

9699 Blue Larkspur Lane • Suite 105 • Monterey, CA 93940 831 649-5225 • Fax 831 373-5065

> March 15, 2012 Job No.: 2705.00

Mr. Larry Hampson **Monterey Peninsula Water Management District (MPWMD)** P.O. Box 85 Monterey, CA 93942

Via email: <u>Larry@mpwmd.net</u>

Revised Proposal to provide Additional Engineering Services Sleepy Hollow Ford Removal and Bridge Replacement Project

Dear Mr. Hampson:

Per your request, Whitson Engineers with our sub consultant Cornerstone Structural Engineering Group is pleased to submit the following revised proposal to provide additional engineering services on subject project. Our approved contract includes the design of the abutment foundation only, to support a pre-engineered steel superstructure bridge over the Carmel River, with the understanding that the bridge superstructure will be a Bailey-type bridge to be provided by a supplier under the direction of the District. As described in the Type Selection report for the project dated 2-1-2012, there are several considerations to be made related to the subject site and we recommend that additional pre-engineered steel bridge types be considered to ensure an economical and constructible design. Due to the many constructability issues facing the project site, we recommend that Monterey Peninsula Water Management District expand our scope to include a constructability review and preparation of design and performance specifications for a pre-engineered superstructure.

It is our understanding the Department of Fish and Game would like us to investigate the constructability of a Big R type bridge only. Our constructability review would include a constructability analysis of the Big R bridge superstructure. The design team will coordinate with a bridge contractor knowledgeable of Big R bridge erection to ensure that equipment needed is available to access the site and erect the bridge.

Four different pre-engineered steel superstructure bridge options were presented in the type selection report dated 2-1-2012. Based on feedback from the DFG, the abutments will be designed and detailed for a Big R pre-engineered superstructure. Shop drawings and structural calculations for the pre-engineered superstructure will be submitted as a deferred submittal as is the standard practice for pre-engineered bridge superstructures.

Our proposed scope of additional engineering services is as follows:

SCOPE OF SERVICES

CONSTRUCTABILITY REVIEW

Task 1 Coordinate with bridge contractors

- Perform a one day project site visit with contractors
- Determine that a Big R superstructure can be constructed at the site and that the required equipment is able to access the project site

Task 2 Coordinate with selected pre-engineered bridge manufactures

March 15, 2012 Page 2 of 3 Job No.: 2705.00

- Obtain superstructure geometric constraints
- Determine superstructure delivery constraints and options
- Task 3 Prepare a brief constructability review memorandum
 - Discuss the feasibility of constructing a Big R bridge at the project site
 - Provide qualitative descriptions discussing anticipated temporary impacts due to equipment access needs and temporary supports

SUPERSTRUCTURE PS&E

- Task 1 Prepare performance specifications for the Big R bridge superstructure, including bridge design criteria, live loading, seismic loading, applicable design codes, required welding inspections, etc. to be placed on the drawings
- Task 2 Coordinate with Big R pre-engineered bridge manufacturer
 - Determined superstructure dead load
 - Obtain superstructure pricing estimate
- Task 3 Coordinate superstructure design with abutment foundation design
 - Design abutments to accommodate Big R pre-engineered bridge superstructure reactions
 - Detail abutments to accommodate Big R pre-engineered bridge superstructure geometry
- Task 4 Prepare cost estimate to supply and erect the Big R pre-engineered superstructure
- Task 5 Perform independent in-house quality control check of design
- Task 6 Respond to plan check comments
 - Provide written response to plan check comments
 - Incorporate plan check comments into construction documents

ASSUMPTIONS

The following assumptions were made in generating this design proposal. Deviations from these assumptions could result in additional work by Whitson Engineers or Cornerstone Structural Engineering Group, and is not included in this proposal.

- 1. It is assumed that the preferred bridge superstructure is a Big R pre-engineered steel superstructure bridges.
- 2. The design and structural evaluation of the pre-engineered steel superstructure bridges is not included and will be provided as a deferred submittal by the preferred bridge manufacturer. Live load and dead load reactions from the bridge superstructure shall be provided by the superstructure manufacturer.
- 3. Superstructure will be specified to be designed in accordance with the AASHTO LRFD Bridge Design Specifications, 4th Edition with interims through 2009 and the California Amendments V.4.
- 4. All required permit applications and environmental documentation will be prepared and filed by others.
- 5. Construction support services (review of contractor submittals/shop drawings, respond to RFI's, structural observations, etc.) are not included. We would be pleased to submit a separate proposal to provide construction support services, should the Design Team or the MPWMD elect that option.

March 15, 2012 Page 3 of 3 Job No.: 2705.00

EXCLUSIONS

- 1. **Construction Support Services or Management**
- 2. **Permitting Services**
- 3. LOMR or CLOMR
- 4. Any item that is not specifically included in the above scope of work

Although not included in this proposal, Cornerstone would be pleased to provide construction management services for the bridge structure during construction. Cornerstone has provided construction management services on numerous bridge projects including over \$20 million in bridge construction in Contra Costa County, and is currently providing construction inspection services on a \$3 million UPRR Overhead bridge for the County of Tulare and a \$4.8 million Highway 99 Overcrossing bridge for the City of Madera with Caltrans oversight. Cornerstone has an extensive resume of construction inspection services for bridge projects including bridges over environmentally sensitive rivers. Cornerstone would anticipate the construction management fees for the Sleepy Hollow Ford bridge structure to range from \$50,000 to \$80,000. Cornerstone would be pleased to provide a separate proposal for CM services at your request.

COMPENSATION

The fee for the above Scope of Services is \$16,300. Progress billings and Authorized Additional Services will be on a time and materials basis in accordance with the rates shown on the attached Rate Schedule. Printing, shipping, and mileage reimbursement will be treated as a reimbursable expense per the attached rate schedule. Billing rates are valid for work performed through December 31, 2012. Services provided after December 31, 2012 are subject to annual adjustment.

Please let us know if this scope of work is acceptable to you or if you require any modifications. Upon agreement of the scope, we will forward our standard contract documents for your signature or review the Districts standard documents for agreement.

We thank you for the opportunity to present this proposal for consideration. If you have any questions regarding our proposed scope of services or the associated fees, please do not hesitate to contact me at (831)649-5225 or at rweber@whitsonengineers.com

Sincerely,

WHITSON ENGINEERS

Richard Weber PE, LS RCE 55219

Principal

Hourly Summary
Sleepy Hollow Ford Removal and Bridge Replacement Project
Carmel Valley, CA

Task 1 - Constructability Review																
DESCRIPTION		Pl	<u>E</u>	9	<u>CE</u>	<u>CE</u>	 AE2	<u>ET</u>	PE	(CSEG)	CE	(CSEG)	SI	DII(CSEG)	<u>HOURS</u>	COST
1.1 Coordinate with Bridge Contractor		4	1							10		16			30	\$ 4,360
1.2 Coordinate with Big R bridge manufacturer												4			4	\$ 420
1.3 Constructability Review Memorandum		2	2							2		12		4	20	\$ 2,410
1.4 Project Management Services		2	2												2	\$ 390
	Subtotal	8	3		0	0	0	0		12		32		4	56	\$ 7,580
	Rate	\$	195	\$	160	\$ 140	\$ 150	\$ 130	\$	190	\$	105	\$	95		
	Cost	\$ 1	,560	\$	-	\$ -	\$ -	\$ -	\$	2,280	\$	3,360	\$	380		
	Subtotal															\$ 7,580
Reimbursable Expen	ses (T&M)															\$ 750
To	tal Task 1															\$ 8,330

Task 2 - Superstructure PS&E														
<u>DESCRIPTION</u>		<u>PE</u>	 SCE_	<u>CE</u>	AE2	<u>ET</u>	PE	(CSEG)	CE	(CSEG)	SI	DII(CSEG)	<u>HOURS</u>	COST
2.1 Prepare Performance Based Specifications				1				2		10			13	\$ 1,570
2.2 Coordinate with Big R bridge manufacturer										2			2	\$ 210
2.3 Coordinate superstructure design with abutments				2				2		6		4	14	\$ 1,670
2.4 Prepare Cost Estimte for superstructure				1				1		3			5	\$ 645
2.5 Perform indepentent in-house QC Check		2		2				2		5			11	\$ 1,575
2.6 Plan Check Comments				2				2		6		2	12	\$ 1,480
2.7 Project Management Services		2											2	\$ 390
Subto	tal	4	0	8	0	0		9		32		6	59	\$ 7,540
Ra	ite \$	195	\$ 160	\$ 140	\$ 110	\$ 100	\$	190	\$	105	\$	95		
Co	st \$	780	\$ -	\$ 1,120	\$ -	\$ -	\$	1,710	\$	3,360	\$	570		
Subto	tal													\$ 7,540
Reimbursable Expenses (T&	M)													\$ 430
Total Tasl	< 2													\$ 7,970

Grand Total \$ 16,300



9699 Blue Larkspur Lane • Suite 105 • Monterey, CA 93940 831 649-5225 • Fax 831 373-5065

FEE SCHEDULE

Category	FEE SCHEDULE	Hourly Rate
PRINCIPAL ENGINEER		\$ 195.00
PRINCIPAL ENGINEER (Court Hearing	/ Expert Witness)	\$ 250.00
SENIOR CIVIL ENGINEER		\$ 160.00
CIVIL ENGINEER		\$ 140.00
LAND SURVEYOR		\$ 150.00
ASSOCIATE ENGINEER		\$ 130.00
ASSOCIATE SURVEYOR		\$ 130.00
ASSISTANT ENGINEER		\$ 110.00
SURVEY PROJECT MANAGER		\$ 110.00
SENIOR ENGINEERING/SURVEY TEC	HNICIAN	\$ 105.00
ENGINEERING/SURVEY TECHNICIAN		\$ 100.00
ONE PERSON SURVEY CREW (Prevai	ling Wage)	\$ 160.00
ONE PERSON G.P.S. SURVEY CREW	(Prevailing Wage)	\$ 220.00
TWO PERSON SURVEY CREW (Preva	iling Wage)	\$ 260.00
TWO PERSON G.P.S. SURVEY CREW	(Prevailing Wage)	\$ 320.00
THREE PERSON SURVEY CREW (Pre	vailing Wage)	\$ 350.00
ADMINISTRATIVE SUPPORT		\$ 65.00
ENGINEERING AIDE		\$ 65.00
PROFESSIONAL SERVICES BY OTHE	RS	COST PLUS 15%
MATERIALS, POSTAGE, REPRODUCT	TION, TELEPHONE	COST PLUS 15%
MILEAGE		per Current Federal Rate

Rates effective February 22, 2008 #33

CHARGE RATE SCHEDULE

Principal	190.00/hr
Associate	170.00
Construction Manager	150.00
Engineering Manager	150.00
Resident Engineer/Structure Representative	140.00
Assistant Structure Representative	130.00
Project Administrator	125.00
Senior Engineer	125.00
Project Engineer	115.00
Staff Engineer	105.00
Structural Designer II	95.00
Structural Designer I	85.00
Senior Computer Drafter	95.00
Computer Drafter	85.00
Junior Computer Drafter	80.00
Administrative Assistant	70.00
Secretarial Services	60.00
Expert Witness Services	275.00

Subconsultants Cost Plus 10% Expenses Cost Plus 15%

CADD Services

Plots/Prints on Bond \$1.50/sq. ft.

Mylar Plots \$3.00/sq. ft.

Copies \$0.05 per b/w copy

\$0.25 per color copy

Charge Rates Applicable January 1, 2012 through December 31, 2012

