAGEMENT

01 7700 CLOSEOUT PROCEDURES

01 7800 CLOSEOUT SUBMITTALS

END OF TABLE OF CONTENTS

SUMMARY OF WORK

1.1 WORK COVERED BY CONTRACT DOCUMENTS

- A. Provisions contained in Division 01 apply to Sections of Divisions 02 Specifications. Instructions contained in Specifications are directed to Contractor. Unless specifically provided otherwise, obligations set forth in Contract Documents are obligations of Contractor.
- B. Contractor shall furnish total labor, materials, equipment, and services necessary to perform The Work in accordance with Contract Documents.
- C. Contractor is responsible for all permits.

MULTIPLE CONTRACT SUMMARY

1.1 SUMMARY OF CONTRACTS

- A. Owner may issue separate contracts for operations scheduled to precede and be substantially completed before beginning of The Work under this Contract.
 - Contractor will be given written notice from such contractors of any revisions to scheduled completion of their work at least 30 days in advance. Owner will reimburse Contractor for expenses incurred by Contractor by failure to be properly notified.
 - 2. Testing and Inspection. See Section 01 4523 "Testing and Inspection" for testing, inspection, special testing, and testing laboratory services for materials, products, and demolition methods:

WORK RESTRICTIONS

1.1 PROJECT CONDITIONS

- A. During demolition period, Contractor will have use of premises for demolition operations. Contractor will ensure that Contractor, its employees, subcontractors, and their employees comply with following requirements:
 - Confine operations to areas within Contract limits shown on Drawings. Do not disturb portions of site beyond Contract limits.
 - 2. Do not allow alcoholic beverages, illegal drugs, or persons under their influence on Project site.
 - 3. Do not allow use of tobacco in any form on Project Site.
 - 4. Do not allow pornographic or other indecent materials on site.
 - 5. Refrain from using profanity or being discourteous or uncivil to others on Project Site or while performing The Work.
 - 6. Wear shirts with sleeves, wear shoes, and refrain from wearing immodest, offensive, or obnoxious clothing, while on Project Site.
 - 7. Do not allow playing of profane and loud music on Project Site.
 - 8. Do not build fires on Project Site.
 - Do not allow weapons on Project Site, except those carried by law enforcement officers or other
 uniformed security personnel who have been retained by Owner or Contractor to provide security
 services.
- B. Do not load or permit any part of the structure to be loaded with a weight that will endanger its safety. Questions of structural loading as part of demolition means and methods shall be addressed by a licensed structural engineer engaged by Contractor, subject to the review by Architect.

PROJECT MANAGEMENT AND COORDINATION

1.1 PROJECT COORDINATION

- A. Project designation for this Project Riverside County 11st Street Jail.
- B. This Project designation will be included on documents generated for Project by Contractor and Subcontractors, or be present on a cover letter accompanying such documents.

1.2 MULTIPLE CONTRACT COORDINATION

- A. Contractor shall be responsible for accurately maintaining and reporting schedule of The Work from Notice to Proceed to date of Substantial Completion.
- B. Contractor shall be responsible for providing Temporary Facilities And Controls for those who perform work on Project from Notice to Proceed to date of Substantial Completion.
- C. Contractor shall be responsible for providing Demolition Waste Management And Disposal services for those who perform work on Project from Notice to Proceed to date of Substantial Completion.
- D. Contractor shall be responsible for Final Cleaning for entire Project.

1.3 PROJECT MEETINGS AND CONFERENCES

A. Pre-demolition Conference:

- 1. Attend pre-demolition conference and organizational meeting scheduled by Architect at Project site or other convenient location.
- 2. Be prepared to discuss items of significance that could affect progress, including such topics as:
 - a. Status of permits.
 - b. Demolition schedule.
 - c. Critical Work sequencing.
 - d. Designation of responsible personnel.
 - e. Procedures for processing interpretations and Modifications.
 - f. Procedures for processing Payment Requests.
 - g. Distribution of Contract Documents.
 - h. Submittal of Product Data, Shop Drawings, Samples, Quality Assurance / Control submittals.
 - i. Security.
 - j. Project cleanup.
 - k. Working hours.
 - Work restrictions.
 - m. Current problems.
 - n. General schedule of inspections by Architect and its consultants.
 - o. General inspection of tests.
- Architect will record minutes of meetings and distribute copies to Owner and Contractor within three working days.

B. Progress Meetings:

- 1. Attend progress meetings at Project site at regularly scheduled intervals determined by Architect, at least once a week minimum.
- Progress meetings will be open to Owner, Architect, Subcontractors, and anyone invited by Owner, Architect, and Contractor.

- 3. Be prepared to discuss items of significance that could affect progress, including following:
 - a. Progress since last meeting.
 - b. Whether Contractor is on schedule.
 - c. Activities required to complete Project within Contract Time.
 - d. Labor and materials provided under separate contracts.
 - e. Off-site fabrication problems.
 - f. Access.
 - g. Site use.
 - h. Temporary facilities and services.
 - i. Hours of work.
 - Hazards and risks.
 - k. Project cleanup.
 - I. Quality and Work standards.
 - m. Status of pending modifications.
 - n. Documentation of information for Payment Requests.
 - o. Maintenance of Project records.
- 4. Architect will prepare minutes of progress meetings and distribute copies of minutes to Owner and Contractor within three working days.

SUBMITTAL PROCEDURES

1.1 GENERAL

- A. Coordinate preparation and processing of submittals with performance of Demolition activities.

 Transmit each submittal sufficiently before performance of related Demolition activities to avoid delay.
 - Allow sufficient review time so work will not be delayed by time required to process submittals, including time for resubmittals.
 - a. Allow 14 days for initial review. Allow additional time if processing must be delayed to allow coordination with subsequent submittals. Architect will promptly advise Contractor when submittal being processed must be delayed for coordination.
 - b. If an intermediate submittal is necessary, process same as initial submittal.
 - c. Allow 7 days for reprocessing each submittal.
 - d. No extension of Contract Time will be authorized because of failure to transmit submittals to Architect in sufficient time before work is to be performed to allow processing.
 - 2. Place permanent label or title block on each submittal for identification. Include name of entity that prepared each submittal on label or title block.
 - a. Provide space approximately 4 by 5 inches on label or beside title block on Shop Drawings to record Contractor's review and approval markings and action taken.
 - b. Include following information on label for processing and recording action taken:
 - 1) Project name.
 - 2) Date.
 - 3) Name and address of Architect.
 - 4) Name and address of Contractor.
 - 5) Name and address of Subcontractor.
 - 6) Name and address of supplier.
 - 7) Name of manufacturer.
 - 8) Number and title of appropriate Specification Section.
 - 9) Drawing number and detail references, as appropriate.
 - 3. Package each submittal appropriately for transmittal and handling. Transmit each submittal from Contractor to Architect using transmittal letter. On transmittal, record relevant information and requests for data. Include Contractor's certification that information complies with Contract Document requirements, or, on form or separate sheet, record deviations from Contract Document requirements, including minor variations and limitations.
 - Submittals received from sources other than Contractor or not marked with Contractor's approval
 will be returned without action.

1.2 SUBMITTAL SCHEDULE

- A. Furnish submittal schedule within 5 days after receipt of Notice to Proceed, listing items specified to be furnished for review to Architect including product data, shop drawings, samples and Informational submittals.
 - 1. Coordinate submittal schedule with Contractor's Demolition schedule.
 - 2. Enclose the following information for each item:
 - a. Scheduled date for first submittal.
 - b. Related Section number.
 - c. Submittal category.
 - d. Name of Subcontractor.
 - e. Description of part of the Work covered.
 - Scheduled date for resubmittal.
 - g. Scheduled date for Architect's final release or approval.
- B. Print and distribute copies to Architect and Owner and post copy in field office. When revisions are made, distribute to same parties and post in same location.
- C. Revise schedule monthly. Send copy of revised schedule to Owner and Architect and post copy in field office.

SPECIAL PROCEDURES

1.1 ACCELERATION OF WORK

- A. Complete The Work in accordance with Demolition Schedule. If Contractor falls behind schedule, take such actions as are necessary, at no additional expense to Owner, to bring progress of The Work back in accordance with schedule.
- B. Owner may request proposal for completion of The Work at date earlier than expiration of Contract Time. Promptly provide requested proposal showing cost of such acceleration of The Work. Consult with Owner and Architect regarding possible options to decrease cost of such acceleration. If Owner determines to order acceleration of The Work, change in Contract Sum and Contract Time resulting from acceleration will be included in a Change Order.

1.2 OWNER'S SAFETY REQUIREMENTS

A. Personal Protection:

- Contractor shall ensure:
 - Positive means of fall protection, such as guardrails system, safety net system, personal fall arrest system, etc, is provided to employees whenever exposed to a fall six feet or more above a lower level.
 - Personnel working on Project shall wear hard hats and safety glasses as required by regulation and hazard.
 - c. Personnel working on Project shall wear long or short sleeve shirts, long pants, and hard-toed boots or other sturdy shoes appropriate to type and phase of work being performed.

B. Contractor Tools And Equipment:

- Contractor shall ensure:
 - a. Tools and equipment are in good working condition, well maintained, and have necessary guards in place.
 - b. Ground Fault Circuit Interrupters (GFCI) is utilized on power cords and tools.
 - Scaffolding and man lifts are in good working condition, erected and maintained as required by governmental regulations.
 - Ladders are in good condition, well maintained, used as specified by Manufacturer, and secured as required.

C. Miscellaneous:

- Contractor shall ensure:
 - a. Protection is provided on protruding rebar and other similar objects.
 - General Contractor Superintendent has completed the OSHA 10-hour Demolition outreach training course or equivalent.
 - c. Implementation and administration of safety program on Project.
 - d. Material Safety Data Sheets (MSDS) are provided for substances or materials for which an MSDS is required by governmental regulations before bringing on site.
 - e. Consistent safety training is provided to employees on Project.
- 2. Report accidents involving injury to employees on Project that require off-site medical treatment to Owner's designated representative.

REGULATORY REQUIREMENTS

1.1 GOVERNING AGENCIES

A. Comply with requirements of all applicable governing agencies.

TESTING AND INSPECTING SERVICES BY OWNER

PART 1 - GENERAL

1.1 RELATED DOCUMENTS

A. Drawings and general provisions of the Contract, including General Conditions and Division 01 Specification Sections, apply to this Section.

1.2 SUMMARY

- A. This Section includes testing, inspections, special testing, special inspections, and testing laboratory services for materials, products, and Demolition methods as specified hereafter for the work.
- B. Specified tests, inspections, and related actions do not limit Contractor's quality control procedures to fully comply with the Contract Document requirements in all regards.
- C. Costs: Except for independent testing performed by the contractor the costs of testing listed in the Demolition documents and inspections will be paid by the Owner.
 - 1. If initial tests indicate non-compliance with contract document requirements, any subsequent testing shall be performed by the same testing agency and paid for by the Contractor.
- D. Schedule portions of the work requiring testing and inspections services so as to be continuous and as brief as possible.
- E. Related Requirements:
 - Section 01 4000: "Quality Requirements" includes administrative and procedural requirements for quality assurance and quality control.
 - 2. Divisions 02 thru 49 establish responsibility for providing specific testing and inspections establish responsibility for providing specific testing and inspections.

1.3 REFERENCES

- A. Reference Standards:
 - 1. American Concrete Institute:
 - a. ACI 301-05, 'Specification for Structural Concrete.'
 - b. ACI 318-08, 'Building Code Requirements for Structural Concrete and Commentary.'
 - ASTM International (Following are specifically referenced for Testing Agencies):
 - ASTM C1021-08, 'Standard Practice for Laboratories Engaged in Testing of Building Sealants.'
 - b. ASTM C1077-08a, 'Standard Practice for Laboratories Testing Concrete and Concrete Aggregates for Use in Demolition and Criteria for Laboratory Evaluation.'
 - c. ASTM C1093-08, 'Standard Practice for Accreditation of Testing Agencies for Masonry.
 - d. ASTM D3666-07ae1, 'Standard Specification for Minimum Requirements for Agencies Testing and Inspecting Road and Paving Materials.'
 - e. ASTM D3740-08, 'Standard Practice for Minimum Requirements for Agencies Engaged in Testing and/or Inspection of Soil and Rock as Used in Engineering Design and Demolition.'
 - f. ASTM E329-08: 'Standard Specification for Agencies Engaged in Demolition Inspection and/or Testing.'
 - g. ASTM E543-08a, 'Standard Specification for Agencies Performing Nondestructive Testing.'
 - ASTM E1212-04(2008), 'Standard Practice for Quality Management Systems for Nondestructive Testing Agencies.'
 - ASTM International (Following are specifically referenced for Concrete testing):

- a. ASTM C31 / C31M-08b, 'Standard Practice for Making and Curing Concrete Test Specimens in the Field.'
- b. ASTM C33 / C33M-08, 'Standard Specification for Concrete Aggregates.'
- c. ASTM C39 / C39M-05e2, 'Standard Test Method for Compressive Strength of Cylindrical Concrete Specimens.'
- d. ASTM C42 / C42M-04, 'Standard Test Method for Obtaining and Testing Drilled Cores and Sawed Beams of Concrete.'
- e. ASTM C94 / C94M-09, 'Standard Specification for Ready-Mixed Concrete.'
- f. ASTM C143 / C143M-08, 'Standard Test Method for Slump of Hydraulic-Cement Concrete.'
- g. ASTM C172-08, 'Standard Practice for Sampling Freshly Mixed Concrete.'
- ASTM C173 / C173M-08a, 'Standard Test Method for Air Content of Freshly Mixed Concrete by the Volumetric Method.'
- ASTM C192 / C192M-07, 'Standard Practice for Making and Curing Concrete Test Specimens in the Laboratory.'
- ASTM C231-08c, 'Standard Test Method for Air Content of Freshly Mixed Concrete by the Pressure Method.'
- k. ASTM C567-05a, 'Standard Test Method for Determining Density of Structural Lightweight Concrete.'
- ASTM C597-02, 'Standard Test Method for Pulse Velocity Through Concrete.'
- m. ASTM C803 / C803M-03, 'Standard Test Method for Penetration Resistance of Hardened Concrete.'
- ASTM C805 / C805M-08, 'Standard Test Method for Rebound Number of Hardened Concrete.'
- ASTM International (Following are specifically referenced for grout testing):
 - a. ASTM C1019-09, 'Standard Test Method for Sampling and Testing Grout.'
- ASTM International (Following are specifically referenced for Reinforcing Steel testing):
 - a. ASTM A615 / A615M-08b, 'Standard Specification for Deformed and Plain Carbon-Steel Bars for Concrete Reinforcement.'
- Code of Federal Regulations:
 - a. 29 CFR 1910, Subpart A, Section 1910.7, 'Definition and Requirements for a Nationally Recognized Testing Laboratory.'

1.4 DEFINITIONS

- A. Accreditation: Process in which certification of competency, authority, or credibility is presented. Verify that laboratories have an appropriate quality management system and can properly perform certain test methods (e.g., ANSI, ASTM, and ISO test methods) and calibration parameters according to their scopes of accreditation.
- B. Field Quality Assurance: Testing, Inspections, Special Testing and Special Inspections provided for by the Owner.
- C. Field Quality Control: Testing, Inspections, Special Testing and Special Inspections provided for by the Contractor.
- D. Inspection/Special Inspection: Inspection of the materials, installation, fabrication, erection or placement of components and connections requiring special expertise to ensure compliance with approved Demolition documents and referenced standards. An inspection is not required by code provisions but may be required by the contract documents. A special inspection is required by code provisions and by the contract documents.
 - 1. Inspection-Continuous: The full-time observation of work requiring inspection by an approved inspector who is present in the area where the work is being performed.
 - 2. Inspection-Periodic: The part-time or intermittent observation of work requiring inspection by an approved inspector who is present in the area where the work has been or is being performed and at the completion of the work.
- E. Installer/Applicator/Erector: Contractor or another entity engaged by Contractor as an employee, Subcontractor, or Sub-subcontractor, to perform a particular Demolition operation, including installation, erection, application, and similar operations.

- F. Using a term such as "carpentry" does not imply that certain Demolition activities must be performed by accredited or unionized individuals of a corresponding generic name, such as "carpenter." It also does not imply that requirements specified apply exclusively to tradespeople of the corresponding generic name.
- G. Mockups: Full-size, physical assemblies that are constructed on-site. Mockups are used to verify selections made under sample submittals, to demonstrate aesthetic effects and, where indicated, qualities of materials and execution, and to review Demolition, coordination, testing, or operation. They are not samples. Approved mockups establish the standard by which the Work will be judged.
- H. PreDemolition Testing: Tests and inspections that are performed specifically for the Project before products and materials are incorporated into the Work to verify performance or compliance with specified criteria.
- Product Testing: Tests and inspections that are performed by an NRTL, an NVLAP, or a testing agency qualified to conduct product testing and acceptable to authorities having jurisdiction, to establish product performance and compliance with industry standards.
- J. Relative Compaction: Ratio of field dry density as determined by ASTM D6938 or ASTM D2216, and laboratory maximum dry density as determined by ASTM D1557.
- K. Service Provider: An agency or firm qualified to inspect structural elements and perform field and laboratory tests to determine the characteristics and quality of building materials and workmanship.
- L. Source Quality Control Testing: Tests and inspections that are performed at the source, i.e., plant, mill, factory, or shop.
- M. Special Inspector: The licensed individual or firm that implements the special inspection program for the project.
- N. Structural Observation: The visual observation of the structural system by a registered design professional for general conformance to the approved Demolition documents at significant Demolition stages and at completion of the structural system. Structural observation does not include or waive the responsibility for performing inspections or special inspections.
- O. Testing Agency: An entity engaged to perform specific tests, inspections, or both.
- P. Test/Special Test: Field or laboratory tests to determine the characteristics and quality of building materials and workmanship. A test is not required by code provisions but may be required by the contract documents. A special test is required by code provisions and by the contract documents.
- Q. Testing Laboratory: An agency or firm qualified to perform field and laboratory tests to determine the characteristics and quality of building materials and workmanship.
- R. Verification: Act of reviewing, inspecting, testing, etc. to establish and document that a product, service, or system meets the regulatory, standard, or specification requirements.

1.5 SUBMITTALS

- A. Testing Agency will be contracted by owner and will submit certified written report of each inspection, test, or similar service.
- B. Testing Agency shall submit the following:
 - 1. The qualifications of the Testing Agency management and personnel designated to the project.
 - The Testing Agency "Written Practice for Quality Assurance."
 - Qualification records for Inspector and NDT technicians designated for the project.
 - The Testing Agency NDT procedures, equipment calibration records, and personnel training records.
 - 5. The Testing Agency Quality Control Plan for the monitoring and control of the testing operations.

- C. Test and Inspection Agency Reports: The Testing Agency or Agencies will prepare logs, test reports, and certificates applicable to specific tests and inspections and deliver copies (or electronic record) distributed as follows:
 - 1. 1 copy to the Owner.
 - 2. 1 copy to the Architect.
 - 3. 1 copy to the Consulting Engineers.
 - 4. 1 copy to the General Contractor.
 - Submit additional copies of each written report directly to governing authority, when authority so directs.
- D. Other tests, certificates, and similar documents shall be obtained by the Contractor and delivered to the Owner's Representative and Architect in such time as not to delay progress of the work or final payment therefore.
- E. Additional submittal requirements are specified in individual Sections.

1.6 QUALITY ASSURANCE

- A. In addition to the Contractor's obligations for testing and inspections, the Owner or Owner's designated representative(s) may perform quality assurance. Owner's quality assurance procedures may include observations, inspections, testing, verification, monitoring and any other procedures deemed necessary by the Owner to verify compliance with the Contract Documents.
- B. The Contractor shall cooperate with and provide assistance to the Owner related to Owner's quality assurance procedures. Contractor shall provide to Owner ladders, lifts, scaffolds, lighting, protection, safety equipment and any other devices and/or equipment (including operators if required) deemed necessary by the Owner to access the Work for observation/inspection.
- C. In addition to the Contractor's obligations for testing and inspections, the Owner may employ independent Testing Agencies to perform certain specified testing, as Owner deems necessary. The Contractor shall integrate Owner's independent Testing Agency services within the Baseline Project Schedule and with other Project activities.
- D. Owner's employment of an independent Testing Agency does not relieve the Contractor of the Contractor's obligation to perform testing required by code or this document, nor does it relieve the contractor of the Contractor's obligation to perform the Work in strict accordance with requirements of the Contract Documents.
- E. Certification: Product producers and associations, which have instituted approved systems of quality control and which have been approved by document approval agencies, are not required to have further testing. Concrete mixing plants, plants producing fabricated concrete and wood or plywood products certified by the agency, lumber, plywood grade marked by approved associates, and materials or equipment bearing underwriters' laboratory labels require no further testing and inspection.
- F. Written Practice for Quality Assurance: The Testing Agency shall maintain a written practice for the selection and administration of inspection personnel, describing the training, experience, and examination requirements for qualification and certification of inspection personnel. The written practice shall describe the testing agency procedures for determining the acceptability of the structure in accordance with the applicable codes, standards, and specifications. The written practice shall describe the Testing Agency inspection procedures, including general inspection, material controls, visual welding inspection, and bolting inspection.
- G. Inspector Qualifications: All inspectors shall be trained and competent in accordance with the quality assurance plan.

1.7 QUALITY CONTROL

- A. Quality Control shall be the sole responsibility of the Contractor. The Contractor shall be responsible for all testing, coordination, start-up, operational checkout, and commissioning of all items of Work included in the Project. All costs for these services shall be included in the Contractor's cost of work.
- B. The Contractor shall assign one employee to be responsible for Quality Control. This individual may have other responsibilities, but may not be the Contractor's Project superintendent or the Contractor's Project manager.

1.8 CONTRACTOR'S RESPONSIBILITY

- A. Access: Furnish free access to the various parts of the work and assist testing and inspection personnel in the performance of their duties at no additional cost to the Owner.
- B. Comply: Upon completion of inspection, testing, sample-taking, and similar services, repair damaged Demolition and restore substrates and finishes to eliminate deficiencies, including deficiencies in visual qualities of exposed finishes. Comply with Contract Documents in making such repairs.

C. Cooperate:

- Cooperate with agencies performing required inspections, tests, and similar services and provide reasonable auxiliary services as requested. Notify Testing Agency before operations to allow assignment of personnel. Auxiliary services required include but are not limited to:
 - Providing access to the Work and furnishing incidental labor and facilities necessary to facilitate inspections and tests.
 - b. Taking adequate quantities of representative samples of materials that require testing or helping Testing Agency in taking samples.
 - Providing facilities for storage and curing of test samples, and delivery of samples to testing laboratories.
 - d. Providing Testing Agency with preliminary design mix proposed for use for materials mixes that require control by Testing Agency.
 - e. Furnish notice to Owner's Representative and/or Architect and Testing Agency not less than 24 hours (or as otherwise noted) prior to any time required for such services.

D. Coordination:

- Contractor and each agency engaged to do inspections, tests, and similar services will coordinate sequence of activities to accommodate required services with minimum of delay.
- Contractor and each agency will coordinate activities to avoid necessity of removing and replacing Demolition to accommodate inspections and tests.
- Coordinate quality control activities to avoid delay and to eliminate any need to uncover work for testing or inspection.
- E. Data: Furnish records, drawings, certificates, and similar data as may be required by the testing and inspection personnel to assure compliance with the contract documents.
- F. Defective Work (Non-Conforming Work): Non-conforming work as covered in the General Conditions applies, but is not limited to the following:
 - Where results of inspections, tests, or similar services show that the Work does not comply with Contract Document requirements, correct the deficiencies in the Work.
 - 2. Remove and replace any work found defective or not complying with contract document requirements at no additional cost to the Owner.
 - 3. Where testing personnel take cores or cut-outs to verify compliance, repair prior to acceptance.
 - The Contractor shall be responsible for any and all costs incurred resulting from inspection that
 was scheduled prematurely or retesting due to failed tests.
- G. Concrete: If test cylinders for concrete fail to meet design requirements, provide additional tests as may be directed by Owner's Representative and/or Architect. Make core tests in accordance with ASTM C42 and load tests in accordance with ACI 318. Correct all deficiencies found in forms, reinforcing steel, and embedded objects.

H. Protection:

- 1. Protect Demolition exposed by or for quality assurance and quality control service activities, and protect repaired Demolition.
- I. Repair: Repair and protection is Contractor's responsibility, regardless of who caused the inspection, testing, or similar services.
- J. Scheduling: Contractor is responsible for scheduling times for inspections, tests, taking samples, and similar activities.
- K. Structural Steel: Should any weld or structural connection fail to meet design requirements, provide additional testing for structural connections as directed by Owner's Representative and/or Architect or Structural Engineer. Replace or repair all defective connections as directed.

1.9 TESTING AGENCY SERVICES

- A. Testing Agency, including independent testing laboratories, shall be licensed and authorized to operate in the jurisdiction in which Project is located.
 - Testing Agency Qualifications: An NRTL, an NVLAP, or an independent Testing Agency with the experience and capability to conduct testing and inspecting indicated, as documented according to ASTM E329.
 - Nationally Recognized Testing Laboratory (NRTL): Nationally recognized testing laboratory according to 29 CFR 1910.7.
 - b. National Voluntary Laboratory (NVLAP): Testing Agency accredited according to National Institute of Standards and Technology (NIST) Accreditation Program.

B. Duties of Testing Agency:

- Independent Testing Agency engaged to perform inspections, sampling, and testing of materials and Demolition specified in individual specification Sections will cooperate with Architect and Contractor in performance of its duties and will provide qualified personnel to perform required inspections and tests.
- Testing Agency will notify Architect and Contractor promptly of irregularities or deficiencies observed in the Work during performance of its services.
- 3. Testing Agency shall test or obtain certificates of tests of materials and methods of Demolition, as described herein or elsewhere in the technical specification.
- 4. Testing Agency shall provide the management, personnel, equipment, and services necessary to perform the testing functions as outlined in this section.
- Testing Agency must have the experience and capability to conduct testing and inspecting indicated by ASTM standards and that specializes in the types of tests and inspections to be performed.
- Testing Agency shall comply with requirements of ASTM E329, ASTM E543, ASTM C1021, ASTM C1077, ASTM C1093, ASTM D3666, ASTM D3740, and other relevant ASTM standards.
- Testing Agency must calibrate all testing equipment at reasonable intervals (minimum yearly) with accuracy traceable to either National Bureau of Standards or accepted values of natural physical constants.
- C. Inspection Services: Testing Agency will have full authority to see that the work is performed in strict accordance with requirements of the contract documents and the directions of the Owner's Representative and/or Architect.
- D. Welding Procedure Review: Testing Agency shall provide a review and approval or rejection of all welding procedures to be used and shall verify compliance with all reference standard requirements.

1.10 TESTS AND INSPECTION REPORTS

A. The Contractor shall provide a system of tracking all field reports, describing items noted, and resolution of each item. The Owner's Representative will review this printed report on a monthly basis, or as necessary.

- B. Laboratory Reports: Furnish reports of materials and Demolition as required, including:
 - 1. Description of method of test.
 - Identification of sample and portion of the work tested.
 - Description of location in the work of the sample.
 - b. Time and date when sample was obtained.
 - c. Weather and climatic conditions at time when sample was obtained.
 - 3. Evaluation of results of tests including recommendations for action.
- C. Inspection Reports: Furnish "Inspection at Site" reports for each site visit documenting activities, observations, and inspections. Include notation of weather and climatic conditions, time and date conditions and status of the work, actions taken, and recommendations or evaluation of work.

1.11 REPORTING TEST FAILURES

A. Immediately upon inspector's determination of a test failure, the inspector shall telephone results to the Contractor, Owner's Representative, and Architect. On the same day, the inspector shall distribute written test results.

1.12 TESTING

- A. Testing will be performed by an independent entity and will be arranged and paid for by the Contractor. Should the test return unacceptable results, the Contractor shall bear all costs of retesting and reinspection as well as the cost of all material consumed by testing, and replacement of unsatisfactory material and/or workmanship.
- B. The Owner may engage additional consultants for special services. The activities of any such Owner consultants are in addition to Contractor testing of materials or systems necessary to prove that performance is in compliance with Contract requirements. The Contractor must cooperate with persons and firms engaged in these activities.

1.13 INSPECTIONS

- A. All of the Work is subject to inspection and verification of correct operation prior to 100% payment of the line item(s) pertaining to that aspect of the Work.
- B. The Contractor shall incorporate adequate time for performance of all inspections and correction of noted deficiencies into the Work Progress Schedule for the Project.
- C. During the course of Demolition, the Owner, Architect, Engineer, or other Owner's Representatives may visit the Site for observation of the Work in place. The Contractor shall provide all necessary personnel and/or equipment for safe access to the Work to be inspected or observed, regardless of frequency. This requirement shall extend to all Owner personnel and their representatives. Some of these inspections will be informal and some will require formal notification by the Contractor.
- D. The Contractor shall perform a thorough checkout of operations with the manufacturer's representatives prior to requesting the formal inspection by the Owner. Contractor must notify the Owner's Representative, in advance, as to when the manufacturer's representative is scheduled to arrive at the Site.
- E. Inspection and documented approval of individual equipment and/or system(s) must be accomplished prior to requesting Substantial Completion Inspection for any area affected by said equipment and/or system.
- F. For any requested inspection, the Contractor shall complete prior inspections to ensure that items are ready for inspection.
- G. For "building-wide" and/or life safety systems, such as emergency lighting, emergency power uninterruptible power supply systems, fire alarm, fire sprinkler systems, smoke evacuation systems,

toxic gas monitoring, capturer exhaust systems, etc. the formal start-up inspection shall be completed prior to requesting Substantial Completion Inspection for any area of the Project:

- The manufacturer's representatives and the installing contractor shall demonstrate both operation
 and compliance to the Owner's agents and consultants. If coordinated and scheduled
 appropriately by the Contractor, these equipment and/or systems inspections may also serve to
 provide the required Owner training, if approved in advance by the Owner.
- The Contractor is responsible for requesting that the Owner's Representative and/or Architect/Engineer to observe materials, equipment, and Work prior to assembly or enclosure that would make the materials, equipment, or Work inaccessible for inspection and at other times as may be required.
- H. The Contractor shall coordinate the Work and schedule the inspections in advance so as not to delay the Work. All major inspections shall be indicated on the Work Progress Schedule for advance planning. Contractor shall allow a minimum of five (5) calendar days to confirm schedule of requested inspections with Owner and Owner's Representatives.

1.14 TESTS AND INSPECTION

- A. Drill-In Mechanical Anchors / Adhesive Anchors / Screw Anchors:
 - Testing Agency shall verify procedures used for installation of all concrete anchors and monitor their installation for compliance with manufacturer's requirements
 - b. Testing: Ten percent (10%) of each type and size of drilled-in anchor shall be proof loaded by Testing Agency's testing laboratory. Adhesive anchors will not be torque tested unless otherwise directed by Architect. If more than 10 percent of tested anchors fail to achieve specified torque or proof load within limits defined on Drawings, all anchors of same diameter and type as failed anchors shall be tested at Contractors expense, unless otherwise instructed by Architect.
 - Torque will be applied with calibrated torque wrench.
 - 2) Proof loads will be applied with calibrated hydraulic ram. Displacement of adhesive anchors at proof load shall not exceed D/10, where D is nominal anchor diameter.
- B. Headed Concrete Anchor Studs / Deformed Bar Anchors:
 - 1. Testing Agency shall be provided for the shop and field installation of all shear stud connectors in accordance with ANSI / AWS D1.1. In addition, where the rejection rate for any welder exceeds 5 percent, each stud welded by that welder shall be struck twice by a hammer with a force sufficient to indicate whether or not a quality weld has been obtained. This hammer test is in addition to the two 30 degree bend tests required by ANSI / AWS D1.1.
 - a. Visual inspection shall be done after ferrule removal.
 - b. The inspector shall also check for plumbness, dimensions, and other requirement, including required stud layout patterns, and when welding is through steel deck, that fusion is complete between studs and underlying beams.
 - Certification of the stud base qualification by manufacturer per ANSI / AWS D1.1 shall be supplied to the inspector.

PART 2 - PRODUCTS Not Used

PART 3 - EXECUTION Not Used

DEMOLITION FACILITIES

1.1 ADMINISTRATIVE REQUIREMENTS

- A. Prepare schedule indicating dates for implementation and termination of each temporary facility.
- B. Keep temporary facilities clean and neat in appearance. Operate in safe and efficient manner. Take necessary fire prevention measures. Do not overload facilities, or allow them to interfere with progress of The Work. Do not allow hazardous, dangerous or unsanitary conditions, or public nuisances to develop or persist on Project site.
- C. Maintain facilities in good operating condition until removal.
- D. Remove each temporary facility when need has ended, or when replaced by authorized use of permanent facility, or by Substantial Completion. Complete permanent Demolition that may have been delayed because of interference with temporary facility. Repair damaged work, clean exposed surfaces, and replace Demolition that cannot be satisfactorily repaired.
 - 1. Materials and facilities that make up temporary facilities are property of Contractor.
 - 2. By Substantial Completion, clean and renovate permanent facilities used during Demolition period.

1.2 SANITARY FACILITIES

A. Provide temporary sanitary toilet. Service and maintain temporary toilet in a clean, sanitary condition.

TEMPORARY BARRIERS AND ENCLOSURES

1.1 GENERAL

- A. Protection Of Existing Improvements: Protect streets, private roads, and sidewalks, including overhead protection where required. Repair damage to existing improvements caused by demolition activities.
- B. Protection Of Adjacent Property: Provide necessary protection for adjacent property and lateral support thereof.
- C. See Demolition section for additional requirements.

1.2 TEMPORARY BARRICADES

- A. Comply with standards and code requirements in erecting barricades, warning signs, and lights.
- B. Take necessary precautions to protect persons, including members of the public, from injury or harm.

1.3 TEMPORARY FENCING

A. Before demolition begins, install 6 foot high enclosure fence with lockable entrance gates. Enclose contract area to accommodate demolition operations.

1.4 TEMPORARY SECURITY BARRIERS

- A. Install temporary enclosures of partially completed areas of demolition. Provide locking entrances to prevent unauthorized entrance, vandalism, theft, and other violations of security.
- B. Secure materials and equipment stored on site.
- C. Maintain exterior building security until Substantial Completion
- D. Secure building at the end of each work day.

CLEANING AND WASTE MANAGEMENT

1.1 PROGRESS CLEANING

- A. Comply with regulations of authorities having jurisdiction and safety standards for cleaning.
- B. Keep premises broom clean during progress of the Work.
- C. Keep site and adjoining streets reasonably clean. If necessary, sprinkle rubbish and debris with water to suppress dust.
- D. Waste Management And Disposal:
 - Remove waste materials and rubbish caused by employees, Subcontractors, and contractors under separate contract with Owner and dispose of legally. Remove unsuitable or damaged materials and debris from building and from property.
 - a. Provide adequate waste receptacles and dispose of materials when full.
 - b. Properly store volatile waste and remove daily.
 - c. Do not deposit waste into storm drains, sanitary sewers, streams, or waterways. Do not discharge volatile, harmful, or dangerous materials into drainage systems.
 - Do not burn waste materials or build fires on site. Do not bury debris or excess materials on Owner's property.

1.2 FINAL CLEANING

A. Immediately before Substantial Completion, thoroughly clean area where The Work was performed. Remove all rubbish from under and about area and leave Project Site ready for acceptance by Owner.

CLOSEOUT PROCEDURES

1.1 GENERAL:

- A. Schedule closeout procedures in the four weeks before expiration of Contract Time. Weeks will be marked by three Architect's weekly visits before Final Closeout Review and expiration of Contract Time.
- B. Date of Substantial Completion shall fall within week between Architect's final weekly visit and Final Closeout Review. Date of Substantial Completion shall not occur until Demolition Schedule shows completion of demolition work, unless agreed to by Architect and included on Certificate of Substantial Completion.

1.2 PRELIMINARY CLOSEOUT REVIEWS

- Confirm with Architect when Substantial Completion of The Work will be achieved.
 - Final three Architect's weekly visits will serve as Preliminary Closeout Reviews to determine if Final Closeout Review will occur as scheduled and that Substantial Completion of the Work will be achieved by that date.
 - By final weekly Architect visit, notify Owner and Architect of date when Substantial Completion of The Work will be achieved.
- B. Arrange with Architect date for Final Closeout Review to confirm Substantial Completion.

1.3 CLOSEOUT REQUIREMENTS

- A. Before Final Closeout Review:
 - Discontinue or change over and remove temporary facilities from site, along with demolition tools, mock-ups, and similar elements.
 - Complete final cleaning requirements.

1.4 FINAL CLOSEOUT REVIEW

- A. Participate in Final Closeout Review.
- B. When Owner and Architect have confirmed that Contractor has achieved Substantial Completion of The Work, Owner, Architect, and Contractor will execute Certificate of Substantial Completion that contains:
 - 1. Date of Substantial Completion.
 - 2. Punch List of Work not yet accepted.
 - 3. Amount to be withheld for completion of Punch List work.
 - 4. Time period for completion of Punch List work.
 - 5. Amount of liquidated damages set forth in Supplementary Conditions to be assessed if Contractor fails to complete Punch List work within time set forth in Certificate.
- C. Final Acceptance Conference:
 - 1. Notify Architect in writing when work on Punch List has been completed.
 - 2. Arrange with Architect date and time for Final Acceptance Conference.
 - When Owner and Architect have confirmed that Contractor has completed Punch List work, Architect will issue letter to Owner authorizing final payment.

CLOSEOUT SUBMITTALS

1.1 GENERAL

A. Releases enabling Owner unrestricted use of The Work.

1.2 PROJECT RECORD DOCUMENTS

- A. Do not use record documents for construction purposes. Protect from deterioration and loss in secure, fire-resistive location. Provide access to record documents for Architect's reference during normal working hours.
- B. Maintain clean, undamaged set of Drawings. Mark set to show utility termination points and work that varies from the Work as originally shown. Give particular attention to concealed elements that would be difficult to measure and record at a later date.
 - Mark record sets with red erasable pencil. Use other colors to distinguish between variations in separate categories of the Work.
 - Mark new information that is important to Owner, but was not shown on Drawings.
 - 3. Note related Change Order numbers where applicable.

DIVISION 02: EXISTING CONDITIONS

02 4000 DEMOLITION AND STRUCTURE MOVING

02 4119 SELECTIVE STRUCTURE DEMOLITION

END OF TABLE OF CONTENTS

SECTION 02 4119

DEMOLITION

PART 1 - GENERAL

1.1 SUMMARY

- A. Includes But Not Limited To:
 - Labor, materials, tools, equipment, transportation and any incidental work necessary to complete
 the demolition and removal of all building elements, capping utilities, protection of adjacent
 building, walks, streets, and infrastructure, back filling the basement level, leaving the site level
 with adjacent walks and finished with 4" of decomposed granite.
 - Building elements include but are not limited to: roofs, walls, columns, slabs, footings, electrical systems, mechanical systems, underground utilities, common stairways, bridges, tunnels and other substructures.
 - The County will cut and cap all utilities servicing the Old Jail building flush along the existing side of the Courthouse building prior to start of building demolition.
 - No hydraulic pneumatic equipment that generates vibration, high pitched noise or any other disturbance that could be disruptive to on going City activities may be used during normal working hours.

1.2 ADMINISTRATIVE REQUIREMENTS

- A. Pre-demolition Conference: Before beginning Demolition work, in addition to requirements of Section 01 3100, meet on site to confirm work to be demolished, items to be salvaged or reused, and coordination with Owner.
- B. Scheduling: Indicate detailed sequence of demolition and removal work, with starting and ending dates for each activity, on Schedule specified in Section 01 3200.
- C. Storage or sale of removed items or materials will not be permitted on-site.
- D. Coordinate truck routing and timing with the City of Riverside
- E. Obtain and pay for appropriate permits prior to start of work.

1.3 SUBMITTALS

- A. Work plan including
 - 1. Work schedule in MS Project or similar Critical Path Method Software
 - 2. List of demolition equipment to be used, schedule of employment and the quantity of each.
 - 3. Means of controlling dust and debris
- B. City approved haul route and schedule.
- C. Shoring/bracing design and materials for, adjacent structures, basement walls that will retain streets and sidewalks and the north and west walls that will retain the back fill material.
- D. Pedestrian protection system
- E. Traffic control plan
- F. System for protecting adjacent buildings

G. Erosion control and, Storm Water Pollution Prevention Plan

1.4 QUALITY ASSURANCE

- A. Regulatory Requirements: Comply with governing EPA notification regulations before beginning selective demolition. Comply with hauling and disposal regulations of authorities having jurisdiction.
- B. Standards: Comply with ANSI A10.6 and NFPA 241.

1.5 FIELD CONDITIONS

- A. Conditions existing at time of inspection for bidding purpose will be maintained by Owner as far as practical.
- B. EDA will provide a lay down area in the cul-de-sac immediately south of the jail.

PART 2 - PRODUCTS: Not Used

PART 3 - EXECUTION

3.1 EXAMINATION

- A. Hazardous Materials:
 - 1. It is not expected that hazardous materials will be encountered in the Work. Identified hazardous materials will be removed by Owner before start of the Work.
 - 2. If materials suspected of containing hazardous materials are encountered, do not disturb and immediately notify Architect.
- B. Survey existing conditions and correlate with requirements indicated to determine extent of selective demolition required. Notify Architect of discrepancies between existing conditions and Drawings before proceeding with selective demolition.
- C. Inventory and record condition with dated digital photographs of items in close proximity to the work that will remain.
- D. When unanticipated mechanical, electrical, or structural elements that conflict with intended function or design are encountered, investigate and measure nature and extent of conflict. Promptly submit written report to Architect.
- E. If necessary, engage a professional engineer at the expense of the contractor to survey condition of building to determine whether removing any element might result in structural deficiency or unplanned collapse of any portion of structure or adjacent structures during selective demolition operations.
- F. Perform surveys as the Work progresses to detect hazards resulting from selective demolition activities.

3.2 PREPARATION

- A. Temporary Facilities:
 - 1. Provide temporary barricades and other protection required to prevent injury to people and damage to adjacent buildings and facilities to remain.
 - 2. Maintain fire-protection facilities as required by local fire authority.
- B. Temporary Shoring: Provide and maintain shoring, bracing, and structural supports as required to preserve stability and prevent movement, settlement, or collapse of construction and finishes to remain, and to prevent unexpected or uncontrolled movement or collapse of construction being demolished. Strengthen or add new supports when required during progress of selective demolition.
- C. Contractor shall construct a barrier around building's exterior throughout the demolition process. To prevent dust and debris from leaving the site
- D. Protection
 - 1. Protect traffic and pedestrians throughout the course of the project
 - a. Coordinate protection measures with the City of Riverside and other applicable agencies.
 - Erect and maintain a six-foot high construction fence with screens along the perimeter of the demolition area.

E.

- F. Utility Services:
 - Existing Services/Systems: Maintain services/systems that serve adjacent buildings and protect them against damage during selective demolition operations.
 - 2. Service/System Requirements: Locate, identify, disconnect, and seal or cap off indicated utility services and mechanical/electrical systems serving areas to be selectively demolished.
 - a. Arrange to shut off indicated utilities with utility companies.
 - b. If services/systems are required to be removed, relocated, or abandoned, before proceeding with selective demolition, provide temporary services/systems that bypass area of selective demolition and that maintain continuity of services/systems to other parts of building.

3.3 RESTRICTIONS

- A. Demolition activities must not disturb the adjacent courthouse.
- B. Work shall be carried out during off hours when court is not in session. Working hours are limited to 9:00 PM to 5:00 AM Monday through Friday.
- C. Noise will not be permitted during regular business hours.
- D. All work must be performed within buildings footprint to prevent interruption in traffic flow and parking.
- E. The existing courthouse will be in operation though the duration of the project.
 - 1. Contractor can not disturb ongoing operations.
 - The exiting alley to the west of the structure must remain open for deliveries to the courthouse courtward.
 - 3. A path of travel for deliveries must remain open at all times within the staging area on 11th street.
- F. Erosion Control Maintain erosion control and SWPPP throughout the project and prevent any sediment from entering catch basins or onto public right of ways.
 - 1. Prepare plan and obtain approval from applicable agencies prior to commencement of work.

3.4 DEMOLITION

A. General:

- Conduct demolition and debris-removal operations to ensure minimum interference with roads, streets, walks, walkways, and other adjacent occupied and used facilities.
- 2. Use methods required to complete the Work within limitations of governing regulations.

B. Requirements

- Neatly cut openings and holes plumb, square, and true to dimensions required. Use cutting
 methods least likely to damage construction to remain or adjoining construction. Use hand tools
 or small power tools designed for sawing or grinding, not hammering and chopping, to minimize
 disturbance of adjacent surfaces. It is preferred that any building elements connecting to the
 Courthouse be removed flush with the exterior surface of the Courthouse if possible. If not
 possible, plus or minus one inch will be acceptable.
- Permanently seal openings to Historic Courthouse prior to demolition operations. Temporarily cover openings to remain.
- Cut or drill from the exposed or finished side into concealed surfaces to avoid marring existing finished surfaces.
- 4. Do not use cutting torches until work area is cleared of flammable materials. At concealed spaces, such as duct and pipe interiors, verify condition and contents of hidden space before starting flame-cutting operations. Maintain fire watch and portable fire-suppression devices during flame-cutting operations.
- 5. Maintain adequate ventilation when using cutting torches
- 6. Remove structural framing members and lower to ground by method suitable to avoid free fall and to prevent ground impact or dust generation.
- Locate demolition equipment and remove debris and materials so as not to impose excessive loads on supporting walls, floors, or framing.
- 8. Dispose of demolished items and materials promptly.
- 9. Protect basement walls in place
- 10. Remove main floor, provide shoring of existing sidewalks and structures. Provide methods and procedures for approval prior to start.
- 11. Cut and separate common passage ways, pipes, and electrical systems from adjacent building
- 12. Protect and cover courthouse air intake systems from dust and debris on a daily bases. Covers must be removed prior to end of shift for regular operation
- 13. Scaffolding with green screen for the entire building should be maintained by Contractor.

3.5 CLEANING

- A. Disposal Of Demolished Materials:
 - 1. Remove demolished materials from Project site and legally dispose of them in an EPA-approved landfill. Do not burn demolished materials.
 - a. Do not allow demolished materials to accumulate on-site.
 - Remove and transport debris in a manner that will prevent spillage on adjacent surfaces and areas.
 - c. Remove debris from elevated portions of building by chute, hoist, or other device that will convey debris to grade level in a controlled descent.
- B. Clean adjacent structures and improvements of dust, dirt, and debris caused by selective demolition operations. Return adjacent areas to condition existing before selective demolition operations began.
- C. Adhere to General Contractor's requirements for Construction Waste Management. All debris and rubbish must be recorded but weight or volume (as directed) and disposed of or recycled strictly as directed by the General Contractor.

DIVISION 03: CONCRETE

03 1000 CONCRETE FORMING AND ACCESSORIES

03 1511 CONCRETE ANCHORS AND INSERTS

03 2000 CONCRETE REINFORCING

03 2100 REINFORCING STEEL

03 3000 CAST-IN-PLACE CONCRETE

03 3111 NORMAL WEIGHT STRUCTURAL CONCRETE 03 3913 WATER CONCRETE CURING

END OF TABLE OF CONTENTS

SECTION 03 1511

CONCRETE ANCHORS AND INSERTS

PART 1 - GENERAL

1.1 SUMMARY

- A. Products Furnished But Not Installed Under This Section:
 - Cast-in anchors for concrete.
 - 2. Adhesive anchors and inserts for concrete.

B. Related Requirements:

- 1. Section 01 4000: "Quality Requirements" for administrative and procedural requirements for quality assurance and quality control.
- 2. Section 01 4301: "Quality Assurance Qualifications" for minimum qualification levels required.
- 3. Section 01 4523: "Testing and Inspecting" for testing, inspection, special testing, and testing laboratory services for materials, products, and construction methods.
- 4. Section 03 3111: Installation of cast-in-place anchors and inserts.
- 5. Section 06 1100: Installation of drilled in anchors.

1.2 REFERENCES

A. Reference Standards:

- 1. ASTM International:
 - a. ASTM A108-07, 'Standard Specification for Steel Bar, Carbon and Alloy, Cold Finished.'
 - b. ASTM A307-07b, 'Standard Specification for Carbon Steel Bolts and Studs, 60 000 psi Tensile Strength.'
 - c. ASTM A496 / A496M-07, 'Standard Specification for Steel Wire, Deformed, for Concrete Reinforcement.'
 - d. ASTM A563-07a, 'Standard Specification for Carbon and Alloy Steel Nuts.'
 - e. ASTM A615 / A615M-08b, 'Standard Specification for Deformed and Plain Carbon-Steel Bars for Concrete Reinforcement.'
 - f. ASTM F1554-07a, 'Standard Specification for Anchor Bolts, Steel, 36, 55, and 105-ksi Yield Strength.

1.3 SUBMITTALS

- A. Action Submittals:
 - 1. Product Data: Manufacturer's product literature for each item.

B. Informational Submittals:

- Test And Evaluation Reports: ICC ES Evaluation Report indicating conformance with the current applicable ICC ES Acceptance Criteria.
- Manufacturer's Instructions: Manufacturer's published installation recommendations for each item.

1.4 ADMINISTRATIVE REQUIREMENTS

A. Scheduling:

1. Inspection shall be performed according to Manufacturer's submitted ICC ES Evaluation Report. Notify Architect one week before installing anchors so testing may be scheduled.

1.5 QUALITY ASSURANCE

- A. Testing and Inspection.
 - 1. Owner will provide Testing and Inspection at their discretion:
 - a. See Section 01 1200: "Multiple Contract Summary".

PART 2 - PRODUCTS

2.1 MATERIALS

- A. Manufactured Units:
 - General:
 - Use hot-dipped galvanized or stainless steel with matching nuts and washers in exterior and moist interior applications unless indicated otherwise on Drawings.
 - b. Nut: Conform to requirements of ASTM A563, Grade A, Hex.
 - Threaded rod for adhesive anchors and cast-in anchors: Conform to requirements of ASTM A307, Grade A or ASTM F1554.
 - Anchor Bolts:
 - J-Bolts: Non-headed type threaded 2 inches 50 mm minimum conforming to requirements of ASTM A307, Grade A. Anchor hook to project 2 inches 50 mm minimum including bolt diameter.
 - Headed Bolts: Headed type threaded 2 inches 50 mm minimum conforming to requirements of ASTM A307, Grade A.
 - 4. Rebar:
 - Composed of deformed carbon steel meeting requirements of ASTM A706, Grade 60.
 - 5. Adhesive Anchors:
 - a. Cartridge Injection Adhesive Anchors.
 - Products shall have current ICC ES Evaluation report conforming to current ICC ES
 Acceptance Criteria AC308 for concrete.
 - c. Rod diameter and embedment length as indicated on Drawings.
 - d. Type Two Acceptable Products:
 - 1) HIT-RE 500-SD Epoxy by Hilti Fastening Systems, Tulsa, OK www.us.hilti.com.
 - SET-XP Epoxy by Simpson Strong-Tie Co., Pleasanton, CA www.simpsonanchors.com.
 - 3) Equal as approved by Architect before installation. See Section 01 6200.

PART 3 - EXECUTION

3.1 EXAMINATION

- A. Verification of Conditions:
 - Base Material Strength: Unless otherwise specified, do not drill holes in concrete until concrete has achieved full design strength.

3.2 INSTALLATION

- A. Adhesive Anchors:
 - Clean holes in accordance with Manufacturer's published instructions before installation of adhesive. Follow Manufacturer's recommendations to ensure proper mixing of adhesive components.
 - 2. Inject adhesive into holes proceeding from bottom of hole and progressing toward surface so as to avoid introduction of air pockets into adhesive. Inject sufficient adhesive into hole to ensure that annular gap is filled to surface.

- Remove excess adhesive from surface.
- 4. Shim anchors with suitable device to center anchor in hole. Do not disturb or load anchors before Manufacturer's specified cure time has elapsed.
- Observe Manufacturer's recommendations with respect to installation temperatures for adhesive anchors. Base material temperatures must be maintained above minimum temperatures allowed by the Manufacturer for the full required epoxy cure time.

3.3 FIELD QUALITY CONTROL

A. Remove and replace misplaced or malfunctioning anchors. Fill empty anchor holes and patch failed anchor locations with high-strength, non-shrink, non-metallic grout acceptable to Architect. Anchors that fail to meet proof load or installation torque requirements will be regarded as malfunctioning.

03 2100

SECTION 03 2100

REINFORCING STEEL

PART 1 - GENERAL

1.1 SUMMARY

- A. Includes But Not Limited To:
 - 1. Furnish and install concrete reinforcing steel as described in Contract Documents.

1.2 REFERENCES

- A. Reference Standards:
 - 1. American Concrete Institute:
 - a. ACI 318-08, 'Building Code Requirements for Structural Concrete and Commentary.'
 - 2. ASTM International:
 - ASTM A615 / A615M-8b, 'Standard Specification for Deformed and Plain Carbon-Steel Bars for Concrete Reinforcement.'
- B. Action Submittals:
 - 1. Shop Drawings: Reinforcing placement drawings.

1.3 DELIVERY, STORAGE, AND HANDLING

- A. Deliver bars separated by size and tagged with manufacturer's heat or test identification number.
- B. Reinforcing steel shall be free of heavy rust scales and flakes, or other coating at time of delivery and placing. Properly protect rebar on site after delivery.

PART 2 - PRODUCTS

2.1 MATERIAL

- A. Reinforcing Steel:
 - 1. Reinforcing bars shall have grade identification marks and conform to ASTM A615.
 - a. Grade 60 minimum. Field bent dowels may be Grade 40.
 - b. Bars shall be deformed type.
 - 2. Bars shall be free of heavy rust scales and flakes, or other bond-reducing coatings.
 - Bars shall be free of heavy rust scales and flakes, or other bond-reducing coatings.

2.2 ACCESSORIES

- A. Bar Supports:
 - 1. Type Two Acceptable Products:
 - a. Concrete 'dobies' or blocks wired to reinforcing.
 - b. Manufactured chairs with 4 sq in bearing surface on sub-grade, or other feature to prevent chair from being pushed into sub-grade or damaging the vapor retarder under slabs on grade.
 - Equals as approved by Architect before installation. See Section 01 6200.

2.3 FABRICATION

A. Fabricate reinforcing steel according to 'ACI Detailing Manual,' 2004 edition, and details on Drawings.

PART 3 - EXECUTION

3.1 INSTALLATION

- A. Site Tolerances:
 - 1. Provide following minimum concrete cover for reinforcement (ACI 318):
 - a. Concrete cast against and permanently exposed to earth:
 - 1) Exterior Slabs on Grade (where shown): 2 inches.
- B. Bend bars cold.
- C. Accurately place and support with chairs, bar supports, spacers, or hangers as recommended by 'ACI Detailing Manual,' 2004 edition, except slab on grade work. Support bars in slabs on grade and footings with specified bar supports around perimeter and at 4-1/2 feet on center each way maximum to maintain specified concrete cover. Install bar supports at bar intersections.
- D. Dowel vertical reinforcement for formed concrete columns or walls out of footing or structure below with rebar of same size and spacing required above.
- E. Securely anchor and tie reinforcing bars and dowels before placing concrete. Set wire ties with ends directed into concrete, not toward exposed concrete surfaces.
- F. Avoid splices of reinforcing bars at points of maximum stress. Lap bars 40 bar diameters minimum unless dimensioned otherwise on Drawings. Run steel reinforcing bars continuous through cold joints.

SECTION 03 3111

NORMAL WEIGHT STRUCTURAL CONCRETE

PART 1 - GENERAL

1.1 SUMMARY

- A. Includes But Not Limited To:
 - 1. Furnish and install Project concrete work as described in Contract Documents.
- B. Products Installed But Not Furnished Under This Section:
 - 1. Bolts
- C. Related Requirements:
 - 1. Section 01 4000: "Quality Requirements" for administrative and procedural requirements for quality assurance and quality control.
 - 2. Section 01 4301: "Quality Assurance Qualifications" for minimum qualification levels required.

1.2 REFERENCES

- A. Reference Standards:
 - 1. American Concrete Institute:
 - a. ACI 117-06: 'Specifications for Tolerances for Concrete Construction and Materials and Commentary."
 - b. ACI 318-08, 'Building Code Requirements for Structural Concrete and Commentary.'
 - 2. ASTM International:
 - a. ASTM C33 / C33M-08, 'Standard Specification for Concrete Aggregates.'
 - ASTM C94 / C94M-09, 'Standard Specification for Ready-Mixed Concrete.'
 - c. ASTM C150-07, 'Standard Specification for Portland Cement.'
 - d. ASTM C260-06, 'Standard Specification for Air-Entraining Admixtures for Concrete.'
 - e. ASTM C494 / C 494M-08a, 'Standard Specification for Chemical Admixtures for Concrete.
 - f. ASTM C595-08a, 'Standard Specification for Blended Hydraulic Cements.'
 - g. ASTM C618-08a, 'Standard Specification for Coal Fly Ash and Raw or Calcined Natural Pozzolan for Use in Concrete.'
 - h. ASTM C989-09, 'Standard Specification for Slag Cement for use in Concrete and Mortars.'
 - i. ASTM C1157-08a, 'Standard Performance Specification for Hydraulic Cement.'

1.3 ADMINISTRATIVE REQUIREMENTS

- A. Pre-Installation Conference:
 - 1. Schedule pre-installation conference prior to placing of footings, and reinforcing steel, and installation of anchors, dowels, inserts, and block outs in foundation walls and slabs.
 - In addition to agenda items specified in Section 01 3100, review following:
 - a. Approved mix design and use of admixtures.
 - b. Placement, finishing, and curing of concrete including cold and hot weather requirements.
- B. Schedulina:
 - 1. Notify Architect one day minimum before placing concrete.

1.4 SUBMITTALS

A. Action Submittals:

 Shop Drawings: Show dimensioned locations of anchor bolts for hold-down anchors and columns.

B. Informational Submittals:

- 1. Certificates:
 - a. Require mix plant to furnish delivery ticket for each batch of concrete. Keep delivery tickets at job-site for use of Owner or his representatives. Tickets shall show following:
 - 1) Name of ready-mix batch plant.
 - 2) Serial number of ticket.
 - 3) Date and truck number.
 - 4) Name of Contractor.
 - 5) Name and location of Project.
 - Specific class or designation of concrete conforming to that used in Contract Documents.
 - 7) Amount of concrete.
 - 8) Time loaded.
 - Type, name, manufacturer, and amount of admixtures used.
 - 10) Amount and type of cement.
 - 11) Total water content.
 - 12) Sizes and weights of sand and aggregate.
- 2. Design Data:
 - a. Submit mix designs to meet following requirements:
 - 1) Proportions:
 - a) Mix Type A:
 - (1) 3000 psi (minimum) at 28 days.
 - (2) Water / Cement Ratio: 0.47 to 0.53 by weight.
 - b) Do not add water any time during mixing cycle above amount required to meet specified water / cement ratio. No reduction in the amount of cementitious material is allowed.
 - 2) Slump:
 - a) 4 inch slump maximum before addition of high range water reducer.
 - b) 8 inch slump maximum with use of high range water reducer.
 - Admixtures:
 - Mix design shall show proposed admixture, amount, usage instructions, and justification for proposed use. Do not use any admixture without Architect's written approval.
 - b) Mineral: An amount of specified fly ash not to exceed 20 percent of weight of cement may be substituted for cement. If substituted, consider fly ash with cement in determining amount of water necessary to provide specified water / cement ratio.
 - c) Chemical: Specified accelerator or retarder may be used if necessary to meet environmental conditions.

1.5 QUALITY ASSURANCE

- A. Testing and Inspection.
 - 1. Owner will provide Testing and Inspection if determined necessary by the Owner:
 - See Section 01 1200: "Multiple Contract Summary".
 - 2. Concrete strength is specified as 3,000 PSI however the structural calculations only require 2,500 PSI concrete therefore special inspection is not required, however Contractor shall provide a 3,000 PSI mix design.

PART 2 - PRODUCTS

2.1 SYSTEM

A. Manufacturers:

- 1. Manufacturer Contact List:
 - a. BASF Admixtures, Cleveland, OH www.basf-admixtures.com.
 - b. Bonsal American, Charlotte, NC www.bonsal.com.
 - c. Dayton Superior Specialty Chemicals, Kansas City, KS www.daytonsuperiorchemical.com.
 - d. Euclid Chemical Company, Cleveland, OH www.euclidchemical.com.
 - e. Fritz-Pak Concrete Admixtures, Dallas, TX www.fritzpak.com.
 - f. Grace Construction Products, Cambridge, MA www.graceconstruction.com and Grace Canada Inc, Ajax, ON (905) 683-8561.
 - g. L & M Construction Chemicals, Omaha, NE www.lmcc.com.
 - h. Larsen Weldcrete by Larsen Products Corp, Rockville, MD www.larsenproducts.com.
 - i. Sika Corporation, Lyndhurst, NJ www.sikaconstruction.com and Sika Canada, Pointe Claire, QC www.sika.ca.
 - j. Sonneborn / BASF Building Systems, Shakopee, MN www.chemrex.com.
 - k. TAMMS Industries, Mentor, OH www.tamms.com.
 - I. Unitex, Kansas City, MO www.unitex-chemicals.com.
 - m. US Mix Products Co, Denver, CO www.usspec.com.
 - n. WR Meadows, Hampshire, IL www.wrmeadows.com.

B. Performance:

- Design Criteria: Conform to requirements of ASTM C94 unless specified otherwise.
- Capacities:
 - a. For testing purposes, following concrete strengths are required:
 - 1) At 7 days: 60 percent minimum of 28 day strengths.
 - 2) At 28 days: 100 percent minimum of 28 day strengths.
- C. Materials: Hydraulic Cement: Meet requirements of ASTM C150, Type I.
 - a. Meet requirements of ASTM C595, Type I.
 - b. Meet requirements of ASTM C1157, Type I.
 - 2. Aggregates:
 - a. Coarse:
 - Meet requirements of ASTM C33 or nonconforming aggregate that by test or actual service produces concrete of required strength and conforms to local governing codes.
 - 2) Aggregate shall be uniformly graded by weight as follows:
 - 3) Size No. 57.

Sieve	Percent Passing	Sieve	Percent Passing
1-1/2 Inch	100	38 mm	100
One Inch	95 - 100	25 mm	95 - 100
1/2 Inch	25 - 60	12 nm	25 - 60
No. 4	0 - 10	4.75 mm	0 - 10
No. 8	0 - 5	2.36 mm	0 - 5

- 3. Water: Clear, apparently clean, and potable.
- 4. Admixtures And Miscellaneous:
 - a. Mineral:
 - 1) Fly Ash Pozzolan: Meet requirements of ASTM C618, Class F or C and with loss on ignition (LOI) of 3 percent maximum.
 - b. Chemical:
 - No admixture shall contain calcium chloride nor shall calcium chloride be used as an admixture. All chemical admixtures used shall be from same manufacturer and compatible with each other.
 - 2) Air Entraining Admixture:
 - a) Meet requirements of ASTM C260.
 - b) Type Two Acceptable Products:
 - c) MB-VR, MB-AE or Micro Air by BASF.

- d) Air Mix 200 or AEA-92 by Euclid.
- e) Air plus or Super Air Plus by Fritz-Pak.
- f) Sika Air by Sika.
- g) Daravair or Darex II AEA by W R Grace.
- h) Equal as approved by Architect before use. See Section 01 6200.
- 3) Water Reducing Admixture:
 - a) Meet requirements of ASTM C494, Type A and containing not more than 0.05 percent chloride ions.
 - b) Type Two Acceptable Products:
 - c) Pozzolith Series by BASF.
 - d) Eucon WR 75 or Eucon 91 by Euclid.
 - e) FR-2 or FR-3 by Fritz-Pak.
 - f) Plastocrete 160 by Sika.
 - g) Daracem 50/55, WRDA-64, or WRDA-82 by W R Grace.
 - h) Equal as approved by Architect before use. See Section 01 6200.
- Water Reducing, Retarding Admixture:
 - Meet requirements of ASTM C494, Type D and contain not more than 0.05 percent chloride ions.
 - b) Type Two Acceptable Products:
 - c) Pozzolith Series by BASF.
 - d) Eucon Retarder 75 by Euclid.
 - e) FR-1 or Modified FR-1 by Fritz-Pak.
 - f) Plastiment by Sika.
 - g) Daratard-17 or Daratard-40 by W R Grace.
 - h) Equal as approved by Architect before use. See Section 01 6200.
- 5) High Range Water Reducing Admixture (Superplasticizer):
 - Meet requirements of ASTM C494, Type F or G and containing not more than 0.05 percent chloride ions.
 - b) Type Two Acceptable Products:
 - c) Rheobuild 1000 or Glenium Series by BASF.
 - d) Eucon 37 or Eucon 537 by Euclid.
 - e) Supercizer 1 through 7 by Fritz-Pak.
 - f) Sikament 300 by Sika.
 - g) Darachem-100 or WRDA-19 by W R Grace.
 - h) Equal as approved by Architect before use. See Section 01 6200.
- 6) Non-Chloride, Non-Corrosive Accelerating Admixture:
 - Meet requirements of ASTM C494, Type C or E and containing not more than 0.05 percent chloride ions.
 - b) Type Two Acceptable Products:
 - c) Accelguard 80 by Euclid.
 - d) Pozzolith NC 534 or 122HE or Pozzutec 20+
 - e) Daraset or Polarset by W R Grace.
 - f) Equal as approved by Architect before use. See Section 01 6200.

2.2 ACCESSORIES

- A. Evaporation Retardant:
 - Type Two Acceptable Products:
 - a. Confilm by BASF.
 - b. Sure Film J-74 by Dayton Superior.
 - c. Euco-Bar By Euclid Chemical Co.
 - d. E-Con by L & M Construction Chemicals.
 - e. Pro Film by Unitex.
 - f. US Spec Monofilm ER by US Mix Products.
 - g. Equal as approved by Architect before use. See Section 01 6200.

B. Bonding Agents:

- Type Two Acceptable Products:
 - a. Acrylic Additive by Bonsal American.

- b. Day Chem Ad Bond (J-40) by Dayton Superior.
- c. Flex-Con by Euclid Chemical Co.
- d. Larsen Weldcrete by Larsen Products Corp.
- e. Everbond by L & M Construction Chemicals.
- f. Acryl Set by BASF.
- g. Sonocrete by Sonneborn.
- h. Tamms Bond by TAMMS Industries.
- i. U S Spec Multicoat by U S Mix Products.
- j. Intralok by W R Meadows.
- k. Equal as approved by Architect before use. See Section 01 6200.

PART 3 - EXECUTION

3.1 PREPARATION

- A. Bolts and reinforcing steel shall be installed and inspected before placing concrete.
- B. Tie anchor bolts securely to reinforcing steel.
- C. Remove water and debris from space to be placed.

3.2 INSTALLATION

- A. Hot Weather Concreting Procedures:
 - 1. Maximum concrete temperature allowed is 90 deg F in hot weather.
 - 2. Cool aggregate and subgrades by sprinkling.
 - 3. Avoid cement over 140 deg F.
 - 4. Use cold mixing water or ice.
 - 5. Use fog spray or evaporation retardant to lessen rapid evaporation from concrete surface.

B. Tolerances:

- Tolerances shall conform to requirements of ACI 117, except where specified differently.
- 2. Local Flatness / Levelness of Interior Slabs:
 - a. Specified Overall Value of F_F28 / F_L20 and Minimum Local Value of F_F20 / F_L15 when tested in accordance with ASTM E1155.
 - b. Table Four: Maximum Variation Tolerances.

Thickness, standard	plus 3/8 inch, minus 1/4 inch	plus 9 mm, 3 mm
Thickness, footings	minus 0 inch	minus 0 mm
Plan, 0 - 20 feet	1/2 inch	12 mm
Plan, 40 feet or greater	3/4 inch	19 mm
Plan, footings	plus 1/2 inch	plus 12 mm
Eccentricity, footings	2 inch max standard,	50 mm max standard,
	1/2 inch at masonry	12 mm at masonry

C. Placing:

- General:
 - a. Place as soon after mixing as possible. Deposit as nearly as possible in final position. Placing of concrete shall be continuous until a panel or section is complete.
 - b. Compact concrete in forms by vibrating and other means where required. Thoroughly work in concrete around reinforcing bars.
 - c. Do not embed aluminum in concrete.
 - d. Do not use contaminated, deteriorated, or re-tempered concrete.
 - e. Avoid accumulation of hardened concrete.
- 2. Footings:
 - a. Level top of finish footing and screed smooth.

- b. Where joints are required, bulkhead, key horizontally, and dowel with two No. 5 reinforcing bars, 48 inches long.
- 3. Bonding Fresh And Hardened Concrete:
 - a. Re-tighten forms.
 - b. Roughen surfaces.
 - c. Clean off foreign matter and laitance.
 - d. Wet but do not saturate.
 - e. Slush with neat cement grout or apply bonding agent.
 - f. Proceed with placing new concrete.
- 4. Anchor Bolts: Place anchor bolts not tied to reinforcing steel immediately following leveling of concrete. Reconsolidate concrete around bolt immediately after placing bolt. Do not disturb bolts during finishing process.
- D. Curing:

Water cure as specified in Section 03 3913.

3.3 PROTECTION

A. Protect concrete that has not received its initial set from precipitation to avoid excess water in mix and unsatisfactory surface finish.

SECTION 03 3913

WATER CONCRETE CURING

PART 1 - GENERAL

1.1 SUMMARY

- A. Includes But Not Limited To:
 - 1. Quality of water concrete curing as described in Contract Documents.
- B. Related Requirements:
 - 1. Section 03 3111: Normal weight structural concrete.

1.2 REFERENCES

- A. Reference Standards:
 - 1. American Association of State Highway and Transportation Officials;
 - a. AASHTO M182-05-UL. 'Burlap Cloth made from Jute or Kenafi.'
 - 2. American Society of Testing and Materials:
 - a. ASTM C171-07, 'Standard Specification for Sheet Materials for Curing Concrete.'

1.3 SUBMITTALS

- A. Action Submittals:
 - 1. Product Data: Manufacturer's product data.

PART 2 - PRODUCTS

2.1 MATERIALS

- A. Water-Curing Materials:
 - 1. Acceptable Products:
 - a. Absorptive Cover: Meet requirements of AASHTO M 182, Class 2 burlap cloth made from jute or kenaf and weighing minimum of 9 oz per sq yd when dry.
 - Moisture-Retaining Cover: White, opaque membrane meeting requirements of ASTM C171 minimum.
 - c. Equals as approved by Architect before using. Both covers may be combined into single, manufactured product.

PART 3 - EXECUTION

3.1 PROCEDURE

- A. Cover concrete with absorptive cover followed by moisture-retaining cover, both at widest practicable widths. Lap sides and edges of each 12 inches minimum.
- B. During curing period, immediately repair holes or tears in moisture-retaining cover with additional cover material and waterproof tape.

- C. Keep absorptive cover saturated, rewetting during curing period as necessary.
- D. Keep concrete covered and moist seven days minimum.

DIVISION 05: METALS

05 0000 METALS

05 0503 Shop-Applied Metal Coatings 05 0523 Metal Fastenings

05 1000 STRUCTURAL METAL FRAMING

05 1200 STRUCTURAL STEEL FRAMING 05 1223 STRUCTURAL STEEL

END OF TABLE OF CONTENTS

SECTION 05 0503

SHOP-APPLIED METAL COATINGS

PART 1 - GENERAL

1.1 SUMMARY

- A. Includes But Not Limited To:
 - 1. Quality of and procedures for field touch-up and repair of factory-applied priming and galvanizing.
 - 2. Quality of and procedures for shop-applied finish applied to steel supplied to project.

1.2 REFERENCES

- A. Reference Standards:
 - 1. ASTM International:
 - ASTM A780-01(2006), 'Standard Practice for Repair of Damaged and Uncoated Areas of Hot-Dip Galvanized Coatings.'
 - ASTM B695-04, 'Standard Specification for Coatings of Zinc Mechanically Deposited on Iron and Steel.'

1.3 ADMINISTRATIVE REQUIREMENTS

A. Pre-Installation Conference: Meet with Architect before commencing repair of galvanized surfaces to establish extent of repairs required and, if applicable, choice of methods to be used.

1.4 SUBMITTALS

- A. Action Submittals:
 - 1. Product Data: Product data and samples, if requested by Architect.

PART 2 - PRODUCTS

2.1 FINISHES

- A. Material For Repairs Of Galvanized Surfaces:
 - 1. Structural, Load-Bearing Items and Items Exposed To moisture above or below the surface:
 - a. Zinc-Based Solders, Powder, Or Rod:
 - Zinc-Cadmium solder with liquidus temperature range from 518 to 527 deg F 270 to 275 deg C, or
 - Zinc-Tin-Lead alloy with liquidus temperature range from 446 to 500 deg F30 to 260 deg C.
 - b. Sprayed Zinc: Wire, ribbon, or powdered zinc suitable for process.

PART 3 - EXECUTION

3.1 PREPARATION

A. General:

- Clean, grind, or otherwise prepare welds in steel that is to be coated within limits acceptable to welder responsible for structural integrity.
- 2. Surfaces to be coated shall be clean, dry and free of oil, grease, and corrosion products.

B. Preparation Of Galvanized Surfaces:

- 1. Follow requirements of ASTM A780 and following:
- 2. For Repair Using Zinc-Rich Paints:
 - a. Blast clean surfaces to near-white metal, in accordance with SSPC-SP10 (1 to 2 mil anchor pattern), as minimum.
 - b. Where circumstances do not allow blast cleaning, power disk sand to bright metal finish.
 - c. Extend surface preparation into undamaged galvanized area.
 - d. Remove flux residue and weld spatter from welded areas.
- 3. For Repair Using Zinc-Based Alloys:
 - a. Clean surface to be reconditioned using wire brush, light grinding action, or mild blasting.
 - b. Extend surface preparation into surrounding, undamaged galvanized areas.
 - c. Remove flux residue and weld spatter from welded areas.
 - d. Preheat cleaned area to at least 600 deg F 316 deg C.
 - 1) Do not overheat surface beyond 750 deg F 400 deg C or allow surrounding galvanized coatings to be burned.
 - 2) Wire brush surface during preheating.
- 4. For Repair Using Sprayed Zinc (Metallizing):
 - a. Blast clean surfaces to near-white metal, in accordance with SSPC-SP5 as minimum.
 - b. Extend surface preparation into undamaged galvanized area.
 - c. Remove flux residue and weld spatter from welded areas.

3.2 REPAIR / RESTORATION

- A. Repairs To Galvanized Surfaces:
 - 1. Structural, Load-Bearing Items And Items Exposed To Moisture:
 - a. Repair Using Zinc-Based Alloys:
 - Rub cleaned, pre-heated areas with repair stick to deposit evenly distributed layer of zinc alloy. If powdered zinc alloys are used, sprinkle powder on surface and spread out with spatula or similar tool.
 - 2) Remove flux residue by rinsing with water or wiping with damp cloth.
 - b. Repair Using Sprayed Zinc (Metallizing): Apply 2 mil minimum coating by means of metalspraying pistols fed with either zinc wire or zinc powder in accordance with requirements of ASTM B695, Type I.
 - 2. All Items:
 - a. Apply repair materials immediately after surface preparation is complete.
 - b. Take thickness measurements, with either magnetic or electromagnetic gauge, to ensure applied coating is as specified or agreed to.

3.3 PROTECTION

- A. Protect finished coatings until completion of project.
- B. Touch-up damaged coatings.

SECTION 05 0523

METAL FASTENING

PART 1 - GENERAL

1.1 SUMMARY

- A. Includes But Not Limited To:
 - 1. Quality of structural metal-to-metal, used on Project.
 - 2. Requirements and standards for site welded metal-to-metal connections.
- B. Related Requirements:
 - 1. Section 03 1511: Cast-in-place and drilled-in anchor bolts.
 - 2. Furnishing and installing of structural bolts specified under Section concerned.
 - 3. Performance of welding specified under Section concerned.

1.2 REFERENCES

- A. Reference Standards:
 - 1. ASTM International:
 - a. ASTM A36 / A36M-08, 'Standard Specification for Carbon Structural Steel.'
 - ASTM A307-07b, 'Standard Specification for Carbon Steel Bolts and Studs, 60,000 psi Tensile Strength.'
 - ASTM A325-09, 'Standard Specification for Structural Bolts, Steel, Heat Treated, 120/105 ksi Minimum Tensile Strength.'
 - 2. American National Standards Institute / American Welding Society::
 - ANSI / AWS D1.1/D1.1M:2008 02-Jul-2008, 'Structural Welding Code Steel, Second Printing, Includes Errata (2009).'
 - b. ANSI / AWS D1.3/D1.3M:2008 'Structural Welding Code Sheet Steel, Fifth Edition, with Errata.'

1.3 QUALITY ASSURANCE

- A. Qualifications: Welders shall be certified 30 days minimum before beginning work on Project. If there is doubt as to proficiency of welder, Architect may require welder to take another test, at no expense to Owner. Certification shall be by Pittsburgh Laboratories or other authority approved by Architect.
- B. Certifications: Maintain welder's certifications on job-site.

PART 2 - PRODUCTS

2.1 MANUFACTURED UNITS

- A. Materials:
 - 1. Bolts And Threaded Fasteners:
 - a. Anchor Rods For Connections: Conform to requirements of ASTM A36.
 - b. Bolts: Conform to requirements of ASTM A307, Grade A.

2.2 ACCESSORIES

A. Arc-Welding Electrodes: Type E70XX AWS Iron and Steel Arc-welding electrodes and meeting current AISC Specifications.

PART 3 - EXECUTION

3.1 PERFORMANCE

A. Welding shall meet requirements of ANSI / AWS D1.1 and D1.3.

SECTION 05 1200

STRUCTURAL STEEL FRAMING

PART 1 - GENERAL

1.1 SUMMARY

- A. Includes But Not Limited To:
 - Furnish and install structural steel framing wall bracing system as described in Contract Documents.
- B. Products Furnished But Not Installed Under This Section:
 - 1. Structural anchors, plates, channels, angles, etc, to be cast into concrete.
- C. Related Requirements:
 - 1. Section 03 3111: Installation of structural items to be cast into concrete.

1.2 REFERENCES

- A. Reference Standards:
 - 1. American National Standards Institute / American Institute of Steel Construction:
 - a. ANSI / AISC 341-05, 'Seismic Provisions for Structural Steel Buildings (including Supplement No. 1 (ANSI/AISC 341s1-05).'
 - b. ANSI / AISC 358-05, 'Prequalified Connections for Special and Intermediate Steel Moment Frames for Seismic Applications.'
 - c. ANSI / AISC 360-05, 'Specification for Structural Steel Buildings.'
 - 2. ASTM International:
 - a. ASTM A36 / A36M-08, 'Standard Specification for Carbon Structural Steel.'
 - b. ASTM A53 / A53M-07, 'Standard Specification for Pipe, Steel, Black and Hot-Dipped, Zinc-Coated, Welded and Seamless.'
 - ASTM A500 / A500M-07, 'Standard Specification for Cold-Formed Welded and Seamless Carbon Steel Structural Tubing in Rounds and Shapes.'
 - d. ASTM A992 / A992M-06a, 'Standard Specification for Structural Steel Shapes.'

1.3 SUBMITTALS

- A. Action Submittals:
 - 1. Product Data: Submit product data and samples, if requested by Architect.
 - 2. Shop Drawings:
 - Shop drawings and calculations, prepared and stamped by structural engineer, shall include, but not be limited to, plans, elevations, and large scale details of typical sections, connections, joining, and accessories.
 - b. Show other fabricated work.

PART 2 - PRODUCTS

2.1 COMPONENTS

- A. Materials:
 - Plates, etc, as shown on Drawings.

- 2. Structural Pipe:
 - a. Meet requirements of ASTM A53, Type E or S, Grade B.
 - 1) Weight Class, STD, Schedule 40.
 - 2) Weight Class, XS, Schedule 80.
- 3. Structural Tubing: Meet requirements of ASTM A500, Grade B.

B. Fabrication:

- 1. Requirements: Structural metal shall be product of domestic mill.
- 2. ANSI / AISC 360 shall serve as minimum standard.
- Fabricate items to be embedded in concrete or masonry according to approved details of work to be connected.
- C. Finishes: Shop prime structural steel.

PART 3 - EXECUTION

3.1 EXAMINATION

A. Do not remove 1st floor slab (above basement level) before bracing system is in place and are in suitable condition to receive framing.

3.2 ERECTION

- A. Interface With Other Work: Furnish items to be embedded in concrete to Division 03 respectively in time to be securely tied in place before placing concrete and grout.
- B. AISC's 'Specification for Structural Steel Buildings' March 2005 and 'Code of Standard Practice for Steel Buildings and Bridges' March 2005 shall serve as minimum standards. Erection includes setting, aligning, and bracing as necessary.
- C. Do not overload or exceed carrying capacity of any structural steel element during construction period.
- D. Plates or Channels Embedded in Concrete: Tack weld bolts to plates or channels to prevent bolts from turning when nuts are tightened.
- E. Immediately after erection, clean completed field connections and damaged surfaces with solvents and hand or power tools. After cleaning, repair finish using specified galvanized repair methods.

SECTION 05 1223

STRUCTURAL STEEL

PART 1 - GENERAL

1.1 SUMMARY

- A. Products Furnished But Not Installed Under This Section:
 - Structural steel.
- B. Related Requirements:
 - 1. Section 05 0523: Quality of welding.

1.3 **REFERENCES**

- A. Reference Standards:
 - American Society For Testing And Materials:

 - a. ASTM A36 / A36M-08, 'Standard Specification for Carbon Structural Steel.'
 b. ASTM A53 / A53M-07, 'Standard Specification for Pipe, Steel, Black and Hot-Dipped, Zinc-Coated, Welded and Seamless.'
 - ASTM A500 / A500M-07, 'Standard Specification for Cold-Formed Welded and Seamless Carbon Steel Structural Tubing in Rounds and Shapes.'

PART 2 - PRODUCTS

2.1 **COMPONENTS**

- Materials:
 - Connections, And Miscellaneous Structural Steel: Meet requirements of ASTM A36.
 - Structural Pipe.
 - Meet requirements of ASTM A53, Type E or S, Grade B.
 - 1) Weight Class, STD, Schedule 40.
 - Structural Tubing: Meet requirements of ASTM A500, Grade B.
- B. Fabrication:
 - 1. After fabrication hot-dip or mechanically galvanize all steel components.

DIVISION 07: THERMAL AND MOISTURE PROTECTION

07 1000 DAMPPROOFING AND WATERPROOFING

07 1113 BITUMINOUS DAMPPROOFING

SECTION 07 1113

BITUMINOUS DAMPPROOFING

PART 1 - GENERAL

1.1 SUMMARY

- A. Includes But Not Limited To:
 - Furnish and apply bituminous dampproofing to interior side of first level walls as described in Contract Documents.
 - Furnish and apply bituminous dampproofing to all bracing and connections. Do not install water proofing at bracing until all connections and core drill at slab have been completed and prior to back filling.

1.2 DELIVERY, STORAGE, AND HANDLING

A. Maintain dampproofing at 40 deg F or above before application.

1.3 FIELD CONDITIONS

A. Ambient Conditions: Do not apply when ambient temperature is below 40 deg F, surface temperature is below 33 deg F, or when rain is expected before applied dampproofing will dry.

PART 2 - PRODUCTS

2.1 MANUFACTURERS

- A. Bituminous Damproofing:
 - 1. Acceptable Products:
 - a. Ecomul-11 by Epro Waterproofing Systems, Derby, KS www.eproserv.com.
 - b. Henry 788 by Henry Company, El Segundo, CA www.henry.com.
 - c. Karnak 100 by Karnak Chemical Corp. Clark, NJ www.karnakcorp.com.
 - Sealmastic Asphalt Emulsion Dampproofing Type I by W R Meadows, Hampshire, IL www.wrmeadows.com.
 - e. Equal as approved by Architect and County before application.

PART 3 - EXECUTION

3.1 APPLICATION

- A. Spray Application: Spray to a thickness of 10 mils minimum.
- B. Brush / Roller Application: Apply two coats of dampproofing at rate recommended by Manufacturer. Apply coats in cross hatch method so coats are applied perpendicular to each other. Before applying second coat allow first coat to dry in accordance with Manufacturer's recommendations.
- C. Apply dampproofing to cover area from 6 inches below finish grade line down to bottom of wall.
- Do not backfill against bituminous dampproofing for 24 hours after application or as recommended by manufacturer.

DIVISION 09: FINISHES

09 9000 PAINTS AND COATINGS

09 9112 EXTERIOR PAINTED FERROUS METAL

SECTION 09 9112

EXTERIOR PAINTED FERROUS METAL

PART 1 - GENERAL

1.1 SUMMARY

- A. Includes But Not Limited To:
 - 1. Preparing and painting fence and gate.
- B. Related Requirements:
 - 1. Section 09 9001: Common Painting Requirements

PART 2 - PRODUCTS

2.1 SYSTEM

- A. Manufacturers:
 - Category Four Approved Products and Manufacturers. See Section 01 6200 for definitions of Categories.
 - a. Products listed in edition of MPI Approved Product List current at time of bidding and later are approved, providing they meet VOC requirements in force where Project is located.
- B. Description:
 - Use MPI(a) EXT 5.1M Waterborne Light Industrial Coating system .
- C. Performance:
 - 1. Design Criteria:
 - a. Systems specified are in addition to prime coats provided under other Sections of Project
 - b. Finish Requirements: Use MPI Premium Grade finish requirements for work of this Section.
 - c. Gloss / Sheen Level Required: Gloss Level 5.
- D. Materials:
 - 1. Primer Coat: MPI Product 107.
 - 2. Finish Coats: MPI Product 163.

PART 3 - EXECUTION

3.1 APPLICATION

- A. General: See appropriate paragraphs of Section 09 9001.
- B. Clean metal to be painted of rust, mill scale, grease, oil, and welding spatters, burrs, flux, slag, and fume. If all traces of rust cannot be removed, apply rust blocker recommended by Paint Manufacturer before applying primer coat.

1.

DIVISION 31: EARTHWORK

31 2000 EARTH MOVING

31 2323 FILL

SECTION 31 2323

FILL

PART 1 - GENERAL

1.1 SUMMARY

- A. Includes But Not Limited To:
 - Perform Project backfilling and compacting as specified below.
 - 2. Procedure and quality for backfilling and compacting performed on Project.

B. Related Requirements:

1. Section 01 4523: "Testing and Inspecting" for testing, inspection, special testing, and testing laboratory services for materials, products, and construction methods.

1.2 REFERENCES

- A. Reference Standards:
 - ASTM International:
 - a. ASTM D698-07e1, 'Standard Test Methods for Laboratory Compaction Characteristics of Soil Using Standard Effort (12 400 ft-lbf/ft3 (600 kN-m/m3)).'
 - ASTM D1556-07, 'Standard Test Method for Density and Unit Weight of Soil in Place by the Sand-Cone Method.'
 - c. ASTM D1557-07, 'Standard Test Methods for Laboratory Compaction Characteristics of Soil Using Modified Effort (56,000 ft-lbf/ft3 (2,700 kN-m/m3)).'
 - d. ASTM D2167-08, 'Standard Test Method for Density and Unit Weight of Soil in Place by the Rubber Balloon Method.'
 - e. ASTM D2216-05, 'Standard Test Methods for Laboratory Determination of Water (Moisture) Content of Soil and Rock by Mass.'
 - f. ASTM D2487-06e1, 'Standard Classification of Soils for Engineering Purposes (Unified Soil Classification System).'
 - g. ASTM D6938-08a, 'Standard Test Method for In-Place Density and Water Content of Soil and Soil-Aggregate by Nuclear Methods (Shallow Depth).'

1.3 ADMINISTRATIVE REQUIREMENTS

- A. Sequencing:
 - Do not backfill against water proofing until cured as specified by the water proofing manufacturer.
- B. Scheduling:
 - 1. Notify Architect 1 day before installation of fill / engineered fill to allow inspection.
 - 2. Allow special inspector to review all subgrades and excavations to determine if the site has been prepared in accordance with the geotechnical report prior to placing any fill (or concrete).
 - Allow inspection and testing agency to inspect each fill or backfill layer. Proceed with subsequent earthwork only after inspections and test results for previously compacted work comply with requirements.

1.4 QUALITY ASSURANCE

- A. Testing and Inspection.
 - Owner will provide Testing and Inspection:
 - a. See Section 01 1200: "Multiple Contract Summary".

PART 2 - PRODUCTS

2.1 **MATERIALS**

Site Material: Contractor may take demolished material, take it off site and crush it and bring it back to the site as fill provided that it meets the following gradation. Or contractor may bring in fill that meets the following gradation.

Imported Fill / Backfill:

1. Fill should be spread in near-horizontal layers, approximately 8 inches thick. Thicker lifts may be approved by the geotechnical engineer if testing indicates that the grading procedures are adequate to achieve the required compaction. Each lift should be spread evenly, thoroughly mixed during spreading to attain uniformity of the material and moisture in each layer, brought to near optimum moisture content and compacted to a minimum relative compaction of 95 percent in accordance with ASTM D 1557.

All fill soils should be nearly free of organic or other deleterious debris, and essentially nonplastic. In general, well graded mixtures of gravel, sand, non-plastic silt and clay are acceptable for use as fill. Specific requirements for engineered fill are provided below.

Gradation (C 117/136) Sieve size percent passing 4" 100 3/4" 70-100 No. 4 50-100 No. 50 30-100 No. 200 10-40 Plasticity (D 4318)

Liquid Limit Plasticity Index <25 <7

Organic Content (D2974) <2%

Expansion Index (D 4829)

PART 3 - EXECUTION

3.1 **PREPARATION**

- Before placing fill, base, or finish work, prepare sub-grade as follows:
 - Ensure water proofing material has been applied to interior face of north and west walls.
 - Confirm that all bracing material have been coated and protected prior to backfill.

REPAIR / RESTORATION 3.2

Repair damage to other portions of the Work or adjacent areas resulting from work of this Section at no additional cost to Owner.

CLEANING 3.3

Debris and material not necessary for Project are property of Contractor and are to be removed before completion of Project. However, if material necessary for Project is hauled away, replace with specified fill / backfill material.

DIVISION 32: EXTERIOR IMPROVEMENTS

32 3000 SITE IMPROVEMENTS

32 3119 DECORATIVE METAL FENCES AND GATES

SECTION 32 3119

DECORATIVE METAL FENCES AND GATES

PART 1 - GENERAL

1.1 SUMMARY

- A. Includes But Not Limited To:
 - 1. Remove & reinstall existing gate.
 - Add fencing adjacent to new location of existing gate to provide a fully enclosed court area.
 - Provide fencing along the north and west sides of the jail foundation wall, and connecting to the
 historic court at the north east corner of the jail to provide a secure enclosure of the court area of
 the historic court building.
 - 4. Concrete foundations for gate and fence posts.

1.2 REFERENCES

- A. American Society For Testing And Materials:
 - 1. ASTM A 36-03a, 'Standard Specification for Carbon Structural Steel.'

1.3 RELATED SECTIONS

A. Section 09 9112 Paint on metal

PART 2 - PRODUCTS

2.1 MATERIALS

- A. Provide 4" square posts on either side of gate for track and wheels in new foundations size and reinforcement as required to withstand 200 lbs of force applied at the top of the post.
- B. Gate Fencing & Track:
 - 1. Steel meeting requirements of ASTM A 36.
 - 2. Acceptable Products:
 - a. Any factory-manufactured fencing meeting specified requirements and approved by Architect before bidding. See Section 01 6200.
 - b. Any shop-fabricated fencing meeting specified requirements and approved by Architect before installation. See Section 01 6200.
 - 3. Vertical pickets 3/4" square tube spaced at 4" O.C.
 - 4. Provide horizontal reinforcing material as necessary to span the length of the gate and the span between vertical posts but no less than 1 ½" square tube.
- C. 2500 PSI concrete for footings.

2.2 FABRICATION

A. Fabricate fence in configuration shown on Drawings or approved by Architect.

- B. Fabricate tubes with all-welded construction and in accordance with details on Drawings. Grind finish welded joints.
- C. Factory- or shop-finish with paint system equal to or better than paint systems specified for metal in Sections under 09 9000 heading. Color as selected by Architect.
- D. Hinges and accessories shall be Manufacturer's standard unless shown otherwise.

PART 3 - EXECUTION

3.1 ERECTION

- A. Erect fence plumb and in true line.
- B. Set posts in concrete foundations as depicted in drawings.

3.2 ADJUSTING

- A. Lubricate operating parts and adjust gate all components to function properly.
- B. Touch-up paint finish if necessary to repair damage to finish.
- C. Assure smooth and quiet gate operation with a 1/4 "gap where gates meet.