Ivins City Staff Report
City Council Meeting 9/15/2016

Agenda Item: Approval of expenditure for construction of Cliff Rose 2 MG Culinary Water Tank

Submitted by: Thomas J. Jorgensen, P.E., Assistant Public Works Director

Recommended City Council Action:
Approve expenditure of $1,203,078 for construction of Cliff Rose 2MG Culinary Water Tank plus an additional $60,000 for contingency for a total of $1,263,078.

Approve expenditure of $85,200 for construction period services for the Cliff Rose 2MG Culinary Water Tank construction plus an additional $4,200 for contingency for a total of $89,400.

BACKGROUND:
The Cliff Rose 2 Million Gallon Culinary Water Tank project consists of removing the existing 1-million-gallon steel tank and constructing a new 2-million-gallon concrete tank in its place. The project also includes a new access road into the bottom of the tank site, a rock fall protection berm, and site grading. The replacement is a recommended improvement from the 2013 Culinary Water Master Plan to increase storage capacity. Staff and Sunrise Engineering bid the project and five bids were received.

Additionally, during the RFP for engineering services process, engineering firms were asked to include cost estimates for providing construction period services. The construction period services were not approved as part of the original staff report when the Council approved engineering services for the tank design. Therefore these services have been included with this staff report now that the project is entering the construction phase.

FINDINGS AND ANALYSIS:
The following bids were received:

	Total
Dale Cox Contracting, Inc.	$1,203,078
Gerber Construction, Inc.	$1,260,400
Interstate Rock Products, Inc.	$1,367,438
Dry Creek Structures, LLC	$1,429,212
ProBuild Construction, Inc.	$2,239,750

The apparent low bidder for the project was Dale Cox Contracting, Inc. with a bid price of $1,203,078. Staff requests that the Council approve the expenditure of $1,263,078 to include a contingency for potential change orders for construction of the tank and approve the expenditure of $89,400 to include a contingency for potential change orders for construction period services.

The Council should be aware that staff is working on expanding the project to include some piping reconfiguration around the tank and relocating a water line away from private properties to within Cliff Rose Way. The original budget for this project was $1,925,000. The current estimated expenditures for construction and engineering totals approximately $1,400,000, leaving approximately $525,000 remaining in the budget. Staff anticipates that the expanded scope of work and engineering efforts will remain within the original budget for the project. More information will be provided to the City Council as staff moves forward with the project expansion.

SUPPORT MATERIALS:

- Bid Tabulation
- Sunrise Engineering – Letter of Recommendation
- Construction Period Services – Scope of Work & Estimate of Services

FINANCIAL IMPACT:

GL 51-42-877: $1,263,078 for Construction
GL 51-42-877: $89,400 for Construction Period Engineering Services

Respectfully Submitted: _____
Thomas J. Jorgensen, P.E., Assistant Public Works Director

Content Review: _____
Dale Coulam, City Manager

III. Scope of Services: Cliff Rose 2 MG Concrete Tank

CONSTRUCTION PERIOD SERVICES

The Construction Period Services are scheduled to last up to 6 months after the detail design services are complete and will include the following:

A. Pre-construction Meeting

1. SEI will prepare for and attend a pre-construction meeting with the City and the Contractor.

B. Construction Progress Meetings and Support Services

1. SEI will provide submittal review, response to Contractor Requests for Information, review change order requests from the Contractor and make recommendations regarding said change order requests, review of pay applications for the duration of the construction period, and conduct project closeout at completion of the work.

2. SEI will prepare for and attend weekly construction progress meetings.

C. Construction Observation

1. SEI will provide construction observation services up to 20 hrs/wk for a period of up to 6 months. As stated previously, we feel this may be reduced if the construction schedule can be accelerated or increased if the City desires to have an observer on site more frequently.

2. The observer will provide reports and photographic logs of construction as necessary. A public works inspector from Ivins City will be available daily to assist SEI with the construction observation services.

3. SEI will provide an inspection with the contractor and the City at substantial completion, final completion, and just prior to warranty expiration. Prepare and deliver to Ivins a written list of observed deficiencies.

4. Materials testing services are not included in the scope of this contract.

D. Project Documentation

1. SEI will use redlined drawings provided by the Contractor to develop contract record drawings for the project.
2. SEI shall assist the City in closing out the project and obtaining an Operating Permit from the Utah Division of Drinking Water.

CLIFF ROSE 2 MG CULINARY WATER TANK REPLACEMENT PROJECT
IVINS CITY
CONSTRUCTION PERIOD SERVICES
Sunrise Engineering Inc
Project Engineer's Estimate of Civil Engineering Services

SERVICE TYPE				Construction Administration Phase						HOURS PER CLASS	COST PER CLASS
PHASE				001	001	001	001	001	001		
TASK				0001	0002	0003	0004	0005	0006		
TASK DESCRIPTION				Pre-construction Meeting	Support Services (PR, CO, submittals)	Progress Meetings	Construction Inspection	Contract Record Drawings	Close-out and Operating Permit		
CLASS	TEAM	RATE	BUDGET →	$2,700	$16,600	$14,600	$44,300	$2,700	$4,300		
103	Steven Hall	$125.00	Hours	12	80	64		6	20	182	
			Cost	$1,500	$10,000	$8,000		$750	$2,500		$22,750
105	Dustyn Shaffer	$159.00	Hours	6	32	32			6	76	
			Cost	$954	$5,088	$5,088			$954		$12,084
352	Andy Brown	$79.00	Hours	2			520	8	2	532	
			Cost	$158			$41,080	$632	$158		$42,028
403	Don Leonard	$85.00	Hours					16	2	18	
			Cost					$1,360	$170		$1,530
51	Kylie Johnson	$41.00	Hours	2	12	12			8	34	
			Cost	$82	$492	$492			$328		$1,394
52	Carole Ingalls	$51.00	Hours		12	12			4	28	
			Cost		$612	$612			$204		$1,428
-	Mileage	$0.59	Miles	30	600	600	3250		30	-	
			Cost	$17.70	$354.00	$354.00	$1,917.50		$17.70		$2,661
-	Per Diem Meals	$10.00	Days		8	8	130			-	
			Cost		$80	$80	$1,300				$1,460
-	Misc. - Contingency	$100.00	Cost							-	
TOTAL			HOURS	22	136	120	520	30	42	870	$85,335
			TASK COST	$2,712	$16,626	$14,626	$44,298	$2,742	$4,332		$85,335
			ROUNDED	$2,700	$16,600	$14,600	$44,300	$2,700	$4,300		$85,200

IVINS CITY
IVINS CITY - CLIFF ROSE 2MG TANK PROJECT
Bid Opening Date: September 9, 2016

SUNRISE ENGINEERING

BID TABULATION

No.	Item	Qty	Unit	Engineer's Estimate		Dale Cox Contracting, Inc.		Gerber Construction, Inc.		Interstate Rock Products, Inc.		Dry Creek Structures, LLC		ProBuild Const. Inc.	
				UNIT PRICE	AMOUNT	Unit Price	Amount	Unit Price	Amount	Unit Price	Amount	Unit Price	Amount	Unit Price	Amount
1	Mobilization	1	LS	$ 61,000.00	$ 61,000.00	$ 75,000.00	$ 75,000.00	$ 120,000.00	$ 120,000.00	$ 70,000.00	$ 70,000.00	$ 140,000.00	$ 140,000.00	$ 200,000.00	$ 200,000.00
2	Pre-Construction DVD	1	LS	$ 500.00	$ 500.00	$ 1,000.00	$ 1,000.00	$ 390.00	$ 390.00	$ 240.00	$ 240.00	$ 650.00	$ 650.00	$ 2,500.00	$ 2,500.00
3	Flowable Backfill	10	CY	$ 120.00	$ 1,200.00	$ 200.00	$ 2,000.00	$ 160.00	$ 1,600.00	$ 100.00	$ 1,000.00	$ 160.00	$ 1,600.00	$ 350.00	$ 3,500.00
4	Subsurface Investigation	10	HR	$ 160.00	$ 1,600.00	$ 170.00	$ 1,700.00	$ 170.00	$ 1,700.00	$ 120.00	$ 1,200.00	$ 220.00	$ 2,200.00	$ 250.00	$ 2,500.00
5	Removal and Disposal of Existing Tank	1	LS	$ 20,000.00	$ 20,000.00	$ 19,000.00	$ 19,000.00	$ 22,000.00	$ 22,000.00	$ 19,250.00	$ 19,250.00	$ 19,000.00	$ 19,000.00	$ 15,000.00	$ 15,000.00
6	Site Earthwork	1	LS	$ 30,000.00	$ 30,000.00	$ 86,187.00	$ 86,187.00	$ 136,500.00	$ 136,500.00	$ 60,200.00	$ 60,200.00	$ 150,000.00	$ 150,000.00	$ 100,000.00	$ 100,000.00
7	Construct 2MG Concrete Water Tank	1	LS	$ 975,000.00	$ 975,000.00	$ 794,669.00	$ 794,669.00	$ 805,000.00	$ 805,000.00	$ 946,600.00	$ 946,600.00	$ 870,000.00	$ 870,000.00	$ 1,450,000.00	$ 1,450,000.00
8	Protect and/or Replace Landscaping	1	LS	$ 1,500.00	$ 1,500.00	$ 16,000.00	$ 16,000.00	$ 3,900.00	$ 3,900.00	$ 8,000.00	$ 8,000.00	$ 16,000.00	$ 16,000.00	$ 25,000.00	$ 25,000.00
9	Asphalt Removal & Disposal	7,600	SF	$ 0.50	$ 3,800.00	$ 0.30	$ 2,280.00	$ 0.35	$ 2,660.00	$ 0.25	$ 1,900.00	$ 0.52	$ 3,952.00	$ 1.00	$ 7,600.00
10	Bituminous Surfacing (2-1/2" Thickness)	10,900	SF	$ 2.75	$ 29,975.00	$ 1.75	$ 19,075.00	$ 1.40	$ 15,260.00	$ 1.25	$ 13,625.00	$ 1.50	$ 16,350.00	$ 4.00	$ 43,600.00
11	Untreated Base Course (6" Thickness)	15,100	SF	$ 1.25	$ 18,875.00	$ 1.00	$ 15,100.00	$ 0.90	$ 13,590.00	$ 0.73	$ 11,023.00	$ 1.10	$ 16,610.00	$ 1.50	$ 22,650.00
12	Construct Earthen Berm	1	LS	$ 7,000.00	$ 7,000.00	$ 11,000.00	$ 11,000.00	$ 13,000.00	$ 13,000.00	$ 65,000.00	$ 65,000.00	$ 31,000.00	$ 31,000.00	$ 20,000.00	$ 20,000.00
13	Drainage Inlet	1	LS	$ 7,000.00	$ 7,000.00	$ 2,300.00	$ 2,300.00	$ 3,400.00	$ 3,400.00	$ 2,500.00	$ 2,500.00	$ 900.00	$ 900.00	$ 2,000.00	$ 2,000.00
14	36" RCP (Storm Drain)	100	LN FT	$ 100.00	$ 10,000.00	$ 120.50	$ 12,050.00	$ 110.00	$ 11,000.00	$ 104.00	$ 10,400.00	$ 100.00	$ 10,000.00	$ 153.00	$ 15,300.00
15	Drainage Inline Manhole	1	LS	$ 3,700.00	$ 3,700.00	$ 4,100.00	$ 4,100.00	$ 2,600.00	$ 2,600.00	$ 3,000.00	$ 3,000.00	$ 6,000.00	$ 6,000.00	$ 5,000.00	$ 5,000.00
16	Additional Drainage Improvements	1	LS	$ 3,000.00	$ 3,000.00	$ 4,000.00	$ 4,000.00	$ 5,700.00	$ 5,700.00	$ 12,000.00	$ 12,000.00	$ 4,000.00	$ 4,000.00	$ 15,000.00	$ 15,000.00
17	8" PVC Lines, Fittings, Tracer Wire, Bedding, Backfill, & Installation (C900 DR-18)	20	LF	$ 50.00	$ 1,000.00	$ 96.50	$ 1,930.00	$ 200.00	$ 4,000.00	$ 100.00	$ 2,000.00	$ 170.00	$ 3,400.00	$ 560.00	$ 11,200.00
18	10" PVC Lines, Fittings, Tracer Wire, Bedding, Backfill, & Installation (C900 DR-18)	310	LF	$ 45.00	$ 13,950.00	$ 75.00	$ 23,250.00	$ 110.00	$ 34,100.00	$ 50.00	$ 15,500.00	$ 45.00	$ 13,950.00	$ 420.00	$ 130,200.00
19	8" Gate Valve Assembly	1	EA	$ 2,000.00	$ 2,000.00	$ 2,540.00	$ 2,540.00	$ 2,000.00	$ 2,000.00	$ 2,000.00	$ 2,000.00	$ 1,600.00	$ 1,600.00	$ 4,500.00	$ 4,500.00
20	10" Gate Valve Assembly	1	EA	$ 2,600.00	$ 2,600.00	$ 3,334.00	$ 3,334.00	$ 2,500.00	$ 2,500.00	$ 3,000.00	$ 3,000.00	$ 2,500.00	$ 2,500.00	$ 5,000.00	$ 5,000.00
21	Check Valve Assembly	1	EA	$ 6,000.00	$ 6,000.00	$ 16,820.00	$ 16,820.00	$ 14,000.00	$ 14,000.00	$ 13,000.00	$ 13,000.00	$ 14,000.00	$ 14,000.00	$ 20,000.00	$ 20,000.00
22	Flow Meter Vault (Existing Tank)	1	LS	$ 10,500.00	$ 10,500.00	$ 13,350.00	$ 13,350.00	$ 11,000.00	$ 11,000.00	$ 12,500.00	$ 12,500.00	$ 10,000.00	$ 10,000.00	$ 23,000.00	$ 23,000.00
23	Flow Meter Vault (New Tank)	1	LS	$ 10,000.00	$ 10,000.00	$ 10,893.00	$ 10,893.00	$ 8,900.00	$ 8,900.00	$ 12,500.00	$ 12,500.00	$ 9,000.00	$ 9,000.00	$ 20,000.00	$ 20,000.00
24	Retaining Wall	400	SF	$ 20.00	$ 8,000.00	$ 42.50	$ 17,000.00	$ 13.00	$ 5,200.00	$ 25.00	$ 10,000.00	$ 35.00	$ 14,000.00	$ 38.00	$ 15,200.00
25	Slope Protection	1	LS	$ 25,000.00	$ 25,000.00	$ 44,000.00	$ 44,000.00	$ 13,000.00	$ 13,000.00	$ 56,000.00	$ 56,000.00	$ 57,000.00	$ 57,000.00	$ 76,000.00	$ 76,000.00
26	Miscellaneous Fittings, Connections, & Tie-Ins	1	LS	$ 8,000.00	$ 8,000.00	$ 4,500.00	$ 4,500.00	$ 7,400.00	$ 7,400.00	$ 15,000.00	$ 15,000.00	$ 15,500.00	$ 15,500.00	$ 5,000.00	$ 5,000.00
			TOTAL		$ 1,261,200.00		$ 1,203,078.00		$ 1,260,400.00		$ 1,367,438.00		$ 1,429,212.00		$ 2,239,750.00
OPTION B - AWWA D110 TYPE I TANK (ADD OR DEDUCT)									$ -	$ -	$ -	$ -	$ -	$ -	$ -
27	Construct 2MG AWWA D110 Type I Concrete Water Tank	1	LS	$ 450,000.00	$ 450,000.00	$ -	NO BID		NO BID	$ -	NO BID	$ -	NO BID	$ -	NO BID
									$ -	$ -	$ -	$ -	$ -	$ -	$ -
OPTION C - AWWA D115 TANK (ADD OR DEDUCT)										$ -	$ -	$ -	$ -	$ -	$ -
28	Construct 2MG AWWA D115 Concrete Water Tank	1	LS	$ 50,000.00	$ 50,000.00	$ 80,000.00	$ 80,000.00	$ 80,000.00	$ 80,000.00	$ 70,000.00	$ 70,000.00	$ -	NO BID	$ 35,000.00	$ 35,000.00

PROFESSIONAL ENGINEER
No. 8328781
STEVEN B. HALL
STATE OF UTAH
9/13/16

Engineer, P.E.

SUNRISE
ENGINEERING

11 North 300 West, Washington, Utah 84780
TEL 435.652.8450 | FAX 435.652.8416 | sunrise-eng.com

September 13, 2016

Mr. Charles Gillette
Ivins City Engineer
55 North Main
Ivins, UT 84738

RE: City of Ivins – Cliff Rose 2MG Tank Project
Engineer's Recommendation for Award of Bid

Dear Mr. Gillette,

After reviewing the Bids received on September 9, 2016, for the Ivins City Cliff Rose 2MG Tank Project, we have found Dale Cox Contracting, Inc. to be the lowest responsible Bidder for this project and therefore recommend award to Dale Cox Contracting, Inc., for Option A.

Attached herewith are four copies of the Notice of Award. If the City chooses to move forward with our recommendation, please sign each copy of the Notice of Award in the appropriate signature block and return them to our office. We'll then forward them to Dale Cox Contracting for acknowledgement.

Please call me at (435) 652-8450 with any questions.

Sincerely,

Steve Hall, P.E.
Project Engineer
Sunrise Engineering, Inc.

SUNRISE ENGINEERING

FEE SCHEDULE

EXHIBIT A

Work Code	Work Classification	Hourly Rate	Work Code	Work Classification	Hourly Rate
101	Engineer Intern (E.I.T.) I	$89	404	CAD Drafter IV	$95
102	Engineer Intern (E.I.T.) II	$99	451	Training Specialist I	$77
103	Engineer III	$125	452	Training Specialist II	$91
104	Engineer IV	$139	455	Training Specialist	$110
105	Engineer V	$159	456	Training Manager	$123
110	Principal Engineer	$179	460	Training Director	$154
121	Electrical Engineer Intern (E.I.T.) I	$103	500	Funding Specialist	$115
122	Electrical Engineer Intern (E.I.T.) II	$113	510	Plan Reviewer	$107
123	Electrical Engineer III	$130	511	Building Inspector I	$59
124	Electrical Engineer IV	$150	512	Building Inspector II	$82
125	Electrical Engineer V	$165	513	Building Inspector III	$102
126	Principal Electrical Engineer	$185	525	Building Official	$118
301	Engineering Tech I	$69	604	GIS Tech	$83
302	Engineering Tech II	$85	611	GIS Specialist	$93
303	Engineering Tech III	$99	51	Administrative I	$41
304	Engineering Tech IV	$121	52	Administrative II	$51
311	Electrical Tech I	$79	53	Administrative III	$66
312	Electrical Tech II	$89	721	Water Rights Specialist I	$88
313	Electrical Tech III	$99	722	Water Rights Specialist II	$99
314	Electrical Tech IV	$109	723	Water Rights Specialist III	$113
315	Electrical Tech V	$119	930	Survey CAD Tech	$87
351	Construction Observer I	$59	935	One Man Survey Crew	$119
352	Construction Observer II	$79	940	Survey Manager	$129
353	Construction Observer III	$89	945	Registered Surveyor	$142
354	Construction Observer IV	$99	950	Principal Surveyor	$160
401	CAD Drafter I	$61			
402	CAD Drafter II	$71			
403	CAD Drafter III	$85			

REIMBURSABLE EXPENSE SCHEDULE

Expense	Rate	Mark-Up
Mileage	$0.59 per mile	N/A
Field Vehicle (on site)	$50 per day	N/A
Per Diem Meals	$35 per day	N/A
Troxler Nuclear Density Gauge	$40 per day	N/A
High Density Scanner	$150 per hour	N/A
Material Testing Lab Work	Actual Cost	15%
Outside Consultants, Aerial Photography, etc.	Actual Cost	15%
Lodging	Actual Cost	10%
Other Expenses incurred	Actual Cost	10%

Fee schedule will automatically change once per year in January, and is subject to change on other occasions. Base 05-2015