

**Water Supply Reserve Account – Grant and Loan Program
Water Activity Summary Sheet
Agenda Item 10.i**

Applicant: Town of Rico

Water Activity Name: Town of Rico Alluvium Pipeline Water Supply Project – Well Drilling and Water Quality Testing

Water Activity Purpose: Structural Water Project

County: Dolores

Drainage Basin: Dolores

Water Source: Dolores River

Amount Requested: \$88,000

Source of Funds: \$68,000 Statewide Account; \$20,000 Southwest Basin Account

Matching Funds: \$90,000 (\$30,000 applicant and \$60,000 DOLA grant)

Staff Recommendation
Staff recommends approval of up to \$88,000, \$68,000 from the Statewide Account and \$20,000 from the Southwest Basin Account to help complete the Town of Rico Alluvium Pipeline Water Supply Project – Well Drilling and Water Quality Testing.

Water Activity Summary:

Rico's water system diverts from a gallery on Silver Creek. During times of high turbidity the treatment plant capacity is not sufficient to meet demand. Rico has many second homes, with high resident water use concentrated around the Fourth of July weekend. During these times of high demand and in droughts, neither the treatment plant nor the Silver Creek source water are sufficient to meet existing demand. As such, Rico must rely almost entirely on the storage tanks. During spring run-off prior to the Fourth of July weekend, the water is very turbid and storage tanks may or may not be at maximum storage capacity by the time the increased demand occurs. Rico has historically battled line breaks and turbid water supplies in the attempt to provide reliable service to town residents and business owners. In the past decade, Rico has made many system improvements, however, source water quality and quantity continues to be an impediment. In order to reliably serve the existing homes and provide water for future growth, Rico must develop a more reliable water source.

In 1996, Rico began the process to identify and develop a more secure alternate water source. This process identified an alluvial well near the Dolores River about two miles upstream of Rico as the best alternative source. The alluvial well field, a.k.a. the Alluvial Pipeline Water Supply Project, is listed as an IPP on the Colorado Water Conservation Board's 2004 and 2010 Statewide Water Supply Initiative Reports. Two test wells were drilled near the proposed production well. Both wells demonstrated that the alluvium can provide adequate water. Water quality tests indicated the need for only chlorination treatment. The test wells cannot be used for production and water quality testing must be repeated on the actual production well. The proposed project involves:

- Drilling a new production well to a depth of up to approximately 150 feet,
- Pump testing the well to verify the flow rate,
- Water quality testing to verify compliance with WQCD standards,
- Constructing a treatment facility to disinfect the water,
- Constructing a filtration system if the water is found to be impacted by surface water,
- Constructing a 2-mile pipeline to connect the well to the existing distribution system.

Rico has a Preliminary Engineering Report (PER), a draft environmental assessment, and water right decrees for the project that are available upon request. The existing Silver Creek water supply will be maintained and operated periodically as a backup supply. The WSRA funds would be used to drill the new well and perform the required water quality testing. Rico plans to start the project as soon as possible in 2011.

Threshold and Evaluation Criteria

The application meets all four Threshold Criteria.

The application articulates how the project meets the Evaluation Criteria as summarized below:

Tier 1: Promoting Collaboration/Cooperation & Meeting Water Management Goals & Identified Needs: The proposed project fulfills water rights decreed in Division 7 Water Court Case No. 06CW110 which balances the consumptive needs of Rico with non-consumptive needs of the CWCB's instream flow on the Dolores River between the well site and Rico. The well is a collaborative effort between Rico, the Dolores Water Conservancy District, the US Forest Service, and the CWCB. The Rico Alluvium Pipeline Project is an IPP in the SWSI 2010 report necessary to meet the 2050 water supply gap in Dolores County.

Tier 2: Facilitating Water Activity Implementation: The funding for drilling the well is necessary to assure that the water source meets all of the water quality requirements of the Water Quality Control Division (WQCD). The WQCD requires water quality tests from the actual well to approve the water source. Without drilling the well and the subsequent well testing, the overall project cannot proceed. The requested funds are necessary to drill the well and conduct the water quality testing. With the funding request herein Rico can implement the activity. The applicant is only requesting funds for the actual drilling, pump testing, and water quality testing. The cost of technical oversight of the activity is being paid from other sources.

Discussion:

The project is listed as an "Identified Project and Process" for Dolores County in the SWSI 2010 Report. In addition, SWSI identified rural water development issues as a key funding gap due to a lack of available financial resources. Drilling the production well is the first step of the Alluvial Pipeline Water Supply Project described in the Preliminary Engineering Report. The well and required testing are necessary to complete the technical, managerial, and financial capacity (TMF) activities for Colorado Department of Public Health and Environment – Water Quality Control Division (WQCD) approval. The TMF must be completed prior to construction of the other infrastructure (two mile pipeline and chlorination station) to connect the well to Rico's distribution system. The project meets an important identified water supply need in the Southwest Basin.

Issues/Additional Needs:

No issues or additional needs remain.

Staff Recommendation:

Staff recommends approval of up to \$88,000, \$68,000 from the Statewide Account and \$20,000 from the Southwest Basin Account to help complete the Town of Rico Alluvium Pipeline Water Supply Project – Well Drilling and Water Quality Testing.

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 will help promote the development of a common technical platform. In accordance with the revised WSRA Criteria and Guidelines, staff would like to highlight additional reporting and final deliverable requirements. The specific requirements are provided below.

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 scope 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.

Engineering: All engineering work (as defined in the Engineers Practice Act (§12-25-102(10) C.R.S.)) performed under this grant shall be performed by or under the responsible charge of professional engineer licensed by the State of Colorado to practice Engineering.