

**TO:** Region C Water Planning Group

**FROM:** Tom Gooch, P.E.

**SUBJECT:** Potential Legislative Issues for Inclusion in 2011 Region C Water Plan

**DATE:** January 5, 2010

Task 8 of the Region C Scope allows the Region C Water Planning Group to give input and make recommendations to the Texas Legislature regarding water planning issues. Any recommendations approved by the Planning Group will be included in Chapter 8 of the *2011 Region C Water Plan*. The legislative recommendations from the *2006 Region C Water Plan* are attached. Following is a list of other potential legislative issues that have been identified in discussions with planning group members:

- Funding for all projects. Recommend additional water infrastructure funding from the Legislature, emphasizing water supply's vital role in the State's economy.
- Filling Planning Group Vacancies. Recommend that TWDB (rather than planning groups) select members to fill vacancies on regional planning groups, based on candidates resume and interest group.
- Funding for Groundwater Conservation Districts. Recommend funding. Currently no State funds are appropriated. All funding is through fees, which are limited.
- Better Vehicles for Funding Large Projects. Recommend that Texas use the former Federal model, which delays payments on large projects until projects are widely used (rather than delay of only 10 years as is current TWDB standard).
- Reuse. Better coordination with TWDB on advancing Reuse projects in Texas; encourage additional funding for reuse projects.
- Managed Available Groundwater process. Recommend change in process to allow for better representation to encourage fair distribution of Managed Available Groundwater.
- NRCS. Recommend funding for maintenance, dredging and renewal of aging NRCS structures.
- Oklahoma Water. Possible State and/or Federal legislation to support efforts to purchase water from Oklahoma.
- Invasive Species. There is a need to address invasive species and how this will affect lake-to-lake transfer.
- Upcoming Federal Regulations. Federal government is currently considering extending the reaches of the Clean Water Act and other regulations. Region C should provide recommendations on how Texas Legislature should approach these Federal regulations.
- Unique Stream Segments. Have formal recommendation stating Region C's decision regarding formation of Unique Stream Segments Work Group with State Agencies in order to resolve outstanding issues.

Members of the Planning Group are asked to identify other legislative issues to be considered for inclusion in the plan. All issues will be discussed at the January 11, 2010 Region C Meeting.

wetlands and bottomland hardwoods. There are also lignite resources and oil and gas wells in the area that would be inundated by Tehuacana Reservoir.

**Reasons for Unique Designation.** Tehuacana Reservoir has been in the plans of the Tarrant Regional Water District for decades. The lake would be connected to the Richland-Chambers Reservoir by a channel, allowing the water supply provided by Tehuacana to be pumped from Richland-Chambers. Development of Tehuacana could allow extension of the Tarrant Regional Water District project of diversions from the Trinity for additional water supply. Although this reservoir is not recommended for development before 2060 if other sources can be developed, it remains desirable as an alternative project.

The location, geologic, hydrologic, topographic, water availability, water quality, and current development characteristics make this site uniquely suited to provide water supply for Region C.

**Expected Beneficiaries of Water Supply.** The expected beneficiaries of this project would be Tarrant Regional Water District and its existing and potential customers as well as water user groups in Freestone County. Appendix H includes a table listing the customers of the Tarrant Regional Water District. Appendix D lists the water user groups in Freestone County, all of whom might benefit from this project.

#### **8.4 Policy and Legislative Recommendations**

The Region C Water Planning Group established a committee to review and recommend water policy topics to include in this plan. Appendix X includes the memorandum prepared by the committee including their recommendations to the planning group. The Region C Water Planning Group approved the memo as presented for inclusion in the Region C plan. The recommendations provided in the memo are discussed here.

#### **Senate Bill One Planning Process**

**Alternative Strategies.** Section 357.7(a)(9) of the TWDB Regional Water Planning guidelines <sup>(1)</sup> requires “specific recommendations of water management strategies to meet the needs...”. As we understand the TWDB interpretation of this requirement, listing alternative strategies among which a water supplier can choose is not allowed.

This requirement decreases the local control and flexibility that have been an important part of the successful efforts to meet water needs in Region C and throughout Texas. Water suppliers need to have a full range of options as they seek to provide new water supplies for Texas' future. It is impossible to foresee all the possibilities for new water supplies in a planning process such as this, and changing circumstances can change the preferred alternative for new supplies very quickly. The following steps should be taken to address these concerns:

- Allow willing buyer/willing seller transactions of water rights and treated water to occur without additional regulations.
- The Texas Water Development Board (TWDB) and Texas Commission on Environmental Quality (TCEQ) should interpret existing legislation to give the maximum possible flexibility in determining “consistency” with the regional water plan. Changes in the timing of development, the order in which strategies are developed, the amount of supply, or details of a project should not be considered as making the project inconsistent with the regional plan.
- The TWDB and TCEQ should make liberal use of their ability to waive consistency requirements.
- Legislative and/or regulatory changes should be made to allow alternative water management strategies to be included in the regional water plan.

**Clear Guidance on Resolving Consistency Issues.** The Texas Water Development Board has implemented a policy that only considers Tables 12 and 13 of the 2001 *Region C Water Plan*<sup>(3)</sup> to be the recommended strategies and does not consider the text of the 2001 Plan in their determination of “consistency”. This policy was not made clear to the regional water planning groups prior to adoption of the 2001 plans. Thus, the planning groups have had to amend the 2001 plans frequently. The inability of planning groups to recommend alternative projects will compound this problem.

In the future, the TWDB should publish the criteria for what projects will be considered consistent with regional water plans prior to these plans being adopted by the regional water planning groups. This will allow the regional water planning groups time to adjust the regional water plans accordingly.

**Allow Waivers of Plan Amendments for Entities with Small Strategies.** Region C recommends that the Texas Water Development Board allow waivers for consistency issues for plan amendments that involve projects resulting in small amounts of additional supply.

### **Coordination between TWDB and TCEQ Regarding Use of the WAMs for Planning.**

The TWDB requires that the Water Availability Models (WAMs) developed under the direction of TCEQ to be used in determining available surface water supplies. The models were developed for the purpose of evaluating new water rights permit applications and are not appropriate for water supply planning. The TWDB and TCEQ should coordinate their efforts to determine the appropriate data and tools available through the WAM program for use in regional water planning. The TWDB should allow the regional water planning groups some flexibility in applying the models made available for planning purposes.

**Support Water Conservation Task Force Recommendation Regarding Target for Water Conservation.** The Water Conservation Task Force <sup>(7)</sup> recommended that the targets they developed be used as voluntary per capita water goals for entities to consider. The Task Force indicated that these voluntary goals should not be mandatory. Per capita water use is unique to each water supplier. A statewide per capita water use value is not appropriate for the State of Texas, considering its wide variation in rainfall, economic development, and other factors. The Region C Water Planning Group supports the decision of the Water Conservation Task Force that the targets included in their report should be voluntary targets rather than mandatory goals.

### TCEQ Policy and Water Rights

**Cancellation of Water Rights for Non-Use.** The Texas Water Code <sup>(8)</sup> currently allows the Texas Commission on Environmental Quality to cancel any water right, in whole or in part, for ten consecutive years of non-use. This rule inhibits long-term water supply planning. Reservoirs are often constructed to fully utilize the yield available at a given site and are often constructed to meet needs far into the future. Many times, only part of the supply is used in the first ten years of the reservoir's operation, with the remainder allocated for future needs.

The water code should be changed to exempt certain projects from the cancellation for ten years of non-use rule. The exemption might include municipal water rights, water rights for steam electric power, water rights associated with major reservoirs, and water rights included as long-term supplies in an approved regional water plan.

**Requirements for Interbasin Transfers Introduced in Senate Bill One.** In 1997, Senate Bill One introduced a number of new requirements for applications for water rights permits to allow interbasin transfers. The requirements are found in Section 11.085 of the Texas Water Code <sup>(9)</sup>. The code includes many provisions that are not required of any other water rights, including:

- Analysis of the impact of the transfers on user rates by class of ratepayer
- Public meetings in the basin of origin and the receiving basin
- Extra notice to county judges, mayors, and groundwater districts in the basin of origin
- Extra notice to legislators in the basin of origin and the receiving basin
- TCEQ request for comments from each county judge in the basin of origin
- Proposed mitigation to the basin of origin
- Demonstration that the applicant has prepared plans that will result in the “highest practicable water conservation and efficiency achievable...”

Exceptions to these extra requirements placed on interbasin transfers were made for emergencies, small transfers (less than 3,000 acre-feet under one water right), transfers to an adjoining coastal basin, transfers to a county partially in the basin of origin, and transfers to a municipality whose retail service area is partially within the basin of origin.

The effect of these changes is to make obtaining a permit for interbasin transfer significantly more difficult than it was under prior law and thus to discourage the use of interbasin transfers for water supply. This is undesirable for several reasons:

- Interbasin transfers have been used extensively in Texas and are an important part of the state’s current water supply. For example, current permits allow interbasin transfers of over 600,000 acre-feet per year from the Red, Sulphur, Sabine, and Neches Basins to meet needs in the Trinity Basin in Region C. This represents almost one-third of the region’s reliable water supply.
- Current supplies greatly exceed projected demands in some basins, and the supplies already developed in those basins can only be used through interbasin transfers.
- Senate Bill One water supply plans for major metropolitan areas in Texas (Dallas-Fort Worth, Houston, and San Antonio) rely on interbasin transfers as a key component of their plans.
- Texas water law has always regarded surface water as belonging to the people of the state, to be used for the benefit of the state as a whole.

- The current requirements for permitting interbasin transfers provide an unnecessary barrier to development of the best, most economical, and most environmentally acceptable water supplies.
- Since no contested interbasin transfer permits have been granted under these new requirements, the meaning of some of the provisions and the way in which they will be applied by TCEQ are undefined.

The legislature should revisit the current law on interbasin transfers and remove some of the unnecessary and counterproductive barriers to such transfers that now exist.

**Disposal of Brine Waste.** Desalination projects result in a brine waste that must be disposed in an environmentally friendly fashion. Different regulations regarding the disposal of brine waste and different agencies govern those regulations. The brine resulting from water that is desalinated for municipal and industrial purposes is regulated by TCEQ and must be disposed according to much stricter standards than the brine resulting from petroleum development activities, regulated by the Railroad Commission. The way that brine is created should not affect the regulations that govern the disposal of the resulting brine. Region C recommends that the brine resulting from municipal and industrial desalination be disposed according to the same regulations as brine resulting from petroleum development activities.

### Reuse of Treated Wastewater

**Policies Limiting the Use of Treated Wastewater.** The TCEQ has recently implemented policies, some in response to legislative requirements in Senate Bill One, that limit TCEQ's ability to permit projects for indirect reuse, in which water is returned to a reservoir or watercourse before being diverted for reuse. The policy of discouraging indirect reuse has a number of negative impacts on water suppliers in Region C and throughout the state:

- The policies are logically inconsistent with policies encouraging direct reuse of treated wastewater.
- The policies inhibit reuse for municipal purposes by prohibiting the most effective approach to municipal reuse, which incorporates "multiple barriers" between wastewater discharge and eventual reuse. Streams and reservoirs are among the most effective of such multiple barriers.
- The policies encourage reuse for irrigation and industrial purposes, where direct reuse is appropriate, while discouraging reuse to meet municipal needs, where indirect reuse is the preferred approach.

- It is poor public policy to discourage indirect reuse, which is a water supply alternative with relatively low environmental impacts.
- It is poor public policy to require the construction of infrastructure for direct reuse in cases when natural watercourses can deliver water much more economically.
- Indirect reuse of treated wastewater is an important element of water supply planning in Region C.

The legislature should revisit the issue of indirect reuse of treated wastewater using the bed and banks of state watercourses, with a view to reducing the obstacles to indirect reuse. The historical discharge of treated wastewater effluent should not make the indirect reuse of wastewater more difficult.

Reuse projects, both direct and indirect, are a significant portion of Region C's future water supplies. Large-scale indirect reuse projects are planned for Richland-Chambers Reservoir, Cedar Creek Reservoir, Lake Ray Hubbard, and Lake Lavon. TCEQ should clearly define the permitting process for large-scale indirect reuse projects to expedite the permitting process.

#### State and Federal Program – Water Supply Issues

**Increased State Funding for Texas Water Development Board Loans and the State Participation Program.** The Senate Bill One regional water planning studies show significant needs for future water supply projects. The Texas Water Development Board's loan and State Participation Programs have been important tools in the development of existing supplies. These programs should be continued and expanded with additional funding to assist in the development of the water management strategies recommended in the regional water plans to meet the future water needs in Texas.

**State Funding for Water Conservation Efforts.** As a result of the policy recommendations in the 2001 regional water plans, the Texas Water Development Board established a water conservation task force and developed a state-wide water conservation campaign. The water conservation task force developed recommendations regarding best management practices for various types of water uses <sup>(7)</sup>. The conservation campaign <sup>(10)</sup> was released to the public on January 26, 2005.

The current TWDB regulations require that water conservation be considered as a water management strategy for each water shortage. In Region C, four model water conservation plans

have been developed and are included in Appendices N and O of this plan. Programs should be developed to help local water suppliers achieve the conservation savings recommended in this regional water plan.

The legislature should provide funding to allow the Texas Water Development Board and other state agencies to undertake or expand the programs listed in Appendix X of this plan.

**Funding for NRCS Structures as a Form of Watershed Protection.** One key element of water supply planning is the protection of the quality and usability of supplies already developed. Over the past 50 years, the U.S. Natural Resources Conservation Service (NRCS, formerly the Soil Conservation Service) has built numerous small dams for sediment control and flood control in Texas. The NRCS reservoirs also improve water quality and prevent erosion in the watershed. The NRCS reservoirs provide water for livestock and increase streamflows during low flow periods. The design life for the majority of the NRCS watershed dams is 50 years. Most of the projects were built in the 1950s and 1960s and are nearing the end of their design life. Many of the NRCS structures are in need of maintenance or repair in order to extend the life of the dams.

The Dam Rehabilitation Act <sup>(11)</sup> funds the rehabilitation and upgrade of existing NRCS structures. Every year, the NRCS accepts applications for funding such projects and prioritizes them. The rehab program is a 65/35 split of federal funds to the sponsor's funds. Currently in the Region C area, ten NRCS structures are being planned, designed or constructed with funding through the dam rehabilitation act.

The Small Watershed Act <sup>(12)</sup> allocates federal funds for the development of new NRCS structures. The federal government provides 100% of the construction costs and the sponsor provides the land acquisition costs. Eight projects in Region C are being planned, designed, or constructed. Several of these projects are ready to construct, but the funding is not currently available.

The state should develop a program to provide funding for the development and rehabilitation of new and existing NRCS structures, as a form of watershed protection. Elements of such a program could include:

- State grants or matching funding for studies of NRCS structures
- Seminars on watershed protection.

The Region C Water Planning Group recommends that the State of Texas seek additional federal funding to improve and maintain NRCS structures. Region C also recommends that the state provide funding to the local sponsors to aid them in paying for their required 35% of the cost for the dam rehabilitation projects.

**Funding Assistance for Desalination Projects.** In December 2002, the TWDB completed a report <sup>(13)</sup> for Governor Perry recommending a large-scale demonstration seawater desalination project. This project will result in greater information available to Texas on the challenges involved in developing large-scale desalination projects. However, many smaller communities could make use of brackish groundwater or surface water if the treatment process was more affordable.

The Red River and Lake Texoma in Region C have high concentrations of salts. The water from these sources must either be blended with a less saline supply or desalinated for direct use. The smaller communities neighboring these water supplies could potentially use this water with help in funding the necessary desalination process. These sources would be more economical for the smaller communities than building small pipeline of great lengths to purchase water from a larger supplier. Region C recommends that the TWDB provide funding assistance for desalination projects for smaller communities. Region C also recommends that federal funds be sought for desalination projects.

**Oversight of Groundwater Conservation District Rule Making.** The Texas Legislature has established groundwater conservation districts across Texas, often without regard for aquifer boundaries. The groundwater conservation districts develop rules and regulations regarding the groundwater pumping within their districts. Often, the rules that have been developed by these districts are inconsistent from one district to the next, resulting in inconsistent regulation of the same aquifer. Although one-size-fits all regulations are inappropriate, the groundwater conservation districts need state oversight, particularly with regards to their rule-making policies. Region C recommends that the TWDB or TCEQ provide oversight for the current and future groundwater conservation districts.