

Staff Report

for the Regular Meeting of the Board of Directors, February 27, 2019

TO: Board of Directors

FROM: Gary D. King, P.E., PhD, Engineering Manager
Doug Roderick, P.E., Senior Engineer

DATE: February 20, 2019

SUBJECT: Combie Phase I Canal Replacement Project – Approval of Construction Contract (FATR# 6746)

ENGINEERING

RECOMMENDATION:

Award a construction contract to Steve P. Rados, Inc. in the amount of \$19,619,000 and authorize the General Manager to execute the appropriate documents.

BACKGROUND:

The Combie Phase I Canal is a critical piece of infrastructure. 54% of NID's flows for deliveries are made through this system, serving 3,693 raw water customers, 105 of which utilize raw water for in home uses. Additionally, this facility serves two treatment plants which total 5,022 services. This facility also serves as a secondary conduit for deliveries currently made through the Bear River Canal, one of which is the wholesale delivery to PCWA for 3,427 customers in NID's service area within the City of Lincoln.

The current facility, which is approximately 8,900 feet long, is a concrete flume located along a steep hillside above the Bear River with very limited access. The facility has ongoing leaks which are monitored by NID staff on a monthly basis. There have been three separate failures. It is at high risk of future failure due to hazardous upslope conditions (trees and rock fall) and subsurface failures, especially in the fill slope areas, to due to water infiltration. This project will replace the existing concrete flume section with a single, 96-inch reinforced concrete pressure pipe (RCPP), partially buried, along the entire 8,900 feet length. This construction will occur over two fall/winter seasons when the flows are low enough to allow a bypass system to be installed.

The District contracted with Quincy Engineering, Inc. to assist with pre-qualifying contractors for Bear River Siphon and Combie Phase I Canal Replacement Project. The guideline developed by the Department of Industrial Regulations (DIR) was used for the Request for Qualifications (RFQ). The RFQ was posted to ARC Document Solutions Public Plan room (<https://order.e-arc.com/arcEOC/ARCPlanRoom.aspx>) on August 19, 2016. Staff coordinated with ARC to make sure that the advertisement was distributed to the builder's exchanges that are typical for this area. It was sent to 32 exchanges/plan rooms. After the public request for qualifications, nine contractors were prequalified on October 14, 2016, to submit quotes for the Bear River Siphon and Combie Phase I Canal Replacement Project.

The Bear River Siphon was completed in July of 2018 by Kiewit Infrastructure West Co. and is now in service. The remainder of the project now consists of replacement of the existing canal with a single 96-inch diameter pipeline. This work is split into two phases that will be built over the next two fall/winter seasons.

On December 21, 2018, the District sent out quote documents to the nine (9) prequalified contractors. Of the nine contractors, two were disqualified for not attending the mandatory pre-quote meeting and one declined to submit a quote. On February 8, 2019, the District received 3 quotes packages. The results of the quotes are shown in the table below.

Quote	Cost
Steve P. Rados, Inc.	\$19,619,000.00
T&S Construction Co., Inc.	\$19,959,684.00
Mountain Cascade, Inc.	\$27,630,000.00
Engineer's Estimate	\$20,706,000.00

Construction of this project is difficult due to the location, terrain and limited access. The construction sequence, bypass layout/installation, and constructability was part of what the contractors had to determine in submitting a quote for this project.

The project included local business preference with a goal of a minimum of 10% as a good faith effort. Steve P. Rados, Inc. (Rados) achieved a local business participation goal of 6.8% or \$1,334,092, citing that this is a specialized project that had limited opportunities from both suppliers and contractors. Rados has also stated that they will continue to seek local businesses, use local businesses for its everyday operational costs (fuel, miscellaneous supplies, etc.) and the solicitation of craft workers within District boundaries to construct the project.

Currently, construction management and inspection will be performed by District staff.

Staff is recommending that the Board award the contract with Steve P. Rados, Inc. in the amount of \$19,619,000.

BUDGETARY IMPACT:

Current budget for this project in 2019 is \$19,960,000 from Account #10151-52915-6746. After this commitment, there will remain \$341,000 in this account. The project will be constructed over two fall/winter seasons and is anticipated to be completed in 2021.

ATTACHMENTS: (2)

Combie Phase 1 - Quote Summary Sheet

Project Map

Photos of Combie Phase I Canal

DR

Combie Phase I Canal Replacement Project Contract #6746-009 -Quote Summary

BASE QUOTE - PHASE 1 (Upstream of Station 44+50)

Item	Description	T&S Construction Co., Inc.	Mountain Cascade, Inc.	Steve P. Rados, Inc.
1	Mobilization/Demobilization	\$ 100,000.00	\$ 100,000.00	\$ 100,000.00
2	Bonds, Insurance and Submittals	\$ 700,344.00	\$ 35,000.00	\$ 450,000.00
3	Storm Water Pollution Prevention Plan	\$ 14,366.00	\$ 150,000.00	\$ 130,000.00
4	Bypass System Including Piping and Dams	\$ 920,383.00	\$ 1,500,000.00	\$ 1,250,000.00
5	Demolition and Disposal of Existing Canal	\$ 273,552.00	\$ 750,000.00	\$ 600,000.00
6	96-inch RCPP	\$ 7,461,902.00	\$ 10,707,000.00	\$ 8,300,000.00
7	Micro Piles	\$ 18,177.00	\$ 250,000.00	\$ 200,000.00
8	Pipe Crossings	\$ 83,961.00	\$ 120,000.00	\$ 180,000.00
9	Transition Structure	\$ 192,462.00	\$ 200,000.00	\$ 180,000.00
10	Culverts	\$ 94,037.00	\$ 80,000.00	\$ 60,000.00
11	Site Stabilization and Restoration	\$ 408,512.00	\$ 150,000.00	\$ 800,000.00
12	Rock-Unforeseen Including Disposal	\$ 200.00	\$ 35,000.00	\$ 77,000.00
Total:		\$ 10,267,896.00	\$ 14,077,000.00	\$ 12,327,000.00

BASE QUOTE - PHASE 2 (Downstream of Station 44+50)

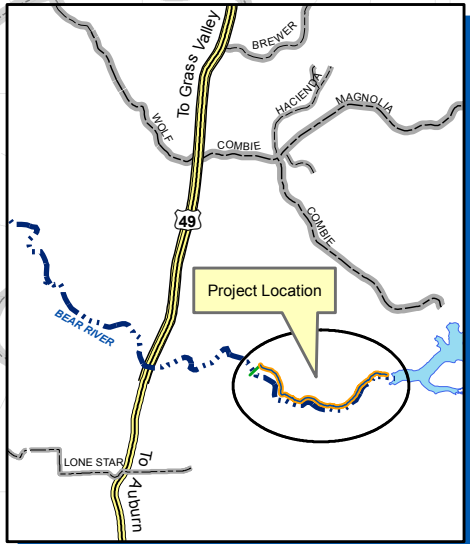
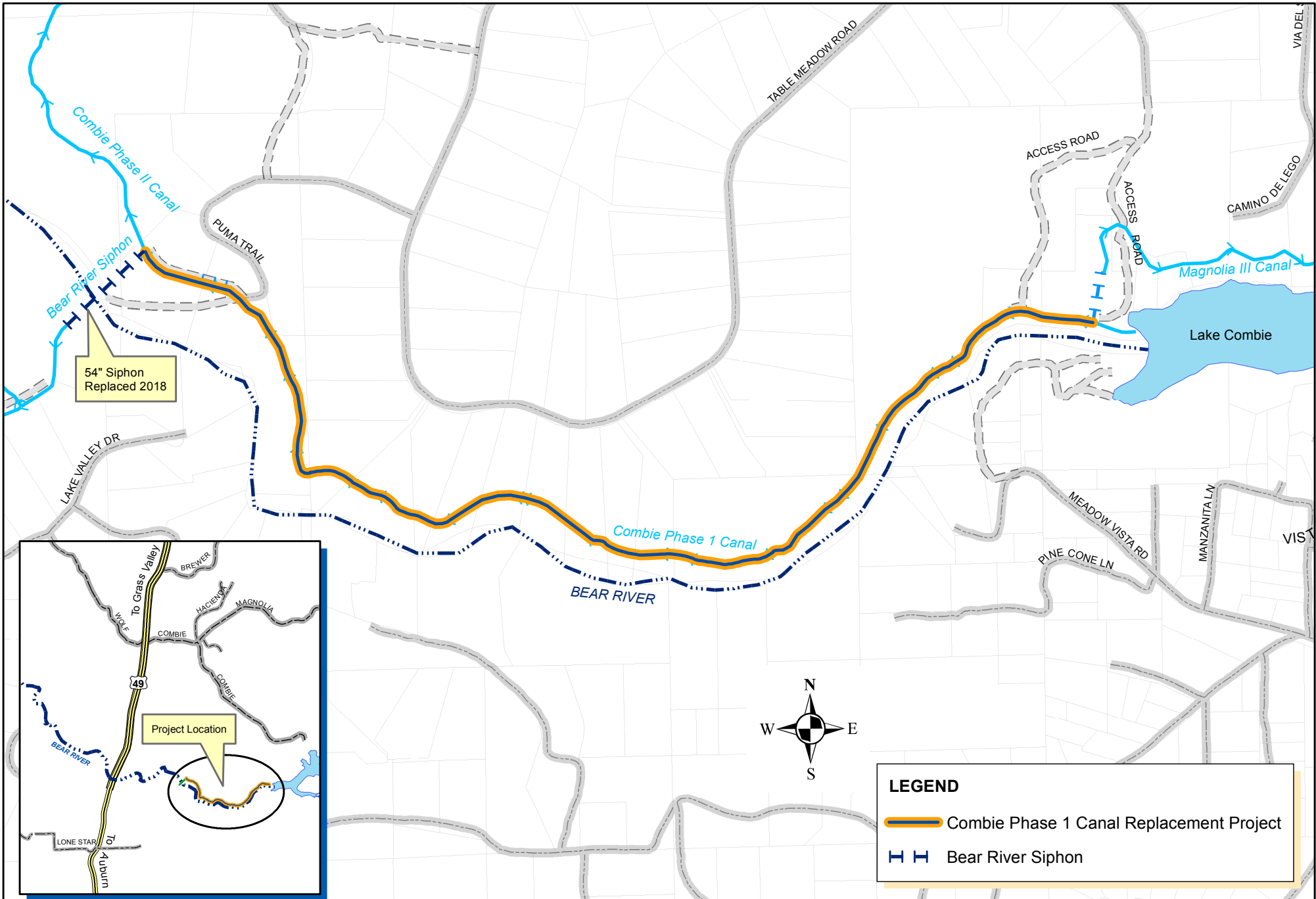
Item	Description	T&S Construction Co., Inc.	Mountain Cascade, Inc.	Steve P. Rados, Inc.
1	Mobilization/Demobilization	\$ 100,000.00	\$ 100,000.00	\$ 100,000.00
2	Bonds, Insurance and Submittals	\$ 700,344.00	\$ 25,000.00	\$ 100,000.00
3	Storm Water Pollution Prevention Plan	\$ 14,366.00	\$ 150,000.00	\$ 95,000.00
4	Bypass System Including Piping and Dams	\$ 429,171.00	\$ 1,200,000.00	\$ 150,000.00
5	Demolition and Disposal of Existing Canal	\$ 275,968.00	\$ 750,000.00	\$ 200,000.00
6	96-inch RCPP	\$ 6,995,406.00	\$ 10,270,000.00	\$ 5,900,000.00
7	Micro Piles	\$ -	\$ -	\$ -
8	Pipe Crossings	\$ 82,635.00	\$ 105,000.00	\$ 60,000.00
9	Wasteway and Siphon Control Structures	\$ 560,216.00	\$ 750,000.00	\$ 420,000.00
10	Culverts	\$ 62,248.00	\$ 18,000.00	\$ 30,000.00
11	Site Stabilization and Restoration	\$ 471,234.00	\$ 150,000.00	\$ 160,000.00
12	Rock-Unforeseen Including Disposal	\$ 200.00	\$ 35,000.00	\$ 77,000.00
Total:		\$ 9,691,788.00	\$ 13,553,000.00	\$ 7,292,000.00

Total Base Quote for Phase 1 and Phase 2: **\$ 19,959,684.00** **\$ 27,630,000.00** **\$ 19,619,000.00**

Total Alternative Quote for Phase 1 and Phase 2

combined: \$ 19,959,684.00 \$ 27,400,000.00 \$ 19,619,000.00

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NEVADA IRRIGATION DISTRICT

NEVADA COUNTY -- PLACER COUNTY
GRASS VALLEY, CALIFORNIA

COMBIE PHASE 1 CANAL REPLACEMENT PROJECT

Drawn By: D. HUNT Date: 2/21/2019 Scale: 1"=900'@8.5x11 Sheet: 1 of 1



BRACING AT JOINT WITH WALL SEPARATION AND ROTATION.



BRACING AND CABLE TIE BACKS ALONG FILL SECTION WITH WALL ROTATION.



TYPICAL JOINT LEAKAGE. NOTICE BOTTOM OF CONCRETE FLUME IS EXPOSED AROUND THE JOINT AND HAS BEGUN DETERIORATING ALONG BOTTOM.



LEAKAGE ALONG WALL.



CABLE TIE BACKS ALONG FILL SECTION WITH WALL ROTATION



TYPICAL SECTION OF CANAL