TIER-1 APPLICATION TO THE NEW MEXICO INTERSTATE STREAM COMMISSION FOR NEW MEXICO UNIT OR WATER UTILIZATION ALTERNATIVE UNDER THE ARIZONA WATER SETTLEMENTS ACT

APPLICANT INFORMATION (PRINT OR **DATE: 4-29-11**

1. Legal Name: City of Deming	2. Organization: City of Deming
3. Address (street, city, county, state, and zip code): P.O. Box 706 Deming, New Mexico 88031	4. Name, email, and phone number of contract person: Lawrence Brookey (575) 546-8848 lbrookey@cityofdeming.org
5. TYPE OF APPLICATION (check one): [ ] Final [X] Preliminary for review [ ] Revised	6. TYPE OF APPLICANT (CHECK BOX): [X] local governments or municipalities [ ] soil and water conservation districts, irrigation districts or commissions, acequias, or other political subdivision of the State of New Mexico [ ] institutions of higher education or a consortium of such institutions [ ] non-profit organizations or associations [ ] private individual/s [ ] federal agency (ies) [ ] Other (specify)
7. BRIEF PROJECT DESCRIPTION: Capitalize a fund to implement municipal conservation projects in the four-county area of the Southwest New Mexico Water Planning Region. The regional water plan identifies many different municipal conservation strategies that water suppliers could implement. However, the funds for implementing water conservation measures are generally lacking.	
8. AREAS AFFECTED (describe by county, municipality, township, etc. as applicable): Cartron, Grant, Hidalgo, and Luna Counties, New Mexico	

9. TOTAL FUNDING REQUESTED (in $1,000): $1,050				
2012: $350	2013: $350	2014: $350	2015:	2016:
2017:	2018:	2019:	2020:	2021:

10a. **TO THE BEST OF MY KNOWLEDGE AND BELIEF, ALL DATA IN THIS APPLICATION ARE TRUE AND CORRECT, THE DOCUMENT HAS BEEN DULY AUTHORIZED BY THE GOVERNI9NG BODY OF THE APPLICANT AND THE APPLICANT WILL COMPLY WITH THE ATTACHED REQUIREMENTS AND ASSURANCES IF THE PROPOSAL IS ACCEPTED.**

10b. TYPED OR PRINTED NAME OF AUTHORIZED REPRESENTATIVE:	11. TITLE:	12. PHONE NUMBER:
Richard F. McInturff	City Administrator	(575) 546-8848

13. SIGNATURE:	DATE:
/S/ Richard F. McInturff	4-29-11

14. Evaluation criteria. Comprehensive responses to criteria A through D should be supported where possible by the best available science and scientific data, studies, models, and, where applicable, cite state, regional, or other water plans. Where such data and information is not available, applications should include best estimates and describe how such information would be obtained. Applications that do not include the requested information will not satisfy Tier-1 standards and, therefore, will not be eligible for Tier-2 consideration. Use Form 14a if needed.

A. State whether the proposal is for the "New Mexico Unit," a "water utilization alternative," or both.

The City of Deming is proposing the Southwest Planning Region Municipal Conservation Fund to benefit residents in the four-county region. This project would qualify as a "water utilization alternative." The project would be designed to capitalize a fund to implement municipal conservation projects.

B. Describe how the proposal will meet a "water supply demand" in the Southwest New Mexico Water Planning Region, comprised of Catron, Grant, Hidalgo and Luna Counties.

Water conservation is an important aspect of regional water planning, as it allows the region to make efficient use of and extend existing resources. Given that the largest supplies in the Southwest New Mexico Water Planning Region are in groundwater reservoirs, many of which have very low natural recharge rates, a reliable long-term supply projection depends on using these resources wisely. Groundwater resources are currently being depleted at an unsustainable rate, such that the communities of Santa Clara, Bayard, Deming, and Silver City will not be capable of meeting demands through 2040 with existing wells. By decreasing demand through water conservation, existing supplies can be extended to meet growing demands (DBS&A, 2005).

Conservation measures are implemented by water suppliers as well as the end-users. Water suppliers can directly reduce water use by improving operations to reduce leaks or water waste. Use of treated municipal effluent for landscape irrigation or large water uses is another significant water-saving measure. Other programs create incentives for customers to reduce their use. An increasing block rate structure that increases the cost to the customer as more water is consumed creates an incentive to reduce use . Reducing indoor residential use through incentive programs to install low-flow toilets or update fixtures can also reduce per capita water use, as can xeriscaping to reduce residential outdoor watering. According to the Regional Water Demand Study for Southwest New Mexico, Catron, Grant, Hidalgo and Luna Counties (AMEC, 2010), implementation of water conservation measures by water suppliers in the four-county area could result in a 2,811-acre-foot per year (ac-ft/yr) reduction in municipal demand by 2020 and up to a 4,269-ac-ft/yr reduction by 2050.

References:

Daniel B. Stephens & Associates, Inc. (DBS&A). 2005. *Southwest New Mexico Regional Water Plan.* Prepared for Southwest New Mexico Regional Water Plan Steering Committee, City of Deming, New Mexico, Fiscal Agent. May 2005.

AMEC Earth & Environmental, Inc. (AMEC). 2010. *Regional Water Demand Study for Southwest New Mexico, Catron, Grant, Hidalgo and Luna Counties.* Prepared for New Mexico Interstate Stream Commission, Santa Fe, New Mexico. June 30, 2010.

C. Describe how the proposal considers the Gila environment and describe how any negative impacts might be mitigated.

This project considers increasing water conservation and could have only a positive effect on the Gila environment by decreasing water use and thereby decreasing stress on the Gila River ecology.

D. Describe how the proposal considers the historic uses of and future demands for water in the Southwest New Mexico Water Planning Region and the traditions, cultures and customs affecting those uses.

Many of the water studies completed in the Southwest Planning Region have identified municipal conservation as a key strategy for ensuring that supplies can continue to meet future demand. Both the City of Deming and Silver City have water conservation plans that identify conservation measures to implement as the funding becomes available. The Southwest New Mexico Regional Water Plan identifies many different municipal conservation strategies that water suppliers could implement.

The proposed project objective is to achieve sustainable water use to meet municipal supply, so that the traditions, cultures, and customs that have given rise to the current uses and allocations of water can be protected. Other, non-municipal water uses (such as agriculture) would benefit as well because the Mimbres Basin would be able to recover water levels in the areas that are most stressed. This would preserve the groundwater resources for current uses as well as future water use increases due to population growth and economic development.

Exhibit A. Interstate Stream Commission Gila Policy Statement, September 2004, and 2004 Arizona Water Settlements Act, Section 212 (i)

INTERSTATE STREAM COMMISSION GILA POLICY STATEMENT, SEPTEMBER 2004:

The Interstate Stream Commission recognizes the unique and valuable ecology of the Gila Basin. In considering any proposal for water utilization under Section 212 of the Arizona Water Settlements Act, the Commission will apply the best available science to fully assess and mitigate the ecological impacts on Southwest New Mexico, the Gila River, its tributaries and associated riparian corridors, while also considering the historic uses of and future demands for water in the Basin and the traditions, cultures and customs affecting those uses.

2004 ARIZONA WATER SETTLEMENTS ACT, SECTION 212 (i)

(i) NEW MEXICO UNIT FUND- The Secretary shall deposit the amounts made available under paragraph (2)(D)(i) of section 403(f) of the Colorado River Basin Project Act (43 U.S.C. 1543(f)) (as amended by section 107(a)) into the New Mexico Unit Fund, a State of New Mexico Fund established and administered by the New Mexico Interstate Stream Commission. Withdrawals from the New Mexico Unit Fund shall be for the purpose of paying costs of the New Mexico Unit or other water utilization alternatives to meet water supply demands in the Southwest Water Planning Region of New Mexico, as determined by the New Mexico Interstate Stream Commission in consultation with the Southwest New Mexico Water Study Group or its successor, including costs associated with planning and environmental compliance activities and environmental mitigation and restoration.

FORM 14A

USE THIS FORM TO COMPLETE ANSWERS TO CRITERIA 1 THROUGH 4. NUMBER EACH ADDITIONAL RESPONSE WITH THE CORRESPONDING CRITERIA NUMER AND SUB-CRITERIA. USE AS MANY PAGES AS NEEDED.

Proponent:

City of Deming

Project name:

Southwest Planning Region Municipal Conservation Fund (administered by Luna County)

Project description:

Capitalize a fund to implement municipal conservation projects (including wastewater reuse) in the four-county area of the Southwest Planning Region. The project will include a study to evaluate additional capitalization requirements, options for the funding process, and administration, including decision making. Included in the study would be eligibility and prioritization criteria to ensure highest water saving projects are funded first.

Project location:

Southwest Planning Region, Luna County, New Mexico

Need to be addressed by the project, including the entities, individuals, and areas that will benefit from the project:

Many of the water studies completed in the Southwest Planning Region have identified municipal conservation as a key strategy for ensuring that supplies can continue to meet future demand. Both the City of Deming and Silver City have water conservation plans that identify conservation measures to implement as funding becomes available. The Southwest Regional Water Plan identifies many different municipal conservation strategies that water suppliers could implement. However, the funds for implementing water conservation measures are generally lacking. The State of New Mexico does not have a dedicated funding source for conservation programs. The Office of the State Engineer does provide resources and guidelines for conservation, but has no funds available to address conservation program implementation.

Specific ways the Project would meet water supply demand in the Southwest Planning Region:

Municipal water conservation projects reduce water demand and extend the lifetime of existing supplies, thereby delaying the need to develop additional supplies for future growth. Conservation measures are implemented by water suppliers as well as the end-users. Water suppliers can directly reduce water use by improving operations to reduce leaks or water waste. Use of treated municipal effluent for landscape irrigation or large water uses is another significant water saving measure. Other programs create incentives for customers to reduce their use. An increasing block rate structure creates an incentive to reduce use by increasing cost as more water is consumed. Reducing indoor residential use through incentive programs to install low-flow toilets or update fixtures can also reduce per capita water use, as can xeriscaping to reduce residential outdoor watering. According to the *Regional Water Demand Study for Southwest New*

Mexico Catron, Grant, Hidalgo and Luna Counties (AMEC, 2010, http://www.awsaplanning.com/Studies_files/FINAL%20report%20SW%20Demand.pdf), implementation of water conservation measures by water suppliers in the four-county area could result in a 2,811 ac-ft/yr reduction in municipal demand by 2020 and up to a 4,269 ac-ft/yr reduction by 2050 (AMEC, 2010, Table 3.21).

Any design, engineering, or scoping work that has been completed, and estimated cost:

See attached work plan and cost estimate.

Any anticipated problems or concerns with proposed project:

No problems or concerns are anticipated. It is important to note that this is not a construction project to develop new supplies, but many conservation measures involve some type of construction. However, conservation programs extend the time frame within which existing supplies can meet future demand. Delaying the need to develop supplies benefits the region because technological advances may allow for reduced treatment costs for developing low-quality supplies (e.g., desalination), and could thereby increase the options for developing additional supplies. Even with conservation, however, additional supplies will need to be developed.

Southwest Planning Region Municipal Conservation Fund

The purpose of this project is to establish a four-county water conservation fund for the Southwest Planning Region.

1. Capitalization of Fund

Provide an initial $1 million capital investment for the water conservation fund. Work with AWSA steering committee to identify additional capital investment necessary to develop a revenue stream that can fund enough projects to significantly reduce current use (as measured by reduced per capita use or other benchmark). Work with steering committee to inventory and identify costs estimates for conservation projects identified by AWSA planning group, water suppliers in the Southwest Planning Region, or other planning reports.

2. Develop Administrative and Project Selection Process

2.1 Fund Administration

- Identify administrative process and administration costs
- Identify the requirements for the fiscal agent and governmental entity managing the fund
- Identify legal requirements and limitations

2.2 Develop Project Evaluation Process

- eligibility
- application process
- evaluation and prioritization criteria
- develop sample application and project reporting requirements

Budget

Task 1	$1,000,000
Task 2	$50,000
Total Request	$1,000,050