

STATE OF COLORADO

Colorado Water Conservation Board

Department of Natural Resources

1580 Logan Street, Suite 600
Denver, Colorado 80203
Phone: (303) 866-3441
Fax: (303) 894-2578
www.cwcb.state.co.us



December 14, 2012

Red Mesa Reservoir & Ditch Company
Attn: Jim Greer, President
7882 County Road 100
Hesperus, CO 81326

John W. Hickenlooper
Governor

Mike King
DNR Executive Director

Jennifer L. Gimbel
CWCB Director

RE: WSRA Grant - Spillway Alternatives Analysis

Dear Jim:

This letter is to inform you that the contract for the WSRA grant request to assist in the Spillway Alternatives Analysis in the Southwest River Basin was signed on December 14, 2012.

With the executed contract, you are now able to proceed with the project and begin invoicing the State of Colorado for costs incurred through September 30, 2013. Upon receipt of your invoice(s), the State of Colorado will provide payment no later than 45 days. I wish you much success in your project.

Sincerely,

/s/

Greg Johnson
Colorado Water Conservation Board
Water Supply Planning Section
1580 Logan Street, Suite 200
Denver, CO 80203
Phone: 303-866-3441 x3249
Mobile: 720-214-3262
gregory.johnson@state.co.us
www.cwcb.state.co.us and www.ibcc.state.co.us

EXHIBIT A

STATEMENT OF WORK

WATER ACTIVITY NAME - Red Mesa Dam & Reservoir – Spillway Alternatives Analysis

GRANT RECIPIENT – Red Mesa Reservoir & Ditch Company

FUNDING SOURCE – Southwest Basins Roundtable WSRA Basin Grant

INTRODUCTION AND BACKGROUND

The Colorado State Engineer has identified the spillway at Red Mesa Dam as seriously deficient in flood routing capacity and has directed the owners to bring the spillway into compliance with the dam safety requirements for a high hazard dam, or face significant storage restrictions or a possible breach order. A time frame of approximately three years has been established to achieve compliance.

The purpose of the proposed project is to develop a rational basis on which to determine the most cost-effective method for achieving compliance with the State Engineer's requirements. URS Corp., the Company's engineer, will evaluate several scenarios for achieving compliance, ranging from dam breaching and decommissioning to modifying the existing dam and spillway at the current reservoir storage level to allow it to pass the required spillway design flood. In addition, two scenarios for enlarging the dam and increasing normal reservoir storage capacity will be evaluated to determine the value of the increased storage in helping to offset spillway dam modification construction costs.

OBJECTIVES

The objectives of the proposed activity are as follows:

1. Develop conceptual designs for each evaluated alternative
2. Develop conceptual-level cost estimates for each alternative based on the conceptual designs and other anticipated costs, on which decisions concerning the best course of action can be based
3. Develop a recommended course of action

TASKS

Task 1 – Alternatives Development

Description of Task

Evaluate alternatives at a conceptual level to develop a cost effective solution to modify the existing spillway and dam without constructing a new dam.

Method/Procedure

The alternatives analysis will focus on the following strategies:

- Breaching the dam and draining the reservoir (essentially the “Do Nothing” Alternative)
- Spillway design based on optimizing the required spillway crest length at the existing spillway crest elevation, along with raising the dam crest to provide additional flood routing freeboard
- Providing flood overtopping protection consisting of roller-compacted concrete for the existing embankment, in concert with an enlarged spillway of appropriate size
- Two dam and reservoir enlargement alternatives coupled with spillway size optimization, as above, consisting of
 - Raising the normal storage level by 4 feet (approximately 250 acre-feet)
 - Raising the normal storage level by 8 feet (approximately 550 acre-feet)

URS will perform conceptual engineering analyses to enable the development of alternatives and concept figures.

Deliverable

Conceptual-level designs and figures for each of the evaluated alternatives, developed based on State Engineers Office (SEO) criteria and industry standards.

Task 2 – Cost Estimate

Description of Task

Develop conceptual cost estimates for each of the alternatives based on the conceptual design figures.

Method/Procedure

The cost estimates will be based on quantity takeoffs estimated from the figures developed in Task 1. Pricing will be based on URS’s database for material costs, previous dam construction projects in Colorado and New Mexico, prevailing wage rates, RS Means, and published unit rates from Colorado Department of Transportation. Contingencies will be applied, based on the conceptual level of design. The cost estimate for each alternative will be conceptual level and based on conceptual figures for the sole purpose of comparing alternatives.

Deliverable

Conceptual level cost estimates for each of the evaluated alternatives, for the purpose of comparing the alternatives.

Task 3 – Preparation of Technical Memorandum

Description of Task

A technical memorandum will be prepared which documents the activities and processes of the first two tasks and discusses recommendations for moving forward.

Method/Procedure

The technical memorandum will include design criteria, constraints, assumptions, quantities, cost estimates and potential construction risks and challenges for the alternatives.

Deliverable

Final technical memorandum, as described above, which will recommend a preferred alternative.

REPORTING AND FINAL DELIVERABLE

Reporting: The applicant shall provide the CWCB a progress report every 6 months, beginning from the date of the executed contract. The progress report shall describe the completion or partial completion of the tasks identified in the statement of work including a description of any major issues that have occurred and any corrective action taken to address these issues.

Final Deliverable: At completion of the project, the applicant shall provide the CWCB a final report that summarizes the project and documents how the project was completed. This report may contain photographs, summaries of meetings and engineering reports/designs.

BUDGET

Total Costs				
	Labor	Other Direct Costs	Matching Funds (If Applicable)	Total Project Costs
Task 1 – Alternatives Development	\$9117.00	\$252.44		\$9369.44
Task 2 – Cost Estimate	\$3764.00	\$104.22		\$3868.22
Task 3 – Preparation of Technical Memorandum	\$5899.00	\$263.34		\$6162.34
Total Costs:	\$18,780.00	\$620.00		\$19,400.00

Labor							
Project Personnel:	Consultant 2	Consultant 3	Project Engineer 4	Project Engineer 1	CADD Technician	Staff	Total Costs
Hourly Rate:	\$185.00	\$201.00	\$155.00	\$124.00	\$82.00	\$77.00	
Task 1 – Alternatives Development	9	2	6	31	24	4	\$9117.00
Task 2 – Cost Estimate	2	1	3	22			\$3764.00
Task 3 – Preparation of Technical Memorandum	5	1	5	31		2	\$5899.00
Total Hours:	16	4	14	84	24	6	
Cost:	\$2960.00	\$804.00	\$2170.00	\$10,416.00	\$1968.00	\$462.00	\$19,400.00

Other Direct Costs					
Item:	Communication	Reproduction / Shipping			Total
Task 1 – Alternatives Development	\$252.44				\$252.44
Task 2 – Cost Estimate	\$104.22				\$104.22
Task 3 – Preparation of Technical Memorandum	\$163.34	\$100.00			\$263.34
Total Cost:	\$520.00				\$620.00

SCHEDULE

Task	Start Date	Finish Date
1 - Alt. Dvlpmt.	NTP + 30 days	NTP + 75 days
2 - Cost Est.	NTP + 75 days	NTP + 95 days
3 - Tech. Memo.	NTP + 90 days	NTP + 120 days

NTP = Notice to Proceed

PAYMENT

Payment will be made based on actual expenditures and invoicing by the applicant. Invoices from any other entity (i.e. subcontractors) cannot be processed by the State. The request for payment must include a description of the work accomplished by major task, and estimate of the percent completion for individual tasks and the entire water activity in relation to the percentage of budget spent, identification of any major issues and proposed or implemented corrective actions. The last 5 percent of the entire water activity budget will be withheld until final project/water activity documentation is completed. All products, data and information developed as a result of this grant must be provided to the CWCB in hard copy and electronic format as part of the project documentation. This information will in turn be made widely available to Basin Roundtables and the general public and help promote the development of a common technical platform.

Appendix 1

Reference Information

The following information is available via the internet. The reference information provides additional detail and background information.

- Water Supply Reserve Account main webpage:
 - <http://cwcb.state.co.us/LoansGrants/water-supply-reserve-account-grants/Pages/main.aspx>
- Water Supply Reserve Account – Basin Fund Application Details:
 - <http://cwcb.state.co.us/LoansGrants/water-supply-reserve-account-grants/Pages/BasinWaterSupplyReserveAccountGrants.aspx>
- Water Supply Reserve Account – Statewide Fund Application Details:
 - <http://cwcb.state.co.us/LoansGrants/water-supply-reserve-account-grants/Pages/StatewideWaterSupplyReserveAccountGrants.aspx>
- Colorado Water Conservation Board main website:
 - <http://cwcb.state.co.us/>
- Interbasin Compact Committee and Basin Roundtables:
 - <http://cwcb.state.co.us/about-us/about-the-ibcc-brts/Pages/main.aspx/Templates/BasinHome.aspx>
- House Bill 05-1177 – (Also known as the Water for the 21st Century Act):
 - <http://cwcbweblink.state.co.us/DocView.aspx?id=105662&searchhandle=28318>
- House Bill 06-1400 – (Adopted the Interbasin Compact Committee Charter):
 - <http://cwcbweblink.state.co.us/DocView.aspx?id=21291&searchhandle=12911>
- Senate Bill 06-179 – (Created the Water Supply Reserve Account):
 - <http://cwcbweblink.state.co.us/DocView.aspx?id=21379&searchhandle=12911>
- Statewide Water Supply Initiative 2010:
 - <http://cwcb.state.co.us/water-management/water-supply-planning/Pages/SWSI2010.aspx>

Appendix 2

Insurance Requirements

NOTE: The following insurance requirements taken from the standard contract apply to WSRA projects that exceed \$25,000 in accordance with the policies of the State Controller's Office. Proof of insurance as stated below is necessary prior to the execution of a contract.

13. INSURANCE

Grantee and its Sub-grantees shall obtain and maintain insurance as specified in this section at all times during the term of this Grant: All policies evidencing the insurance coverage required hereunder shall be issued by insurance companies satisfactory to Grantee and the State.

A. Grantee

i. Public Entities

If Grantee is a "public entity" within the meaning of the Colorado Governmental Immunity Act, CRS §24-10-101, et seq., as amended (the "GIA"), then Grantee shall maintain at all times during the term of this Grant such liability insurance, by commercial policy or self-insurance, as is necessary to meet its liabilities under the GIA. Grantee shall show proof of such insurance satisfactory to the State, if requested by the State. Grantee shall require each Grant with Sub-grantees that are public entities, providing Goods or Services hereunder, to include the insurance requirements necessary to meet Sub-grantee's liabilities under the GIA.

ii. Non-Public Entities

If Grantee is not a "public entity" within the meaning of the GIA, Grantee shall obtain and maintain during the term of this Grant insurance coverage and policies meeting the same requirements set forth in §13(B) with respect to sub-Grantees that are not "public entities".

B. Sub-Grantees

Grantee shall require each Grant with Sub-grantees, other than those that are public entities, providing Goods or Services in connection with this Grant, to include insurance requirements substantially similar to the following:

i. Worker's Compensation

Worker's Compensation Insurance as required by State statute, and Employer's Liability Insurance covering all of Grantee and Sub-grantee employees acting within the course and scope of their employment.

ii. General Liability

Commercial General Liability Insurance written on ISO occurrence form CG 00 01 10/93 or equivalent, covering premises operations, fire damage, independent Grantees, products and completed operations, blanket Grantual liability, personal injury, and advertising liability with minimum limits as follows: (a) \$1,000,000 each occurrence; (b) \$1,000,000 general aggregate; (c) \$1,000,000 products and completed operations aggregate; and (d) \$50,000 any one fire. If any aggregate limit is reduced below \$1,000,000 because of claims made or paid, Sub-grantee shall immediately obtain additional insurance to restore the full aggregate limit and furnish to Grantee a certificate or other document satisfactory to Grantee showing compliance with this provision.

iii. Automobile Liability

Automobile Liability Insurance covering any auto (including owned, hired and non-owned autos) with a minimum limit of \$1,000,000 each accident combined single limit.

iv. Additional Insured

Grantee and the State shall be named as additional insured on the Commercial General Liability and Automobile Liability Insurance policies (leases and construction Grants require additional insured coverage for completed operations on endorsements CG 2010 11/85, CG 2037, or equivalent).

v. Primacy of Coverage

Coverage required of Grantee and Sub-grantees shall be primary over any insurance or self-insurance program carried by Grantee or the State.

vi. Cancellation

The above insurance policies shall include provisions preventing cancellation or non-renewal without at least 45 days prior notice to the Grantee and the State by certified mail.

vii. Subrogation Waiver

All insurance policies in any way related to this Grant and secured and maintained by Grantee or its Sub-grantees as required herein shall include clauses stating that each carrier shall waive all rights of recovery, under subrogation or otherwise, against Grantee or the State, its agencies, institutions, organizations, officers, agents, employees, and volunteers.

C. Certificates

Grantee and all Sub-grantees shall provide certificates showing insurance coverage required hereunder to the State within seven business days of the Effective Date of this Grant. No later than 15 days prior to the expiration date of any such coverage, Grantee and each Sub-grantee shall deliver to the State or Grantee certificates of insurance evidencing renewals thereof. In addition, upon request by the State at any other time during the term of this Grant or any sub-grant, Grantee and each Sub-grantee shall, within 10 days of such request, supply to the State evidence satisfactory to the State of compliance with the provisions of this §13.

Appendix 3

Water Supply Reserve Account Standard Contract Information

NOTE: The standard contract is required for WSRA projects that exceed \$100,000. (Projects under this amount will normally be funded through a purchase order process.) Applicants are encouraged to review the standard contract to understand the terms and conditions required by the State in the event a WSRA grant is awarded. Significant changes to the standard contract require approval of the State Controller's Office and often prolong the contracting process.

It should also be noted that grant funds to be used for the purchase of real property (e.g. water rights, land, conservation easements, etc.) will require additional review and approval. In such cases applicants should expect the grant contracting process to take approximately 3 to 6 months from the date of CWCB approval.

The standard contract is available here under the header "Additional Resources" on the right side:

<http://cwcb.state.co.us/LoansGrants/water-supply-reserve-account-grants/Pages/BasinWaterSupplyReserveAccountGrants.aspx>

Appendix 4

W-9 Form

NOTE: A completed W-9 form is required for all WSRA projects prior execution of a contract or purchase order. Please submit this form with the completed application.

WATER CONSERVATION BOARD
1313 SHERMAN STREET, ROOM 721
DENVER, CO 80203

DATE: 12-14-12

IMPORTANT

The PO# and Line # must
appear on all invoices,
packing slips, cartons
and correspondence



**PURCHASE
ORDER**
STATE OF COLORADO

Buyer: ALLAN SMITH
Phone Number: 303-866-3292
Agency Contact: DORI VIGIL
Phone Number: 303 866 3441

ACC: 12-13-12

P.O. # OE PDA 131BC000009 Page# 01

State Award #

FEIN 840494513

Phone: - -

Vendor Contact:

Purchase Requisition #:

V
E
N
D
O
R
REDMESA RESERVIOR & DITCH COMPANY
8877 COUNTY ROAD 100
HESPERUS CO 81326

BID #

Invoice in Triplicate

To: DIVISION OF WATER CONSERVATION
1313 SHERMAN STREET, ROOM 721
DENVER, CO 80203

Payment will be made by this agency

Ship
To: DIVISION OF WATER CONSERVATION
1313 SHERMAN STREET, ROOM 721
DENVER, CO 80203

Delivery/Installation Date: 09-30-13

F.O.B. DESTINATION STATE PAYS NO FREIGHT

INSTRUCTIONS TO VENDOR:

1. If for any reason, delivery of this order is delayed beyond the delivery/installation date shown, please notify the agency contact named at the top left. (Right of cancellation is reserved in instances in which timely delivery is not made.)
2. All chemicals, equipment and materials must conform to the standards required by OSHA.
3. NOTE: Additional terms and conditions on reverse side.

SPECIAL INSTRUCTIONS:

LINE ITEM	COMMODITY/ITEM CODE	UNIT OF MEASUREMENT	QUANTITY	UNIT COST	TOTAL ITEM COST
001	91843000000 CMS#51621 REDMESA DAM & RESERVOIR - SPILLWAY ALTNERTATIVES ANALYSIS				\$19,400.00

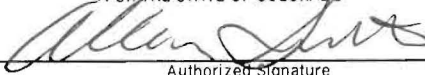
DOCUMENT TOTAL =

\$19,400.00

THIS PO IS ISSUED IN ACCORDANCE WITH STATE AND FEDERAL REGULATIONS
This PO is effective on the date signed by the authorized individual.

EPSPO PAA

FOR THE STATE OF COLORADO



Authorized Signature

12/14/12

Date