MEMORANDUM

To:

Mayor McConnell and Members of the Assembly

Mark Gorman, Municipal Administrator

From:

Dan Tadic, P.E., Municipal Engineer DT

Stephen Weatherman, P.E., Senior Engineer

Reviewed:

Michael Harmon, P.E., Public Works Director

Mike Middleton, Deputy Finance Director

Tori Fleming, Contract Coordinator Brenda Calkins Grant Accountant

Date:

December 17, 2014

Subject:

Eagle Way and Old Harbor Mountain Road Upgrades and Ownership Transfer

Approval to Award Design Contract

Background:

A Request for Qualifications for design of the Eagle Way and Old Harbor Mountain Road Utility and Road Upgrades Project was published in accordance with City and Borough procurement policy. The project includes reconstruction and paving of the roadways, storm facilities and a new water line within Eagle Way. The project also includes curb and gutter and a pedestrian amenity for Eagle Way where applicable. Five (5) proposals were received and scored by a Selection Committee consisting of CBS Public Works Department staff. A project team led by DOWL HKM was selected as the most qualified firm to complete the design.

DOWL HKM has provided a fee proposal for a not to exceed time and expense cost of \$112,728.00 for the design of the Eagle Way and Old Harbor Mountain Road Upgrades Project. A copy of that proposal is attached.

Analysis;

Public Works has set a design completion date of September, 2015. Construction is currently planned to begin spring 2016. The total project cost is estimated to be \$1,500,000. A Memorandum of Agreement (MOA) between the State of Alaska and the City and Borough of Sitka for Eagle Way has been signed. The MOA states that CBS will take ownership of Eagle Way upon completion of the improvements.

Fiscal Note;

The project is funded by way of the following source.

• 2012 Designated Legislative Grant Program

\$1,500,000

Recommendation:

Approve award of a design contract for the Eagle Way and Old Harbor Mountain Road Utility and Road Upgrades Project to DOWL HKM with a not to exceed amount of \$112,728.00.

- The field work is expected to take two days, and we plan to perform the work in February. The report will be available approximately three to four weeks after completion of the field exploration.
- The findings of the field and laboratory testing will be analyzed and interpreted. A single report will be issued that presents:
 - The data obtained from the field exploration and laboratory testing,
 - Our analysis and interpretation of the data,
 - o Recommended geotechnical design parameters for installation of the water and storm lines, and
 - Recommendations for associated construction earthwork and construction inspection and testing.
- Assumptions The fee is based on the anticipated soil conditions, scope of work described above, and the
 following assumptions. If you have any additional information regarding the site conditions, if you would
 like the scope expanded, or if any of the assumptions are incorrect, please contact us so revisions can be
 made.
 - The client will assist with legal entry and access onto the site for DOWL HKM to perform the exploration.
 - The geotechnical investigations for Eagle Way and Old Harbor Mountain Road will be performed concurrently, under a single mobilization.
 - The site is accessible with a truck-mounted GeoProbe drill rig.
 - Traffic control consisting of signs and cones will be sufficient; no flagging will be required.
 - Test borings will be backfilled with cuttings.

Preliminary Engineering (35%)

- Early February 2015 As lead designer, I will perform on-site research and reconnaissance in conjunction
 with the geotechnical exploration and topographic survey. This 3 day site visit will also include meeting
 with you and CBS Public Works staff to review existing conditions; maintenance issues; and desired
 improvements for the roadway, water, sewer, and storm drainage systems. I will also plan to meet with
 residents of each street to gather information about individual properties.
- Late March 2015 DOWL HKM will provide the following deliverables:
 - 1. Geotechnical Report
 - 2. Completed Base Mapping
 - 3. Preliminary Design (35%)

Eagle Way:

- Upon completion of the Base Map, work with CBS to develop the proposed layout, pedestrian improvements, and typical section
- Make recommendations for the storm drainage system and the water main system
- Drawings:
 - Title Sheet (covers both projects)
 - Legend Abbreviations, and General Notes (covers both projects)
 - Typical Sections
 - Test Boring Logs
 - Water Sewer & Storm Plan
 - Profile
 - Engineer's Estimate

Old Harbor Mountain Road:

- Upon completion of the Base Map, work with CBS to develop the proposed layout and typical section
- Make recommendations for the storm drainage system and the addition of a sanitary sewer manhole to the sewer main coming down the hill from the mobile home park.
- Evaluate the ground water seepage observed on the uphill end of the project area and make recommendations to address the problem.
- Drawings:
 - Typical Sections
 - Test Boring Logs
 - Sewer & Storm Plan
 - Profile
 - Engineer's estimate

Final Design (65% through Bid-ready Documents)

- 65% design plans and updated engineer's estimate will be submitted electronically by the end of May,
 2015. In addition to the plan sheets included in the 35% submittal, this submittal will include the Traffic Control Sheet, Demolition Plan, and the Curb & Gutter Layout. The submittal will also include draft Special Provisions and an updated engineer's estimate.
- Public Meeting The Project Engineer will be available to attend a public meeting to discuss the project
 with property owners and stake holders affected by the two projects. We suggest holding a public
 meeting following the 65% submittal. However, we can change the timing of the public meeting if CBS
 prefers a different time frame.
- 95% design plans and Special Provisions will be submitted electronically by the end of July, 2015. This submittal will have all plan sheets, Special Provisions, and engineer's estimate. This plan set will also be submitted to the Alaska Department of Environmental Conservation (DEC) for their Engineering Plan Review. CBS will submit fees for this review directly to the DEC.
- 100% bid-ready contract documents with final engineer's estimate will be submitted in CBS format by the
 end of September, 2015. This submittal will include a full set of bid documents. The final civil plan set for
 both Eagle Way and Old Harbor Mountain Road will include the following sheets:
 - a. Cover sheet
 - b. General notes, abbreviations, and symbols
 - c. Survey control map
 - d. Sheet key map
 - e. Typical sections and Details
 - f. Demolition plans
 - g. Painted traffic markings (if appropriate) and signage
 - h. Grading plans
 - i. Sewer, storm and water plans
 - i. Profile views
 - k. Additional sheets as necessary

Following is our estimated fee proposal based on the preceding scope of work and a rough construction estimate of approximately \$840,000 total for both projects:

Survey and Mapping	\$19,509
Geotechnical Exploration	\$20,899
Civil Design (35%)	\$26,522
Civil Design (65% to Final)	<u>\$45,798</u>
TOTAL ESTIMATED NOT-TO-EXCEED FEE:	\$112,728

Please contact me if you have questions, or require additional information.

Sincerely, DOWL HKM

Matt McGuan, P.E. Project Manager

FIRM:	DOWL HKM		PROJE	CT TITLE	Eagle Way	ay and Old Harbor Mountain Road Utility and Road Upgrades									
TASK NO.	1	TASK DESCRIPTION:	Survey & Base Ma	apping			CLIENT:	City & Boroug	h of Sitka				DATE:	12/12/2014	
GROUP:		METHOD OF PAYMENT:	FP 🗌	FPPE 🗀	T& u ☑	СРБ□				PREPARE	D BY:	B. Pence,	M. McGuan		
SUB- TASK NO.	SUB-T	ASK DESCRIPTION	Prof. Land Surveyor (BP)	2-Person Survey Crew	Survey Party Chief (BG)	Survey Tech (NC)	AutoCAD Toch (JK)								
	Project Manager	nent	2												
	Mobilization & T	ravel	4		4	6									
	Site Work (Both	Sites)										ļ			
	Control Survey Topographic Sur	уву	6	8 22	- 8	4							<u> </u>	-	
	Property Line Do Survey Base Ma		16		4		28						<u> </u>	 	
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	BOR HOURS		36	30	16	10	28								
LABOR CO	CATES (\$/HR)		\$165.00 \$5,940.00	\$180.00 \$5,400.00	\$100.00 \$1,600.00	\$95.00 \$960.00	\$100.00 \$2,800.00						· · · · · ·		
									TOTAL	COMMEN	TS:				
	EXPENSE ITEM	(S)					QUANTITY	UNIT PRICE	PRICE	ll .					
	Airfare (JNU-SIT						3	\$360.00							
		days, 2 x 4 days)					10	\$68.00 \$125.00	\$680,00 \$875,00	 					
	Lodging (1 x 1 right, 2 x 3 rights) AHMS (Ship survey vehicle)						1 1	\$184.00	\$184.00						
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							<u> </u>			FIRM'S TOTAL COST OF LABOR (or Fixed Price):					\$16,690
::*:*:				 			TOTAL	L EXPENSES:	\$2,819	FIRM'S TOT	AL EXPE	NSES:			\$2,819
.;.;.;.;.	<u> </u>	SU	B-CONTRACTORS:			<u>, , , , , , , , , , , , , , , , , , , </u>	. 10174	E EN ENGES.	\$2,013	FIRM'S TOT	AL COST	「(no Subco	ntracts or Fe	ю)	\$19,509
FIRM:				I			T			TOTAL SUBCONTRACTOR PRICES:				\$0	
AMOUNT:		1	T	Ī						TOTAL COST:					\$19,509

FIRM:	DOWL HKM				PROJECT TITLE: Eagle Way and Old Harbor Mountain Road Utility and Road Upgrades									
TASK NO.	2	TASK DESCRIPTION:	Geotechnical Expk	oration			CLIENT:	City & Boroug	n of Sitka			DATE:	12/12/2014	
GROUP:		METHOD OF PAYMENT:	FP □	FPPE 🗌	T&M	СР€				PREPARED BY	r: O. Lage,	M, McGuan		
SUB-			1											
TASK NO.	SUB-T	ASK DESCRIPTION	Geotochnical Engineer	Field Engineer/ Geologist	AutoCAD Tech	Admin Assistan								
	Project Manager	nent	2	2										
	Mobilization/Den	pobilization		8	 		 	 		 		+		
	Travel			12										
	-:	n'			ļ			ļ						
	Site Work (Both !	S(es)		8	├─	+		 					 	
	Test Hole Loggin	ю.		12	 	 	 	1		 		1		
	Geotechnical En	gineering	4	12	L	1	L			L_				
	Geotechnical Re	port Preparation	4	16	6	4								
								ļ				+	+	
TOTAL LA	BOR HOURS		10	70	6	4	 	+		 	 -	+		
	ATES (\$/HR)		\$165.00	\$110,00	\$95.00	\$90.00	 	 		-		 	·	
LABOR CO			\$1,650.00	\$7,700.00	\$570,00	\$360.00	<u> </u>							
										COMMENTS:				
	EXPENSE ITEM						QUANTITY	UNIT PRICE	TOTAL PRICE					
	Laboratory Testin								4170.00	-Ei				
	Visual Classificat Sieve Analysis, S	tion, Moisture Content, Dry Str					36	\$13.00 \$130.00	\$468.00 \$1,560.00	-{[
	Hydrometer - Fro		-				4	\$130.00	\$440.00	t i				
	Organic Content,						4	\$90.00	\$360.00	14				
							E							
	PVC Pipe (\$1 pe	r foot)					80	\$1,00	\$80.00	Į.				
	Air Frieght	T					1 1	\$300.00 \$700.00	\$300.00 \$700.00	Æ				
	Airfare (ANC - SIT roundtrip) & Parking Per Diem Lodging						1 2	\$68.00	\$136.00	ľ				
							2	\$125.00		FIRM'S TOTAL C	OST OF LABO	R (or Fixed P	rico):	\$10,280
	Loogg	<u> </u>	1-2120:00	+4,00,00	FIRM'S TOTAL E				\$4,294					
mad						11111111111	TOTA	L EXPENSES:	\$4,294	1				3 1,20
			TORS: Firm and Pri	ice Per Task (Inclu						FIRM'S TOTAL C	OST (no Subc	ontracts or Fe	e):	\$14,574
FIRM:	Cuff	Blakeely (Drilling)				Ť	T	T		TOTAL SUBCON				\$6,325
AMOUNT:		\$6,325	†			1		1			ī	OTAL COST	:	\$20,899

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FIRM:	DOWL HKM						PROJE	CT TITLE	Eagle Way	and Old Harbor Mo	ountain Road I	Utility and Ro	oad Upgrades	
ASK NO.	3A	TASK DESCRIPTION:	Engineering and Des	sign - 35% Submitta	1		CLIENT:	City & Borou	gh of Sitka			DATE:	12/12/2014	
GROUP:		METHOD OF PAYMENT:	FP 🗍	FPPE	T&W 🗹	CPF#				PREPARED BY:	M. McGu	an		
SUB-				T = 1 11		Linai			,					
TASK NO.	SUB-T.	ASK DESCRIPTION	Engineer VII (PLH)	Engineer IV (MVM)	Engineer II (CS)	AutoCad Tech (JK)	Admin Assistent		<u> </u>			<u> </u>		
	Project Managen	nent		8 .			2						-	
	Draliminan Faul	neering - Eagle Way	<u> </u>			├		ļ	-			+		
	As-Built Review			20				 					+	
	Conceptual Design		4	40					+		+		+	
	Title Sheet (cove		 	+	-	 	 				 -	+	-	
		al Notes (both sites)		 		 	_	 	+		 -	+	+	
	Test Boring Logs			4		4		├	+		-	+	+	
\rightarrow	Typical Sections	(both sites)	2	8	4	1 -		-	+			+		
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		Som Plan							 					
	Profile		2	4		4			ļ. 			+	+	
\rightarrow	Engineer's Estim	ate	1	8	2	2		— —	 	- -	-	+	+	
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	Engineer's Estim	ato	 	4	2	1		 			-	+		
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OTAL LA	BOR HOURS		19	137	12	19	2							
	RATES (\$/HR)		\$180.00	\$135,00	\$105.00	\$100.00	\$85.00							
ABOR CO			\$3,420.00	\$18,495.00	\$1,260.00	\$1,900.00	\$170.00	-					1	
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	Per Diem (4 days						4	\$68.00	\$272.00	13				
	Lodging (3 nights)						3	\$125.00		11				
	Rental Car						3 .	\$90.00		11				
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										FIRM'S TOTAL CO	ST OF LABO	R (or Fixed F	rice):	\$25,
						FIRM'S TOTAL EX	PENSES:			\$1,				
							TOTA	L EXPENSES:	\$1,277					
		SUB-	CONTRACTORS: Fire	m and Price Per Ta	sk					FIRM'S TOTAL COST (no Subcontracts or Fee):				\$26,
FIRM:										TOTAL SUBCONT	RACTOR PRI	CES:		
AMOUNT:								i	1		OTAL COST	7:	\$26,5	

Dosign (35%) 12/12/2014 10:24 AM

FIRM	DOWL HKM					7111117121		CT TITLE:	Fagle Way	and Old Harbs	or Mountain	Road Litil	lity and Br	ad Ungrados	
TASK NO.	38	TASK DESCRIPTION:	Engineering and Design - 65% through Final Submittal CLIENT: City & Bord												
GROUP:		METHOD OF PAYMENT:	FP []	FPPE	T&W 🖸	CPFF.)			PREPARED	BY: M	McGuan		12/12/2014	
SUB- TASK NO.	SUB-T	ASK DESCRIPTION	Engineer VII (PLH)	Engineer IV (MVM)	Engine or II (CS)	AutoCad Tech (JK)	Admin Assistent								
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	Public Meeting			8											
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	Test Boring Logs			1		1									
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	Details			44	4										
	Assembly Tables	·		1		4			ļ	\vdash				+	
	Demolition Plan			4	4	1	-	 	 	\longrightarrow				+	
	Curb & Gutter La Water, Sewer, &	ayout, Grades, & Painting	8	80 40	 	12			-	 -		-		-	
	Profile	Storm Plan		2		8									
	Engineer's Estim	ate & Bid Teb	4	16	4	2			 						
	Special Provision		4	40			8		 					+	
	DEC Review		 	16		·	<u> </u>			\vdash		$\overline{}$		1	
	Review Meetings	5	2	8				1	f	1		$\overline{}$		1 1	
	Assistance Durin		2	8			-								
OTAL LA	BOR HOURS		30	241	20	41	12	<u> </u>							
	ATES (\$/HR)		\$180,00	\$135.00	\$105.00	\$100.00	\$85.00								
ABOR CO	OSTS (\$)		\$5,400.00	\$32,535.00	\$2,100.00	\$4,100.00	\$1,020.00								
	ITEM(S)								TOTAL	COMMENTS:					
	Airfare (JNU-SIT round trip for Public Meeting)							\$360.00		11					
	Per Diem						1	\$68.00		11					
	Lodging						1	\$125.00		11					
	Rental Car						1	\$90.00	\$90.00	li					
								1		FIRM'S TOTA			or Fixed P	rice):	\$45,15
1111111						1111111111	TOTA	L EXPENSES	: \$643	FIRM'S TOTA	AL EXPENS	ES:			\$64
, - , - , - , -			CONTRACTORS: Fire							FIRM'S TOTA	L COST (ne	o Subcont	racts or Fe	90):	\$45,79
FIRM:								Γ		TOTAL SUBO					\$
AMOUNT:	-						TOTAL SUBCONTRACTO							\$45,79	