Appendix C4

Newsletters, Press Releases and Newspaper Articles



The Jemez y Sangre Water Planning Council meets every month. Call Coordinator Amy Lewis at 954-7123

Spring 2000

Regional Water Planning Picks Up Speed

By Estevan Lopez Santa Fe County Land Use and Utilities Director Chairperson of the Jemez y Sangre Water Planning Council

Regional water planning in north central New Mexico is about the things that matter most in the life of our communities: land, climate and culture. During the next several months, people from Santa Fe, Española, Los Alamos and surrounding communities will talk about those things in light of our most important natural resource – water.



Why we need to plan

In the Jemez y Sangre Water Planning Region, we can no longer assume there will be enough water for all of the people who could be living here in 2060. The JyS Water Planning Council was formed so that this region can better understand its water supply, as well as present and future demands for water.

The need came to light nearly 20 years ago when the City of El Paso claimed water from New Mexico. The judge in the lawsuit ruled that New Mexico could only prevent the export of water if it had a plan for its use.

Utimately, the Jemez y Sangre plan and 15 other regional water plans will be unified in a state water plan by the New Mexico Interstate Stream Commission.

The council's job

The Council's task is three-fold:

First, the Council will gather data showing how much water is available in the region, taking into account snow, rain, runoff, recharge, aquifer characteristics, recycling and legal or administrative restrictions. The data will also show present usage for city residential, agricultural, environmental and industrial uses.

The Council will then develop reasonable population projections and future water uses within the region. These crucial data will reveal any imbalance in the supply and demand of water or if an imbalance is likely to develop. Hydrology Study – Page 2 Population Study – Page 2 Public Involvement – Page 3 Council Membership – Page 3 Public Welfare – Page 4 Public Meetings – Page 4

Second, the Council has defined 10 sub-regions in the region to include every watershed and community, and will convene meetings about water and the public welfare with the residents of those sub-regions. Residents will have opportunities to say what is important to them, their families, their jobs and their cultures.

Third, residents will help the Council identify what alternatives exist to change the use or supply of water if a serious imbalance exists, and what choices may have to be made to balance supply and demand.

The questions affect us all and may be difficult or impossible to answer.

Finally, all of the local governments in the region will have to study the recommended plan. They will be asked to give final approval to the plan or make change. Ultimately, the plan will be subject to state and federal law.





Mike Hamman takes job with Jicarilla Apache Tribe

Mike Hamman, who represented the City of Santa Fe on the JyS Water Planning Council, has left his position as director of the city's Sangre de Cristo Water Division.

Hamman has taken a position as tribal water administrator with the Jicarilla Apache Tribe. He is responsible for helping the tribe draft its 100-year water plan and integrating it with the tribe's land use, economic development and environmental goals. He will also be responsible for leasing and allocations of water and helping develop the infrastructure to serve the tribe's population and services.

Estevan Lopez promoted at Santa Fe County

Estevan Lopez, the utilities director for Santa Fe County, has been promoted to Land Use Director. He is presently serving in both capacities. He is chairman of the JyS Water Planning Council.

Contribute articles to this newsletter. Call Ed Moreno at 466-1183.

Jemez y Sangre Water Planning Council **NEWS**

The Jemez y Sangre Water Planning Council NEWS is published by the City of Santa Fe under a Community Outreach Grant from the Los Alamos Laboratory Foundation.

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Hydrology is Job One for Plan

The Jemez y Sangre Water Planning Council, through its fiscal agent the City of Santa Fe, has contracted with Duke Engineering & Services, Inc. to perform the water resource assessment.

The study will result in two sets of reports: 1) well-founded water budgets for the basins comprising the region, and 2) realistic appraisals of water quality in the region.

The study is funded by the Interstate Stream Commission grant that is supporting the regional water plan, as well as a grant from the U.S. Bureau of Reclamation. Members of the technical subcommittee selected Duke from four proposals. The key personnel are Dave Peterson, Nabil Shafike and Cindy Ardito. The project is expected to be completed by May 1, with a draft report and components delivered this spring.

Duke Engineering will:

• Gather and provide available data on water quantity and quality from sources including Los Alamos National Laboratory, the N.M. Environment Department, Bureau of Reclamation, local governments, and irrigation districts in the study area.

- Evaluate weather, precipitation and snowpack data from various sources, and compiling a history of droughts in the region.
- Develop surface water budgets for the region and the subregions using streamflow data, gauging station reports, data from reservoirs and dams and state engineer databases.
- Quantify existing groundwater supplies by describing the region's geology and aquifers, reviewing aquifer pump tests from the three counties in the region, locating monitoring wells, examining historic water table data, discussing land subsidence and describing means of aquifer recharge and estimating available storage.
- Prepare reports comparing water rights and actual use in each subbasin, using data compiled by LANL.

How Many People Are Too Many?

One of the critical components of the regional water plan is estimating the demand for water for the next 60 years. One of the most important factors is an estimate of the number of people who will live and work in the region.

The Jemez y Sangre Water Planning Council has contracted with demographers from the University of New Mexico Bureau of Business and Economic Research. The scope of work includes these two major tasks:

• Establish short- and long-term historic population levels in the region and subregions, using U.S. Census data and annual BBER population estimates for the past decade. • Project "conservative" and "most likely" projections of population from 2000 to 2060, using demographic trends, with variations based on assumptions of migration, birth and death rates.

The team will create scenarios for population growth, including employment changes at Los Alamos National Laboratory or a new large manufacturing company in the region.

The study, which is expcted to be completed this spring, will incorporate a number of sources of information, including housing sales, tax records and school enrollment. The research is being conducted by Adelamar Alcantara and F. Lee Brown of the BBER.

Council Represents Diversity of Northern N.M.

The Jemez y Sangre Water Planning Council reflects the diversity of groups and individuals in northern New Mexico who are interested in water and its role in our future. They will guide the planning process, which will continue into 2001. The structure of the Council is designed for maximum public involvement.

The Council

The Council is the first level of public involvement. Council members represent local governments, acequias, irrigation districts, advocacy groups, and state and federal water, land and resource management agencies that can influence the quality, quantity and availability of surface or ground water. There are 22 entities on the Council.

The Subcommittees

The second level is subcommittees, comprised of individuals with specific expertise in various subject matter areas. The subcommittees are: technical, population/water demand, public involvement, legal and pueblos.

The subcommittees are open to any interested individuals from the region who feel their expertise can be valuable to the planning effort. Many experts have volunteered their time and experience. The subcommittees have developed proposals for contractors to perform various tasks, such as hydrology, demographics and public involvement.

The General Public

The third level is the largest and most important: citizens from throughout the region who will be invited to share their knowledge and opinions at public meetings to be scheduled. <u>A series of public meetings will</u> <u>be held in each of the ten subregions beginning</u> <u>this summer</u>.

At those meetings, the results of the population and water demand studies will be presented, water budgets will be discussed. These meetings are the opportunity for

History of the Jemez y Sangre Water Planning Council

In 1998, under an enabling state law, several state and local governments, organizations and individuals signed a cooperative agreement to begin regional water planning for north-central New Mexico. Those representatives formed the Jemez y Sangre Water Planning Council.

The Council was organized, its membership was established and the boundaries of the region were established. The Council formed committees responsible for legal issues, population and water demand, technical issues, public involvement and public welfare, pueblos and data.

Later that year, the Council responded to a request for proposals from the New Mexico Interstate Stream Commission to conduct regional water planning. The ISC gave the proposal the highest ranking and in December 1998 awarded the region \$240,000 to complete its regional water plan.

The member organizations of the Council are:

•Acequia Madre

•US Bureau of Indian Affairs

•US Bureau of Reclamation

- •City of Española
- •City of Santa Fe
- •Eldorado Area Water & Sanitation District •Garcia Ditch
- •La Acequia de la Canada Ancha
- •Las Acequias de Chupadero
- •League of Women Voters
- .Los Alamos Co. Public Utilities Dept.
- •Los Alamos National Laboratory
- New Mexico Rural Water Users Association
 North Central NM Economic Development
- District

Pojoaque Valley Irrigation District

people to tell the Council what is important to them in the use and future management of water.

The Pueblos

The pueblos that reside in the region have a unique role in water planning because of their historic and legal status. Six pueblos monitor the planning process as observers, not as official members of the council.

The pueblos are represented at the council by the Northern Pueblos Tributary Water Rights Association. Peter Chestnut is the liaison between the pueblos and the council. Rio Arriba County

- Rio Grande Restoration
- •Santa Fe Area Home Builders Association
- Santa Fe County
- NM State Land Office
- +1000 Friends of New Mexico
- •Santa Fe / Pojoaque Soil and Water Conservation District

OBSERVER STATUS

•The Pueblos of San Ildefonso, Nambe, Pojoaque, Tesuque, Santa Clara and San Juan

Santa Fe Land Use Resource Center

The Result

The Council is responsible for crafting alternatives for how to address water supply limitations. The Council members, representing their organizations, will attempt to meld the diverse interests and viewpoints into a comprehensive plan. The plan then will be presented to the local governments responsible for implementing the plan.

Anyone interested in receiving notice of meetings or servingon a subcommittee, contact Amy Lewis at 954-7123 or at alewis@ci.santa-fe.nm.

Contribute to this newsletter. Call Ed Moreno at 466-1183

What is Public Welfare? Answer Is Crucial to Water Plan

Under the 1987 state law that established the regional water planning process, plans must give an "adequate review of ... the effect on the public welfare."

"Public welfare" is important because of the lawsuit in which the city of El Paso attempted to appropriate New Mexico water. The court said New Mexico could prevent "uncontrolled" water exports only if it could rely on stated conservation and public welfare considerations.

That criteria applies to all new appropriations and transfers, not just interstate transactions. The New Mexico legislature established a process for regional water planning, in which we can defend against attempts by other states to appropriate our water for use outside the state if we can prove that we need the water for our citizens, .

The state legislature also gave the State Engineer authority to deny a water rights application if it is contrary to conservation or harms the public welfare of the state.

Public welfare has not been precisely defined in New Mexico. Other western states have defined it in various

ways. Protecting the public welfare means being aware of public health and safety, economic, cultural, agricultural and recreational consequences, historic, cultural, natural and aesthetic resources, conservation and prevention of waste, prevention of environmental and ecological consequences, sustainability, water quality, future opportunities, return flows to the rivers, preservation of public lands and open space, scientific use of water, and cumulative impact.

The key to defining public welfare in the Jemez y Sangre region is the participation of residents of the region.

Individuals and groups can still get involved with the council. Let us know if you would like a council representative to address your organization, or if you have information or expertise in an area that is important to the regional water plan. Call Amy Lewis at 954-7123.

Public meetings

The Jemez y Sangre Water Planning Council will conduct public meetings throughout the region during the late summer of 2000 to gather public comments about water use in the region. Interested individuals should contact Amy Lewis at the Sangre de Cristo Water Division at the City of Santa Fe, 954-7123.

Contribute to this newsletter. Call Ed Moreno at 466-1183.

City of Santa Fe Jemez y Sangre Water Planning Council Sangre de Cristo Water Division P.O. Box 909 Santa Fe, NM 87504-0909



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Jemez y Sangre Water Planning Council



Spring 2001

Alternatives Will Assure Adequate Water Supply for the Future

hat can people living and working in the Jemez y Sangre region do to make sure there is enough water to support the population here for the next 60 years? The Alternatives Subcommittee of the Jemez y Sangre Water Planning Council is studying the possible answers to that important question.

The alternatives that are being considered to balance water supply and

demand are comprehensive (see accompanying table).

They range from intensive conservation programs to better management of forests *continued on page 3*

JEMEZ Y SANGRE REGIONAL WATER PLAN

ALTERNATIVES

- The list of alternatives developed by the Alternatives Subcommittee is arranged in four major categories: Increasing Regional Supply, Moving or Adding Diversions within the Region, Importing Water, and Reducing Demand.
- Increasing Regional Supply
- Forest/woodland watershed management—for greater yield of snowmelt and runoff
- Conjunctive use-strategic and selective use of groundwater
- and surface water during dry and wet years
- Stormwater management—collecting flashflood runoff with
- checkdams for future use
- Groundwater treatment—desalination and removal of trace constituents
- · Water harvesting through rooftop collection
- Reservoir management
- Building new reservoirs
- Loss reduction by efficient water delivery systems.
- · Wastewater reuse as return flow credits, artificial groundwater
- recharge, irrigation, manufacturing and industry
- Cloud seeding
- · Appropriation of water from above-average runoff
- · Replacement of septic tanks
- · Wellfield management and well dispersal
- Repair and maintenance of municipal and community distribution systems

Moving Or Adding Diversions Within Region

- · New municipal, community and industry wells through rights
- acquisition
- New domestic wells
- Water banking
- Establishment of a water marketplace

Importing Water

- San Juan-Chama water
- Other potential transfers of water rights into the region

Reducing Demand

- Conservation
- · Education and awareness
- Incentives/efficiency/accountability through metering and monitoring, low-flow devices, xeric landscaping, industrial efficiencies
- Growth management and land use planning
- Drought management planning

CRITERIA

The Alternatives Subcommittee has established seven categories of criteria for assessing the feasibility of each alternative and its potential effect on society, the economy and the environment in the short-run and the long-run.

Then, each alternative will be given a score representing its potential for increasing the supply of water, improving the effectiveness of existing water systems and reducing demand.

The criteria are as follows:

- Technical feasibility—Does the knowledge and technology exist to implement the alternative?
- Economic feasibility (cost)—What would it cost to implement the alternative?
- Public/political feasibility—What political considerations or other public sentiments exist that would affect the possibility of implementing the alternative?
- Legal feasibility—Is the alternative allowed under current law, or would it require a change in law to implement?
- Social/cultural impact—How will the alternative affect society, traditions and communities?
- Economic impact—What effect would the implementation of the alternative have on the business and jobs climate in the region?
- Environmental impact—How would implementing the alternative affect the environment?

<u>SPLASHES</u>

Sundheimer Named City Water Director

Marlene Sundheimer has been named director of the City of Santa Fe's Sangre de Cristo Water Division. She will begin her job on June 18.

Sundheimer has been serving as the deputy commissioner for the City of Cleveland's Division of Water since 1999. Before then, she was the water division's risk manager for six years and assistant director of law for Cleveland's legal department. The Cleveland water utility employs over 1,000 staff members and has over 400,000 service connections, compared with 30,000 connections of the city of Santa Fe.

Sundheimer has a bachelor's degree in political science from Hiram College and a law degree from the Marshall College of Law, Cleveland State University. Prior to her service with the city of Cleveland, she was in private law practice.

Jemez y Sangre Water Planning Council **NEW/**

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Region Residents Turn Out for Supply/Demand Meetings

he Jemez y Sangre Water Planning Council conducted public meetings throughout the region in February 2001 to present water supply data and population forecasts through 2060.

More than 200 people attended 11 public meetings in Velarde, Los Alamos, Espanola, Tesuque, Pojoaque, Santa Fe, Eldorado, Cerrillos, La Cienega and Galisteo.

Duke Engineering and the UNM Bureau of Business and Economic Research prepared the detailed reports on the water supply and population projections for the region. The Supply/Demand Subcommittee worked for six months to prepare the information for presentation to the public in a

format that shows how much water is available and how much could be needed. The data was adapted for presentation by Amy Lewis, Paul

The data show that, in general, there is sufficient groundwater and surface water in the northern parts of the region to serve the population's municipal, industrial, domestic and agricultural demand for the present, although water quality is a concern. In the southern part of the region, there appears to be sufficient surface water for agriculture, but the groundwater supplies are gradually being depleted, and population is growing much faster.

Aamodt, Francis West, Bob Vocke and Ed Moreno.

The "most likely" population projections show that the demand for water will exceed the supply in almost every sub-basin over the next 60-years, which must not occur. Thus Jemez y Sangre Water Planning Council is looking at alternatives to reduce demand and increase supply.



The "most likely" population projections show that the demand for water will exceed the supply in almost every sub-basin over the next 60 years

People who attended the public meetings received basic information about the supply of available water in the region and the population projections. Comments were recorded and summarized by the facilitation team, and everyone who signed up on the attendance sheet received a draft of the comments made at the meeting they attended.

Among the more frequent comments made about the data were concerns about the population projections, that they were confusing, or inaccurate, or simply too high. Others said that the data presumed that population growth would occur but that constraints would have to be considered. Others objected to the suggestion that water needed for growth would come from agriculture. The population projections were purposely not constrained by land or water availability so that decision-makers and the public could easily see what changes may be required. Some participants wanted more information about water quality.

The participants also were asked to state what they considered to be in the public's welfare with respect to water. (See Public Welfare article, page 4.)

The Council's contract facilitation team, Lucy Moore, Rosemary Romero and Ed Moreno conducted the meetings. In case you missed the meetings, you can get the summary information and submit your comments by contacting Amy Lewis, Sangre de Cristo Water Division, 505-954-7123.

"Alternatives Will Assure Adequate Water Supply," continued from page 1

and watersheds to ensure a sustainable water supply for homes, farms and businesses. The alternatives will be evaluated using a series of criteria that look at legal, political, economic, and technical feasibility, and socioeconomic, cultural and environmental impact.

The alternatives will also be evaluated to determine their potential for significant new supply or demand savings in the short-run and the long-run. Finally, they will be customized, wherever possible, to take into account particular circumstances in all 10 sub-basins of the region, which extends from Embudo to Madrid, and from Los Alamos to Santa Cruz.

The Alternatives Subcommittee has placed the alternatives and criteria into a matrix, which allows each alternative to be evaluated under each criteria. The Jemez y Sangre Council is planning to assemble a large team of experts in hydrology, economics, law, sociology and other disciplines to help draft preliminary assessments for the alternatives.

The completed matrix of alternatives and criteria will then be presented to the public in a second round of public meetings, tentatively set for later this fall.

Once the public has a chance to comment on the alternatives, they will be revised and adopted by the Jemez y Sangre Water Planning Council. The matrix will help the Council determine which alternatives are the most promising and how they will be incorporated in the draft regional water plan that will be submitted to governmental councils and boards in the region.

The accompanying table shows the alternatives that the Alternatives Subcommittee has identified as having some potential for increasing the supply, quality or availability of water, or reducing or managing the demand for water, and the criteria by which they will be assessed.

For more information about the work of the Alternatives Subcommittee, contact Paul Aamodt at 667-7247 or Claire Kerven at 665-4320.

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Fall Meetings Will Be Scheduled on Alternatives

This fall, the public will have a chance to talk to the JyS Council about the proposed alternatives for balancing water supply and demand, the definition of the "public welfare" relative to water, and other issues important to the regional water plan. At least three meetings will be held within the region.

If you are on the mailing list for this newsletter, the Jemez y Sangre Water Planning Council NEWS, you will receive notification of the public meetings. If you are not a subscriber to the NEWS, contact Amy Lewis at 505-954-7123.

Legislature Funds Regional Water Planning

he 2001 New Mexico Legislature considered more than 100 bills and hundreds of capital outlay requests related to water. The legislation ranged from specific tasks in existing water adjudication lawsuits to the complete reorganization of the state agencies that oversee water, environmental protection and natural resources.

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A complete list of legislation that was introduced, and whether they passed or failed, is available at www.nmwaterconnections.org. Among the most important bills for regional water planning was the General Appropriations Act, which appropriates \$1.5 million to continue the regional water planning process. The Jemez y Sangre Water Planning Council is slated to receive \$150,000 to continue the planning process that is under way. This appropriation is being augmented by an additional \$45,000 for regional water planning provided by the U.S. Bureau of Reclamation. Other significant bills related to water include:

- House Joint Memorials 14 and 6, endorsing and asking the State Engineer to formalize the policy of prohibiting the transfer of water rights from lands above Otowi Gauge to lands below it. The memorials passed both houses with one dissenting vote. The memorials are non-binding, but express the desires of the legislature. The intent of the memorials is to encourage keeping water within its area of origin and, in one memorial, to protect acequia-based communities.
- Senate Bill 602 gives municipalities the authority to limit the drilling of new 72-12-1 water wells (primarily domestic wells) within their city limits if they are near existing municipal water lines. The Senate narrowly passed the bill but it was approved unanimously by the House. The bill gives cities, towns and villages the ability to control domestic wells within their boundaries, allowing better control and management of water resources.

Public Welfare Statements Being Drafted

Residents of the Jemez y Sangre region who participated in the first public meetings in February were asked to talk about what they consider to be in the publicís welfare with respect to water. This information is important because consideration of the public welfare is one of the criteria required by law in order for New Mexico to protect its water resources for its domestic and commercial needs.

The Public Involvement/Public Welfare Subcommittee has begun the process of converting the public comments into the statements that define the public welfare of the Jemez y Sangre region. The draft statements will be presented at the second round of public meetings this fall and the public will have an opportunity to comment and recommend changes in the statements. Ultimately, they will be incorporated into the final JyS regional water plan. Some of the common themes that emerged were:

Water is a priceless commodity. Everyone should realize the interconnections of water and wildlife throughout the region. Everyone is responsible for its use and its conservation. Everyone must work together within a long-term perspective.

The rural, agricultural character of the region and its traditions should be preserved.

The aesthetic values and environmental benefits of water should be protected.

Water should be kept within the sub-basin and region where it originates. Private property rights and water rights should be protected. Local decision-making should be allowed and decisions made to benefit people and the environment.

Growth should be managed and land use should be linked to water use.

Conservation, demand reduction, sustainability and assuring an adequate supply are important values.

For more information about public welfare, contact subcommittee chair Conci Bokum at 505-986-3831. ≈



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Jemez y Sangre Water Planning Council

Regional water planning for the Rio Grande watershed, from Embudo to La Bajada.

Summer 2002

Regional Water Planning Reaches Important Phase

he collaborative regional water planning process that has been under way in North-Central New Mexico since 1998 is reaching an important stage.

This fall, the Jemez y Sangre Water Planning Council will present to the public a series of alternatives that have been identified as having the potential to close the gap between the supply of water and the demand for water that is projected to exist in the future.

The Council is a diverse organization that comprises all of the local governments, many state and federal agencies, as well as acequia associations, industry groups and interested nonprofit organizations. The six Pueblo tribes in the region have an open invitation to participate to any extent they desire. Numerous individuals with technical or professional expertise are also participating on committees.

Regional water planning is funded by the New Mexico Legislature through the State Engineer's Office and the Interstate Stream Commission. Although the plan drafted by the Jemez y Sangre Council is not binding on any of its members or local governments, it will help the region focus on long-term planning and help the state protect its water resources for future generations.

Public Meetings Set on Water Plan

Three public meetings have been scheduled to present scenarios, alternatives and the public welfare statements to the public for the first time.

SANTA FE Wednesday, October 2, 7–9 pm, Sweeney Convention Center

CERRILLOS / SAN MARCOS Thursday, October 3, 7–9 pm, Turquoise Trail Fire Station (across from San Marcos Feed and Cafe)

ESPANOLA Monday, October 7, 7–9 pm, El Convento, Española Plaza

Council members will also be scheduling presentations before local government bodies and other interested groups. For more information, contact Amy Lewis at 982-0405.

PLANNING SCENARIOS: Meeting the Supply / Demand Gap of 31,500 AFY by 2060

H ow will the Santa Fe, Española and Los Alamos area close the gap between projected demand for water and the available supply in the future?

The Jemez y Sangre Water Planning Council estimates that, based on demographers' projections, a gap of 31,500 acre feet per year of water (AFY) would exist by 2060 without an increase in supply, a decrease in demand, or a combination of the two.

That is more than the amount of water that is being used at the present time for municipal and industrial (M & I) purposes. The M & I category includes residential, commercial and all other nonagriculture water uses.

This fall, the Jemez y Sangre Water Planning Council will focus on that projected gap when it presents to the public several planning SCENARIOS about the future regional water supply. In the scenarios are 29 specific ALTERNATIVES that have been evaluated by a team of experts and the Council. Included in those 29 are eight alternatives that would help close the projected gap between the available supply and the projected demand for water by the year 2060.

The alternatives fall under the major categories of reducing demand through conservation and growth management, and shifting supply among areas of the region through purchases and transfers.

The remaining 21 alternatives were studied, but rather than narrowing the projected gap between supply and demand, those are more oriented toward efficiency, protecting and restoring exist-

PLANNING SCENARIOS

continued from page 1

ing supplies, and drought mitigation.

All of the alternatives are detailed in the sidebar below.

The estimate of the water demand in the regional water plan's planning timeframe—60 years—is based on an assumption that the average per person use is about 0.15 acre-feet of water per year in the region outside of Santa Fe. The amount in Santa Fe, because of the increased commercial, governmental and tourist-related industries, is 0.183 acrefeet per person per year in Santa Fe, says Council co-chair Bob Vocke, a Los Alamos National Laboratory natural resources scientist involved in the alternatives investigation. The 0.15 acre-feet per person average is about 50,000 gallons a year.

"Under the demographers' 'most likely' population projection, the additional population would require 31,500 acrefeet of water to be acquired or shifted from one location to another, if we continued to grow unrestrained and continued to consume the same amount of water per person," said Vocke.

Council member Conci Bokum of 1000 Friends of New Mexico emphasized that the scenarios include all efforts to close the supply-demand gap, including identifying sources of new water and reducing demand through conservation and managing growth.

The Council's population projections, prepared by the UNM Bureau of Business and Economic Research, indicate that the population in the Jemez y Sangre region would increase from 162,486 estimated in 2000, to 254,869 by 2030, and to 357,101 by 2060. Those "most likely" projections are based on recent birth, death, immigration and emigration rates.

PLANNING SCENARIOS

The planning scenarios were developed in part from public comments received during a dozen public meetings in 2001, and a detailed analysis of the alternatives conducted by a team of experts earlier this year.

The Council has developed four watersupply scenarios as a convenient way to focus public attention on difficult choices in long-term water resources planning. The scenarios will help the public more easily focus on future quality of life for their communities and everyone living in the Jemez y Sangre region.

Three of the scenarios represent broad public policy themes: maximizing conservation, growth management and moving water from agriculture to municipal, industrial, and domestic uses. The fourth scenario would close the gap through a mixture of alternatives from each of the other three scenarios.

Although none of the planning scenarios alone would likely satisfy the regionally projected water demand in 2060, the scenarios will focus the discussion toward the longterm policy implications of each group of alternatives. The public discussion will assist the Council in its deliberations toward the final plan.

In addition to the alternatives that comprise the scenarios, many alternatives were identified that would protect the region's water resources overall, providing general stability and reliability of the water supply for all water users.

Scenario 1—Emphasize Conservation

This scenario presents an aggressive conservation program in which all efforts are utilized to save water that is being used by all users in the region. The conservation scenario is projected to have significant impact on the gap, reducing the projected demand approximately 17,300 AFY. This scenario relies less on alternatives that would reduce the projected growth rate or moving water into the region or moving it from place to place within the region.

Example: A comprehensive, mandatory program of water conservation would prohibit all outdoor use of water and require the adoption of building codes that mandate conservation for indoor plumbing fixtures in all new homes. Rates would be increased to discourage use.

<u>Pros:</u> Minimal impact on agriculture; costeffective to implement:

<u>Cons</u>: Significant effect on certain industries such as landscaping, effectiveness declines with smaller water systems.

Scenario 2—Emphasize Growth Management

his scenario presents a strategy that restricts the amount of new residential and new commercial construction. It represents a potential demand reduction of 15,500 AFY to close the gap between supply and projected demand. Growth management also requires certain other restrictions on building methods and locations to make the optimum use of water, the best use of existing infrastructure and giving communities a basis for planning for growth. This scenario includes some water conservation related to new construction but does not count heavily on moving water into or within the region.

Example: A community elects to limit the growth rate that it will allow to occur, thereby reducing the amount of new water that will be required to serve those homes and businesses. The scenario projects population growth at half the rate projected by the BBER. A slower growth rate allows better water resource management.

<u>Pros.</u> Encourages community sustainability; minimal effect on agriculture.

<u>Cons</u>: Potential negative effect on affordability of housing and on the construction industry.

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Jemez y Sangre Water Planning Council News

Based on those projections, and the average amount of water used by residents in the region, the Council has identified a potential gap of 31,500 acre-feet per year by 2060.

"The study was based on status quo conditions as of 2000," said Vocke. "The Council did not attempt to modify the population projection through any policy decisions that might be made in the future, which gave us an unbiased view of what the future could be, based on no significant changes in conservation, growth management or water transfers."

The scenarios will help the Council

focus on the most important policy decisions for future water resources management and adjust the future water demand accordingly.

Once the plan is submitted to the State Engineer and the local governments in the region, they will decide whether and how to implement the plan. The plan will make recommendations that have ramifications for future land use, growth, the environment, the economy and society.

That is why it is critical for residents to review the scenarios and give the Council their input. ≈

Scenario 3—Emphasize Purchasing Water Rights

his scenario is focuses on shifting the use of existing water from agriculture to urban and suburban uses, where most of the population growth is projected to occur. It does not focus on reducing demand. It represents the third-largest single source of closing the gap between the supply and demand, with an impact estimated at 11,000 AFY, which could affect about 45 percent of irrigated agriculture in the region. The scenario is intended to concentrate the public policy discussion on the value of agriculture and the traditional lifestyle of rural northern New Mexico, especially where the culture is closely tied to acequias and farms. Example: Local governments and businesses would purchase agricultural water rights from individual farmers, acequia associations or indigenous tribes through the open market. at negotiated prices between willing sellers and willing buyers.

<u>Pros:</u> Urban quality of life is preserved; water invested in higher-value uses:

<u>Cons</u>: "Area of origin" protections are presently inadequate to protect rural communities and smaller mutual domestic water systems; increased reliance on domestic wells would impair overall supply.

Scenario 4—Reduce Demand and Increase Supply from Various Sources his scenario includes a combination of the alternatives in the first three scenarios, and is intended to present the effects of trade-offs among the negative and positive consequences of the critical alternatives. It would maximize the use of return flow credits by returning wastewater into the water supply system, estimated at 13,400 AFY when fully implemented. Example: Fully utilizing contract San Juan-Chama water, leasing a portion of Jicarilla-Apache San Juan-Chama water and obtaining the corresponding return flow credits could result in an increase of available water of about 20.6 acre feet per year and could be done relatively easily compared to the other scenarios. Meanwhile, managing growth and water conservation has potential savings of another six AFY. The purchase of about 3,000 acre-feet per year of water rights and allowing another 2,000 acre-feet of water per year through new domestic wells would increase the supply by 5,000 acre-feet per year in this scenario Pros: Minimal negative impact on all sectors, quality of life.

<u>Cons</u> New domestic wells harm senior water rights; greater vulnerability to droughts and other shortages.



Eldorado Voters OK Tax to Buy Water System

Voters in Eldorado, a significant component in the overall water budget for the Jemez y Sangre water planning region, have authorized a property tax levy to purchase the El Dorado Utilities Inc. water system.

Almost 69 percent of the 1,418 people who voted in the Aug. 20 election cast "yes" votes to give the Eldorado Water and Sanitation District Board the authority to issue up to \$7.9 million in bonds to buy the privatelyowned water utility.

The voter approval allows the District to begin negotiations to purchase El Dorado Utilities Inc., which was created by Eldorado developer AMREP, to serve the community. Meanwhile, El Dorado Utilities has entered into an agreement to be purchased by Utilities Inc. of Northbrook, IL, which in turn has been purchased by nv NUON of Amsterdam, Netherlands.

Voters in Eldorado and surrounding communities served by the water system said that the availability of water was too important a local resource to be in the control of private entities far from New Mexico.

Jemez y Sangre Water Planning Council **NEW/**

The Jemez y Sangre Water Planning Council NEWS is published by the City of Santa Fe and distributed through the support of the Los Alamos National Laboratory.

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Public Meetings Will Focus on Public Welfare

n important and necessary ingredient of the Jemez y Sangre regional water plan is a PUBLIC WELFARE statement, written as a result of the many public comments received during the first round of public meetings in early 2001.

The term "public welfare" was used in a landmark water case in which the federal courts said New Mexico could protect its water from export and transfer to other states, but only if it planned for its use. One of the tests of planning is whether water was being used to benefit the "public welfare" of the people of the state.

"The public welfare statement describes what is important to the people of the region with respect to water," said Council member Conci Bokum of 1000 Friends of New Mexico. "The public welfare will help guide the policy decisions that need to be made in order for this region to have a sustainable future in its water supply."

Although the term "public welfare" was not clearly defined in the law, it is up to each region of the state to draft its own definition by declaring what attributes of the region that rely upon the use of water should be protected.

The Council will return to residents this fall seeking input on the public welfare statement, as well as the scenarios and alternatives being developed to guide the development of the plan. Once sufficient public input has been taken, the Council will finalize the statement and incorporate it into the plan. The draft public welfare statement is below:

PUBLIC WELFARE

Water is the element that interconnects all people and their environment in the Jemez y Sangre region, and the region to the larger environment that is the earth. Every person living in the region 4 expects enough water for basic needs, and every person has the responsibility to protect water resources and use their share wisely. Using the best possible information, water planning and decision-making should balance diverse needs and reflect the values of the region.

Rural Character

Residents of the Jemez y Sangre region place great value and importance on the preservation of the rural character of the region. Urban and rural residents alike appreciate and wish to maintain the historic, agriculture-based communities, rural vistas, wildlife habitat and attributes of natural landscapes including rivers, streams and trees.

Water Sustainability

Residents understand that the history of the region reflects water scarcity and cycles of drought. It is a high priority of residents of the region to serve current and future human needs without long-term depletion of the available water supply, while maintaining acceptable water quality and healthy interdependent ecological systems. Sustainability requires a combination of efforts, including encouraging conservation and efficiency by all sectors at every scale, discouraging activities that deplete or degrade the water supply, planning for population growth and land use, seeking new water sources that do not impair other regional values, and improving the use of existing water supplies.

Economic Sustainability

Each sub-region has unique economic

needs and conditions that depend on the availability of water. It is important to have quality jobs and a healthy economy in order to maintain a good quality of life in the long term.

Water Quality

Water quality is a significant element in the region's water supply. In many sub-basins, the available groundwater has been compromised by contamination, either human caused or natural. Wastewater treatment and reuse of treated water should be expanded throughout the region. The available water should be protected from potential contamination from the impacts of human activities or natural events.

Rights and Responsibilities

Water planning must be carried out in a context of respect for water rights and property rights. Like all rights, the right to use water, especially in an arid region, is married to the responsibility to use water efficiently and wisely. The Jemez y Sangre region respects the senior water rights of the pueblos in the region and recognizes pueblos' tribal sovereignty.

Decision-Making

In this demographically and geographically diverse region, it is necessary for all governmental and private entities to work together to achieve the goal of a balanced and sustainable water future. Fostering healthy, vibrant communities requires a commitment to open, inclusive dialogue and decision-making.



"You don't need a weatherman to know which way the wind blows."

-Bob Dylan

2002 Drought Among the Worst in Memory

b Dylan said, "You don't need a weatherman to know which way the wind blows."

This year, it was blowing dry and the regular monsoons made only a brief appearance in July. The drought has increased fears that the supply of water is insufficient to meet the demands of a growing population.

Average precipitation in New Mexico has made 2001-2002 the sixth worst since 1895. By the start of summer, conditions were getting worse. The precipitation during the winter of 2001-2002 was the lowest ever recorded in New Mexico. Because headwaters areas in Colorado have been equally dry, streams in New Mexico have been at record lows. Fires were breaking out and spreading all over New Mexico, southern Colorado and the rest of the West.

Although summer rainfall was forecast to be about normal, a weak El Niño wouldn't provide much relief, experts said.

Source: New Mexico Drought Planning Team: <u>weather.nmsu.edu/drought/advjune</u> <u>2002.htm</u>

Experts Probe Alternatives to Balance Long-Term Water Supply and Demand

he scenarios that are used to focus attention on future water management and usage call on the water savings or acquisition that would be achieved through 29 alternatives that were evaluated by the Council.

More than 20 experts in hydrology, planning, economics, rural communities, water system facilities and agriculture met for four days in February to examine the

ALTERNATIVES THAT PROTECT AND ENHANCE EXISTING WATER SOURCE:

Alternatives to Meet Current Demand through System Efficiencies

- Re-use wastewater
- Line irrigation ditches
- Repair leaks in water systems
- Establish a regional water system
- Utilize underground aquifer storage and recovery
- Optimize reservoir storage/management
- Pipe water directly from Heron and Abiquiu reservoirs

Alternatives to Protect Supply for Existing Demand

- Restore and manage high-altitude forests, piñon-juniper woodlands and riparian areas
- Manage stormwater
- Utilize cloud seeding to increase precipitation, runoff and infiltration
- Initiate more effective wellfield management
- Conjunctive use of surface water and groundwater in wet and dry years
- Remove trace constituents from groundwater
- Remove sediments from reservoirs
- Desalinate groundwater
- **Alternatives to Mitigate Drought**
- Water banking
- Conservation

The alternatives were discussed and evaluated on the basis of their potential to increase supply, reduce demand and increase the availability of existing water through system efficiencies, protection of the environment and drought mitigation.

The alternatives under discussion to balance water supply/demand are:

ALTERNATIVES THAT REDUCE DEMAND OR INCREASE AVAILABLE SUPPLY:

Alternatives that Reduce Demand

- Manage growth and land use
- Water conservation, with variations for indoor and outdoor use, and new and existing construction

Alternatives to Add or Move Water Rights to the Region

- Use San Juan-Chama water through full utilization of existing contracts, leases from the Jicarilla Apache Tribe and applying return-flow credits for wastewater discharged back into the water supply
- Transfer water across Otowi Gauge
- Purchase water rights in the marketplace
- Drill new domestic and mutual domestic wells
- Speculative alternatives to add or move water rights
- Line agriculture ditches and transfer rights to domestic uses
- Re-appropriate water to 1929 conditions at Otowi Gauge
- Build new reservoirs
- Appropriate and use water from runoff flows during spill years ≈

NEW MEXICO IN CRISIS: Regional Water Planning is More Important than Ever

By Elmer Salazar, Co-Chairman, Jemez y Sangre Water Planning Council

w Mexico and much of the West are in a drought unseen in a century. Local governments are considering and implementing emergency moratoria and conservation measures. From Cerrillos to Chimayo, the National Guard has been called out to truck water to residents whose domestic wells are going dry or are contaminated.

Though emergency measures grab the headlines, the Jemez y Sangre Water Planning Council is taking a quieter, longer-term view.That's because the Council has been developing a longrange water plan for north central New Mexico. The Council represents local governments, water users and various interested groups in Santa Fe, Los Alamos and southern Rio Arriba Counties, and is consulting with the Pueblos in the region.

The regional water plan is designed to look 60 years into the future. When complete, it will identify ways that north central New Mexico can work on its water supply and demand gap for at least the next 60 years.

This long-range plan, if done well, will help the Jemez y

Sangre region withstand future droughts in a more organized, less stressful manner. Officials must respond to the present crisis the best way they can, but throughout the region, people are experiencing long-term water quality and quantity problems that have been growing worse for years. Once a regional plan is implemented, it will help us avoid recurring crises over water.

The Council is organized under the auspices of the New Mexico Interstate Stream Commission and part of a statewide effort to plan water use regionally. The plan, which will be finalized within the coming year, will be submitted to the Office of the State Engineer and the Interstate Stream Commission, and then offered to local governments for their consideration.

Although the plan is not mandatory, it should be influential because the Council is a broad-based organization and its work will reflect a tremendous amount of public input from its members and people who live in the region. The New Mexico Water Trust Board gives priority to funding projects supported in the regional plans, giving a greater voice to the plans.

Jemez y Sangre Water Planning Council Sangre de Cristo Water Division P.O. Box 909 Santa Fe, NM 87504-0909

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Jemez y Sangre Water Planning Council

FIRST ROUND OF PUBLIC MEETINGS SET FOR REGIONAL

WATER PLANNING

Residents of north central New Mexico will have a chance during February to tell regional water planners what they think about water, what it means to their communities, and how they might want to see it administered over the next 60 years.

The Jemez y Sangre Water Planning Council is working on the regional plan and the council will host the first round of public meetings throughout the region.

The Jemez y Sangre region includes the northern two-thirds of Santa Fe County, the southeastern tip of Rio Arriba County, and all of Los Alamos County. Generally speaking, it includes every community in the Rio Grande drainage area between Embudo and Cochiti Lake. The area is divided into 10 sub-basins, representing major rivers and streams.

The council has commissioned two important reports that will be discussed at the meetings.

The first is an engineering report that summarizes all of the known sources of water in rivers, streams and underground, how much of it is known to exist, how it is used, and its quality. The second report projects what the population of the region through the year 2060.

Along with the two reports, people will have a chance to discuss the challenges of increased demand, the possibilities of increasing supply, and possible ways to deal with imbalances.

The information gathered at the meeting will be used by the council to identify possible alternatives for the management of water for the next 60 years. The array of alternatives will be put before the public in a second round of public hearings later in 2001.

For more information about the Jemez y Sangre Regional Water Plan may call Amy Lewis, water resources planning coordinator, City of Santa Fe, at 505-954-7123.

SCHEDULE OF FIRST ROUND PUBLIC MEETINGS – FEBRUARY 2001 – All Meetings 7:00 – 9:00 p.m.

February 1 February 7 February 8 February 13 February 15 February 19 February 20 February 21 February 22 February 27	Velarde Elementary School -Velarde Hilltop House Hotel – 400 Trinity Drive – Los Alamos La Cienega Community Center – La Cienega El Convento – 1 Camino de los Espanoles – Espanola Tesuque Elementary School – Tesuque Eldorado Elementary School – El Dorado Sweeney Convention Center – Santa Fe Santa Fe Community College- Jemez Room – Santa Fe Pojoaque Elementary School – Pojoaque
February 27	Cerrillos – St. Joseph's Parish Hall – Cerrillos



Jemez y Sangre Water Planning Council

Regional water planning for the Rio Grande water/hed. from Embudo to La Bajada

Winter 2002-03

Draft Plan Ready for Public Presentation

NEULS

he Jemez y Sangre Water Planning Council (JySWPC) has finished the first draft of the Regional Water Plan and will present it to the public and government entities this spring.

"Once it is approved by the Council, the plan will give local government leaders the opportunity to look farther into the future than the present water crisis so they can develop rational programs for meeting the future demand for all of their residents. This can be done while protecting the unique character of the region," said Bob Vocke, co-chairman of the JySWPC.

The draft plan presents water supply and availability along with projected population growth in the region, which show that the region must save or transfer 31,500 acre-feet per year by the year 2060. That is more water than residents presently use for non-agricultural purposes.

Readers can also see the alternatives that were studied for fulfilling future demand, and how the Council determined the effectiveness of each. And finally the plan outlines scenarios for the region, focused on similar conditions in the areas around Española, the Pojoaque valley, and the fast-growing Santa Fe area. Los Alamos and Galisteo scenarios are also presented.

The document contains extensive background information on the region, including geography, climate, natural resources, present uses of water, the history of the JySWPC, the public involvement process and the guiding principles contained in the Public Welfare Statement. Two key reports that formed the foundation for the plan are summarized in the plan. The first is a technical report by Duke Engineering & Services,

continued on page 2

General Findings Expose Looming Water Crisis in Jemez y Sangre Water Planning Region

A water crisis is looming in the Jemez y Sangre region during this century, according to the factual findings that will be published along with the Jemez y Sangre Regional Water Plan. The water plan focuses on water supply and demand to 2060, when the children of today's newborns will be raising their own families.

Because of the normal arid climate and existing population, the region's water supply is already vulnerable to many factors, according to the General Findings of the plan. Among those:

•Groundwater pumping exceeds recharge, resulting in an undesirable decline in the amount of available water in some areas of the region.

•The proliferation of domestic wells is beginning to affect senior water rights and surface water supplies in some areas of the region.

•Surface water supplies 74 percent of the region's water and it is vulnerable to fire drought and watershed health degradation.

These factors are critical now, but the vulnerability will only increase as population in the region continues to grow. Using the previous quarter-century of demographic data, demographers project that the population could increase from the current 160,000 to about 360,000 by the year 2060.

That would require communities and individuals in the region to acquire or conserve the equivalent of 31,500 acrefeet of water per year. That is more than the approximately 27,000 afy presently used for municipal, domestic and commercial demands.

Other critical factors related to future demand include:

•San Juan-Chama project water might fulfill about 40 percent of the difference between supply and demand by 2060 if expected yields are realized, however those estimates are optimistic.

•Inter-region transfers of water from agriculture to urban uses would have public welfare implications if provisions were not made to take small, farming communities' needs into account.

•By themselves, neither conservation, growth management nor transfers of water within the region will fill the gap between supply and demand by 2060.

●Based on existing climate records, New Mexico will experience extended periods of drought during this century, with years much drier than in recent times.

Draft Plan Ready for Public

continued from page 1

estimating the quantity, availability and quality of groundwater and surface water throughout the region. An estimate was prepared for each of the 10 sub-basins in the region.

The second is a study by the University of New Mexico Bureau of Business and Economic Research, estimating the number of people that would be living in the region if recent population growth trends continued.

The plan also presents a summary of current water uses, a summary of conservation approaches to meeting the future demand, and projected water uses in the future. Copies of the draft plan are on file in Santa Fe at the LaFarge Library on Llano Street and the Main Library downtown, as well as at the public libraries in

Is Implementation in the Future of Regional Water Planning?

What happens after the Jemez y Sangre Water Planning Council completes its work and submits a plan for acceptance by the Interstate Stream Commission (ISC) during Spring 2003?

Council members have begun exploring the role of the Council as a vehicle for the implementation of the regional water plan. To prepare its submission to the ISC, the Council will Española and Los Alamos. Copies of the technical White Papers used to evaluate the alternatives are available at www.dbstephens.com/publications.

ask the local governments in the region to endorse the plan, although that does not require any action on their part. The Council will be taking up that question in the next few months.

For more information or to comments on the Council's future role, contact Amy at amychilderslewis@earthlink.net or Bob Vocke at 505-667-4335 or Vocke@lanl.gov.

Use Less Water, Get More Water: JyS Recommendations Will Help Meet Future Demand

The Jemez y Sangre Water Planning Council has proposed a number of alternatives for local governments and other entities to pursue in order to help the region meet the projected future demand for water.

The recommendations cover the twodozen alternatives that were evaluated by technical experts, staff and the Council during the past year. They are organized in five categories.

Categories I, II and III describe methods of protection, restoration and management of water supplies in a way that stabilizes and improves existing supplies, especially during drought periods, but not result in quantifiably new water. For those, the Council strongly recommends that appropriate regulatory and natural resource management agencies pursue their implementation.

Categories IV and V would result in quantifiable changes in the water supply or population demand to meet projected future demands. For those, the Council does not recommend how communities should close the projected gap between supply and demand, however, it does suggest the major options, all of which would require extensive public participation and coordination among agencies. Category I: Recommended Actions To Protect Existing Supplies

- Restore watersheds.
- Manage storm water to enhance recharge.
- Conduct pilot cloud seeding projects.
- Manage water resources sustainably through better understanding of hydrogeology.
- Establish Critical Management Areas to protect groundwater resources.
- Develop conjunctive use strategies.

- Appropriate flood flows.
- Remove trace constituents to protect human health.
- Address septic tank water quality degradation.
- Clean up contaminated groundwater.
- Continue funding programs to protect surface water and groundwater.
- Support restoration of stream reaches to their designated uses.

Category II: Recommended Actions To Improve System Efficiency

- Require wastewater reuse.
- Encourage rainwater collection.
- Line ditches
- Remove sediment in Santa Cruz Reservoir and investigate Nambe Reservoir.
- Repair leaks in water systems. Consider aquifer storage and recovery
- (ASR) of excess water.
- Pursue increased storage capacity in Abiquiu Reservoir.

Category III: Recommended Actions To Address Drought

- Develop drought contingency plans.
 Category IV: Recommended Actions To Reduce Projected Demand
- Pursue water conservation.

Category V: Recommended Actions To Increase Water Supply

- Pursue diversion of SJC water as appropriate.
- Limit use of domestic wells.
- Transfer water rights through consensus process.

Consider growth management.

Water Planning Partners Step Up to the Plate

A mong the 24 organizations that are members of the Jemez y Sangre Water Planning Council are three that have contributed significantly to the planning work with substantial staff participation, administrative support and funding.

The City of Santa Fe, Los Alamos National Laboratory and the U.S. Bureau of Reclamation have contributed significantly to the JySWPC and have ensured the success of the planning process.

The bulk of the funding for the Jemez y Sangre Regional Water Plan was appropriated by the New Mexico Legislature through the Interstate Stream Commission. The ISC funding has totaled \$390,000.

U.S. Bureau of Reclamation

The U.S. Bureau of Reclamation (BOR) is virtually synonymous with water management in the West and New Mexico. Its projects are important and help provide reliable water supplies to New Mexico's smallest villages and its largest cities.

Steven Bowser, Water Resource Planner & Engineer with the BOR, has contributed his agency's expertise as its delegate to the Jemez y Sangre Water Planning Council.

"We have an interest in all water issues in New Mexico especially involving the Rio Grande and Pecos Rivers, where we operate facilities," said Bowser. "We want to be involved in the process and stay on top of things so we know what proposals are being made that might affect our operations."

Beyond his involvement, the Bureau has made three substantial grants to the Council totaling \$167,000. The Bureau supported the research and report by Duke Engineering and Services, which quantified the water resources of the region. Later, it provided funding for the planning charrette, which brought together technical, legal, financial and other experts to evaluate the alternatives that had been suggested by the public. Finally, the Bureau has provided funding for Amy Lewis to continue as the water planning coordinator, previously provided by the City of Santa Fe.

Los Alamos National Laboratory

Bob Vocke, Chief Natural Resources Scientist for the Risk Reduction and Environmental Stewardship Division at Los Alamos National Laboratory, has been the Council's chairman for two years as part of the Laboratory's support for the Jemez y Sangre water planning efforts. He describes the contribution as the equivalent of a half-time employee assigned to with the Council.

"The Laboratory is committed to continually improving social, environmental, and economic performance of its operations through cultural and natural resource trusteeship; energy and water conservation; precautionary actions; community collaborations; and environmental stewardship of operations.

The Lab's "in kind" contributions have included chairing the Council, participating on subcommittees, providing administrative support including copying materials and mailing, technical database development for the water supply study and hosting the Area of Origin workshop.

In addition to direct laboratory support, the Los Alamos National Laboratory Foundation provided \$6,000 in funding for the first edition of four newsletters that were published during 2000 and 2001.

City of Santa Fe

The City of Santa Fe, one of the original organizers of the Jemez y Sangre Water Planning Council, provided essential services at the beginning of the water planning process. As part of the joint powers agreement, the city agreed to provide "in-kind" support through the assignment of a half-time staff member to the Council.

"The city was committed to water planning and created the position specifically for this purpose," said hydrologist Amy Lewis, who was tasked by the city to work for the JySWPC.

Lewis performed virtually all the essential staff work during the first four and a half years of the Council's existence. After leaving the city in early 2002, she remained the Council's primary staff member under the Council's contract with the Bureau of Reclamation. Winter 2002-03 Jemez y Sangre Water Planning Council News



Estevan Lopez Named Interstate Stream Engineer; Governor Calls for State Plan

Gov. Bill Richardson has named a new State Engineer, a new Interstate Stream Engineer, and intends to introduce legislation to develop a state water plan (SWP).

John D'Antonio, former Director of the OSE's Water Resource Allocation Program and former Environment Department secretary, was named State Engineer, responsible for water rights administration and overall agency management. Estevan Lopez, the former Santa Fe County manager who was the first chairman of the Jemez y Sangre Water Planning Council, was named Interstate Stream Engineer, responsible for compact administration and related issues.

The Interstate Stream Commission will be responsible for water planning. At press time, legislation had been introduced setting up a procedure and a committee to develop the SWP.

Jemez y Sangre Water Planning Council **NEWS**

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Focus on Area of Origin and

The JySWPC conducted a special workshop in late 2001 focusing on two critical subjects and their potential for improving the management and use of the region's scarce water resources: Area of Origin protections (AO) and Critical Management Area designation (CMA).

The workshop was attended by many JySWPC members as well as a number of local elected and appointed officials from the City of Santa Fe, Santa Fe County, City of Española, Rio Arriba County and Los Alamos County.

Area of Origin Protections Explored

One of the most difficult issues facing the Jemez y Sangre Water Planning Region is how to fill the gap between supply and demand using locally available water without needlessly drying up the historic, traditional communities that give New Mexico much of its distinctive character.

That was one of the subjects of a November workshop of the Jemez y Sangre Water Planning Council. The subject of Area of Origin protection (AO) is a crucial issue for the Jemez y Sangre region because of the large number of Pueblos and historic rural villages whose livelihood and culture have depended on surface water irrigation since long before the Industrial Revolution changed society forever.

The workshop brought out several alternative perspectives on the issue, ranging from total prohibitions on transfers out of originating areas, to letting the marketplace determine where and how water is used.

Communities such as Velarde, Chimayo, San Juan Pueblo and La Cienega, founded during an agricultural era are emblematic of New Mexico's cultural distinctiveness and charm. Their quietly gurgling acequias and riparian wildlife attract tourists and new residents alike.

Water has been the lifeblood of those communities since they were established, but population growth in the region is pressuring some individuals in those communities to sell their water rights to serve the needs of growing cities.

Several workshop participants suggested that the local economy, employment and quality of life would be jeopardized if growing population areas did not have access to available water in nearby rural areas. Given that population patterns and the agricultural value of water has diminished in recent decades, it was argued that available water should be available where it is needed.

Others suggested that the rural water users form alliances to market water jointly to the larger, growing cities such as Santa Fe. A model for that activity was cited in southern New Mexico, where the Elephant Butte Irrigation District is marketing its water to fast-growing Las Cruces and playing a major role in overall development in that region.

Under current New Mexico water



Jemez y Sangre Water Planning Council News

4

Critical Management Areas

law, already, "parciantes" or shareholders in an acequia organization, have elected to sell their rights to water brokers as they abandon agriculture as a way of living, and advocates say that poses a threat to their existence.

Attorney and advocate David

Benavides says the individual power to transfer rights is the power to kill a community whose traditions depend on ditch irrigation. Even the individuals

depend on ditch irrigation.≈

who crafted interstate stream compacts decades ago realized that richer states could out-bid poorer states for water and leave the poorer state with not enough water for its own needs. The same principle should apply to smaller communities under pressure to sell water to larger towns and cities, he says.

AO's would let certain communities protect their water resources by letting them act collectively to veto certain sales if they are found to be harmful, or to negotiate as a community with potential water rights purchasers and lessees, and to plan for its own future needs.

The communities themselves are changing from an agricultural foundation to a "suburban" type of social and economic base, wherein at least one member of every household may work at a regular job in Santa Fe, Española or Los Alamos. So how can the essential character of those communities be preserved, or should they be preserved?

Benavides suggested possible Winter 2002-03

criteria for evaluating whether a transfer would benefit or harm a community, specifically: The benefit over time for the area and community, the number of people who benefit from a transfer, whether the economic activity remains in the

≈ Individual power to transfer rights is the power to kill a community whose traditions

-David Benavides, attorney

community and whether the agricultural base is eroded.

The workshop participants agreed that the regional water plan should recognize the long history of many communities in the region and should not work against their long-term interests. The group also agreed that it would be helpful to have an inventory of cases and processes that allowed for consensus-based transactions where AO's were protected and how it was accomplished.

Legislation is planned in the 2003 session that would affirm acequias' right to enact bylaws restricting the individual sale of water rights from the acequia, said Benavides. AOs could be recognized in regional water plans, the forthcoming State Water Plan or other forms of agreement.

For more information on this topic, contact David Benavides at 982-9886 ext 111.

Critical Management Areas Discussed

The Jemez y Sangre Water Planning Council has agreed to study and possibly use the Critical Management Area (CMA) designation to focus attention on locations that present unique challenges and problems in

> water management for the long-term future.

Council contract attorney Susan Kery presented a summary of CMA principles, procedures and their potential for their use in the region at a

November workshop.

The Council and others in attendance considered the CMA concept and agreed it would be worth exploring it as a valuable tool for planning. Opinions of the group on the use of CMA's ranged from devising a global designation that would cover large-scale situations, such as a region-wide water shortage, to more localized problems, such as where a community water system is going dry due to exhaustion of its aquifer.

The types of water problems that could be appropriate for a CMA designation include those involving proven contamination, thin aquifers or unsustainable water supplies, proximity to needed springs or risk of fire damage, such as watersheds. A CMA would trigger certain management options, including building moratoria, mandatory community systems, strict regulation of domestic wells or limits on water transfers or diversions in or out of the area. \approx

Steering Committee Makes Progress on Wastewater System Planning

The Española Valley / Pojoaque Valley Wastewater Steering Committee is proceeding with technical studies and project planning for a largescale wastewater system in Santa Fe County and Rio Arriba County.

The project area also includes the Pueblos of Nambe, Tesuque, Pojoaque, San Ildefonso, Santa Clara, and San Juan. The project is one of the first projects in the nation involving tribal and non-tribal participation.

The steering committee operates through the North Central New Mexico Economic Development District (NCNMEDD), the council of governments organization that serves Santa Fe, Los Alamos and Rio Arriba Counties, as well as, Taos, San Miguel, Colfax and Sandoval Counties. The District is an active member of the Jemez y Sangre Water Planning Council.

The NCNMEDD began a water quality study in September 1999, identifying 17 wastewater management

Jemez y Sangre Water Planning Council Sangre de Cristo Water Division P.O. Box 909 Santa Fe, NM 87504-0909 areas based on population and geography, developing population estimates for each area, assessing alternative septage treatment for each area, and estimating costs.

The project was started from funds from the Regional Development Corporation, the U.S. Economic Development Administration and the Environmental Protection Agency.

The technical report completed by consultant ASCG Inc. is being used to develop a Project Implementation Matrix and goals for the project, according to staff member Angela Schackel Bordegaray of the NCNMEDD, who is working with Edmund Gonzales of ELG Engineering.

The matrix is being developed to organize components of the project in each of the 17 areas, along with central contact information. The matrix will provide a guide to the short- and longterm activities. It will be presented at a series of public meetings over the next several months.

Among the areas of implementation is continued coordination with the New Mexico Environment Department on water quality testing and septic tank management programs.

Rio Arriba County, Santa Fe County, and the City of Española have passed resolutions endorsing sustained effort at a regional wastewater solution and officially naming a team to work on that process, comprising Rio Arriba County Manager Lorenzo Valdez, Santa Fe County Public Utilities Director Gary Roybal and Española Mayor Richard Lucero.

Also, Mayor Lucero and Santa Clara Pueblo Governor Denny Gutierrez are pursuing a joint treatment facility for the city and Pueblo, appointing members of each community to a task force for discussion.

For more information, contact Angela Schackel Bordegaray at 827-7313 or visit www.nm.localgov.net/nc.





The Jemez y Sangre Water Planning Council NEWS is published by the City of Santa Fe and distributed through the support of the Los Alamos National Laboratory.



Acequia Traditional Values Touted

BY DALE LEZON Journal Staff Writer

To some people, local acequias are more than irrigation ditches; they are cultural and social resources in traditional communities in northern New Mexico.

About 150 people attended a regional water planning forum Monday at Northern New Mexico Community College in Española for the Jemez y Sangre Water Planning Region. The region includes Santa Fe, Española and Rio Arriba, Los Alamos and Santa Fe counties and other areas.

Titled "Protecting Things We Cannot Bear to Lose," the forum focused on the need to protect acequias in northern New Mexico in part as a way to help preserve traditional communities.

Protecting the acequias promotes community among neighbors, said

Mike Mayr, a member of the Del Caño acequia in Nambé.

"I was a stranger," said Mayr, who moved from California to Nambé about six years ago. "I didn't know anybody 'til spring time, ditch cleaning time."

Now, Mayr said, other ditch users are his friends and the acequia promoted their social mingling, "We eat dinner together. It all came about because of the acequia," he said.

State Engineer Tom Turney said Monday's forum helped him better understand the importance of acequias as community and cultural resources rather than solely as irrigation tools.

"It probably will influence my future decisions," Turney said.

The forum also helped the Jemez y Sangre Water Planning Council, a group of community members and local government officials developing the region's water plan, understand locals' thoughts about acequias, council member Consuelo Bokum said.

Sponsored by the Santa Fe Land Use Resource Center, the forum is part of a proposed statewide regional water planning process.

The state is divided into between 10 and 16 water planning regions and eight are developing their water plans.

Once all the regions have established their plans, Turney said he will compile them into a state water plan.

Turney said he secured about \$1.7 million from the Legislature in 1998 to fund the regional plans and the first eight should be completed by about July 2000. Other regions will complete their plans at later dates, Turney added.

Each region has a planning council made up of representatives from

local governments and concerned entities, such as acequia associations.

The Jemez y Sangre Water Planning Council meets the second Monday of each month and has been gathering public comment about local water issues for nearly one year, Bokum said.

"In our region we have to balance all the (water) needs of the people who live in it," Bokum said.

Among the speakers at Monday's forum were Phillip Bové, commissioner of the Acequia Madre de Santa Fe; David Benavides, an attorney specialized in water and acequia laws; and Stan Crawford, an acequia commissioner in northern New Mexico.

Santa Fe and Santa Fe County water officials also attended the forum.

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Sunday, October 24, 1999 THE NEW MEXICAN F-7

Perspective Acequia-environmental link is crucial

e would like to thank the Jemez y Sangre Water Planning Council, the Santa Fe Land Use Resource Center, General Service Foundation, New Mexico Endowment for the Humanities and all the participants and observers for the two forums held at the Northern New Mexico Community College on July 12 and Aug. 9.

Both forums titled "Protecting things we cannot bear to lose" focused on the importance of protecting our rivers and watersheds and preserving the acequias and traditional communities. The attendance at both forums was excellent and beyond our expectations. The presentations were outstanding and the dialogue and questions from the participants and observers demonstrated the critical need to continue these forums. The issues discussed are vitally important in the continuous process of regional water and land-use planning. One of the most important things to come out of these two forums was the realization of the inseparable link between protecting the environment and preserving the acequias and traditional communities. In the past, some attempts have been made to portray environmentalism and acequias and traditional communities as having competing interests. This was dispelled by demonstrating that all are inseparable and co-dependent.

How can one protect the environment and not protect the traditional communities and acequias? All are, in the final analysis, one and the same. The perceptions that somehow the environment and traditional communities were somehow at odds were put to rest.

This, then, is the challenge for all of us: to continue the dialogue and understanding in order to properly plan for future land use and water use. We must not lose this wonderful opportunity, because the alternative will certainly be to allow other interests such as industrial and unchecked land development to fill the void because we failed to act.

> Nicasio Romero mayordomo El Ancon Acequia Association



Water Planning Underway in Santa Fe, Espanola, Los Alamos Area

by Estevan Lopez, Santa Fe County Utilities Director, Chairperson of the Jemez y Sangre Regional Water Planning Council

R egional water planning in North central New Mexico is about the things that matter most in the lives of our communities: land, climate and culture.

During the next two years, people from Santa Fe, Española, Los Alamos and surrounding communities will talk about those things in light of our most important natural resource — water.

In the Jemez y Sangré Regional Water Planning Region, we can no longer assume there will be enough water for all of the people who could be living here in 2060. The region extends from Embudo in the north to Madrid in the south, from the Jemez Mountains in the west to the Sangre de Cristos in the east. People in communities throughout the region will have numerous opportunities to participate in the creation of the regional water plan.

The Jemez y Sangre Regional Water Planning Council was formed in response to the need for New Mexico to understand its water supply and present and future uses. The need came to light nearly 20 years ago when the City of El Paso claimed water from New Mexico. The judge in the lawsuit ruled that New Mexico could only prevent the export of water if it had a plan for its use. Ultimately, the Jemez y Sangre plan and 15 other regional water plans will be unified in a state water plan by the New Mexico Interstate Stream Commission.

The task of the Council is three-fold:

First, the Council will gather data showing how much water is available for use in the region, taking into account snowfall, rain, runoff and recycling, as well as the various legal restrictions and allocations that exist. The data also will show present usage for city residential. agricultural



Water Planning Resumes in Santa Fe, Española, Los Alamos Area By Estevan López, Santa Fe County Utilities Director, Chairperson of the Jemez y Sangre Regional Water Planning Council

Regional water planning in north central New Mexico is about the things that matter most in the life of our communities: land, climate and culture. During the next two years, people from Santa Fe, Española, Los Alamos and surrounding communities will talk about those things in light of our most important natural resourcewater.

In the Jemez y Sangre Regional Water Planning Region, we can no longer assume there will be enough water for all of the people who could be living here in 2060. The regions extends from Embudo in the north to Madrid in the south, from the Jemez Mountains on the west to the Sangre de Cristos on the east. People in communities throughout the region will have numerous. opportunities to participate in the creation of the regional water plan.

The Jemez y Sangre de Cristo Water Planning Council was formed in response to the need for New Mexico to understand its water supply for present and future uses. The need came to light nearly 20 years ago when the City of El Paso claimed water from New Mexico. The judge in the lawsuit ruled that New Mexico could only prevent the export of water if it had a plan for its use. Ultimately, the Jemez y Sangre plan and 15 other regional water plans will be unified in a state water plan by the New Mexico Interstate Stream Commission.

The task of the Council is three-fold:

First, the Council will gather data showing how much water is available for use in the region, taking into account snowfall, rain, runoff and recycling, as well as the various legal restrictions and allocations that exist. The data will also show present usage for city residential, agricultural, environmental and industrial uses. The Council will then attempt to reach agreement on populations and future uses of water within the region. This crucial step will reveal whether there is currently an imbalance in the supply and demand of water or if an imbalance is likely to develop.

Second, the Council has defined 10 sub-regions in the region to include every watershed and community, and will convene meetings about water and the public welfare with the residents of those sub-regions. In two series of meetings, residents will have their say about what is important to them, their families, their jobs and their cultures.

Third, residents will help the Council identify what alternatives exist if there is a serious imbalance between supply and demand, and what choices may have to be made to make sure there is enough water to support the projected demand.

The questions may be difficult or impossible to answer. What effect do domestic wells have on a community's overall water supply, and when would a community system be beneficial? What kind of interaction over the use of water should occur between growing cities and rural areas? Under what criteria should competing uses of water be evaluated? The Council may not be able to settle every question. The local governments in the region will have to give final approval to the plan and ultimately the plan will be subject to state and federal law.

Residents of the region can help the Jemez y Sangre Regional Water Planning Council formulate and possibly answer these tough questions. The Council meets at 3 p. m. on the second Monday of every month at Northern New Mexico Community College in Española. Residents can also get on the Jemez y Sangre mailing list to stay abreast of the planning process.

Any resident who would like additional information about the Jemez y Sangre Regional Water Plan may call me at 986-6210 or Amy Lewis, water resources planning coordinator, City of Santa Fe, at 505 954-7123.

NMAA, continued

between parciantes and the association to place water rights within the community system, which will be managed and distributed by the association. Currently 12 parciantes are participating in the program.

During the question and answer period, David stated that the methods described by Peter and Arnold could be models for acequias to protect their water rights. When asked what might happen if these methods are challenged, he replied: "It's better to do something than nothing." Peter concurred, saying that while statute authority is the best guarantee for acequias, the political climate in New Mexico makes any legislative-driven changes risky. In the meantime, community-based programs like that of the Acequias de Chamisal y Ojito are good ways for acequias to be proactive.



JAN 1 3 1999

NETWORKNEWS

publication of the Santa Fe Neighborhood Network

JANUARY 2000

Editors Note:

The Neighborhood Network is a community-based association, linking the activities and concerns of the people of Santa Fe, first to each other, then to our City government and process. We sponsor informational forums, provide citizens with neighborhood contacts, and keep people informed through our Newsletter. The Network can also provide your association with a meeting place if you contact me, Lois Goodman(986-9933)and reserve a Monday night. The success of the Network is dependent upon the participation of all of us. Representatives from neighborhoods need to attend various City and EZC meetings, help is needed in contacting neighborhoods to tell them about upcoming issues, and material for the newsletter is needed in an edited format. The Newsletter tries to represent the various communities in Santa Fe, however if your neighborhood was not contacted, please let me know and we will save a place in our next issue. A General Meeting of people interested in helping with the Network will be held JANUARY 31, 2000, at 7:00 PM, in the Southwest Conference Room of St Vincent Hospital. Please plan to attend in order to lend your support to the organization.

UPCOMING CITY COUNCIL CANDIDATE FORUMS

This March marks the next election of the Santa Fe City Council. The Neighborhood Network will kick off the election season with two weeks of forums to be held in the <u>SOUTHWEST CONFERENCE</u> <u>ROOM. ST VINCENT HOSPITAL</u> adjacent to the cafeteria, lower level of the building. Attend and meet your candidates. The following people have been invited as candidates at the time of publication:

January 17, 2000 7:00-8:00 PM-District 1- Patti Bushee, incumbent, (owner of Ladybug Landscaping); Cliff Mills (artist, vendor and owner of Cliff's Blue Door Gallery) 8:00-9:00 PM- District 3 - Art Sanchez, incumbent (Korean war vet, and retired government employee); Miguel Chavez (local activist, woodworker, and woodworking teacher at Atalaya Elementary); David Coss (State Land Office, and former City Manager) January 24, 2000 7:00-8:00 PM- District 2 - Molly Whitted, incumbent (Public Regulation Commission); Karen Heldmeyer, City Planning Commissioner, activist, UNM psychology instructor) Amelia Romero Hollis (Santa Fe Fiesta Council member, retired nurse)

8:00-9:00 PM- District 4 - Dean Milligan,-City Planning Commission chairman (engineer State Highway Dept.); Matthew Ortiz, Lawyer for City employee's union (former SF County deputy attorney)

The candidates will introduce themselves, then a moderated discussion will follow with questions from the floor.



PAGE A1

Enter Slaying Case missing Charges in Video-Store Killings NEW MEXICO N.M. Babies Get Rough Start State Above Average for Unwed Parents





ig class at Santa Fe High School.



nardis joins two plates. He's a contender for an ning national student welding competition in May.

Study: Area Water Woes Will Worsen

Aquifers Already Being Drained

By JENNIFER MCKEE Journal Staff Writer

The equation between water and people in northern New Mexico will grow further out of balance in the next 60 years, according to studies released this month by a regional water planning team.

The Jemez y Sangre Water Planning Council has spent two years studying estimates of population growth and the availability of water in the region. The council, a county and state group supplied with some federal funding, took those findings on the road this month. The group met at El Dorado Elementary School on Monday night and will meet again tonight at the Sweeney Center in Santa Fe.

The findings are mostly common sense: Population will increase in the next 60 years and, unless something changes, water supplies will not.

The group estimated the population of northern New Mexico will almost triple in the next 60 years, growing from approximately 160,000 today to more than 350,000 in 2060.

Amy Lewis, water resource planning coordinator for the city of Santa Fe and one of the staff people on the council, said the figure represents growth based on previous population patterns and does not include the possibility that a future water shortage might curtail that growth.

For the purposes of the study, the council did not estimate any new drinking water sources, like new wells, but studied only existing wells and water systems.

The council divided the region

The city's San Juan-Chama project, which would bring new water to the city's municipal water supply, will keep Santa Fe satisfied until only 2040. After that, according the studies, the city will need an additional water supply or risk running dry.

PAGE 61

into several drainages or water basins. According to their statistics, water is flowing out of the area faster than it's flowing in, which means that even with today's population, northern New Mexico is draining its aquifers, Lewis said.

Based on that, she said, the region must do something about water use, even if the population remains virtually unchanged for 60 years.

The future looks particularly glum for Santa Fe. The Santa Fe Sub-basin area, which includes the city, will need an extra 13,200 acre-. feet of water by 2060 to accommodate the city's estimated population by then. An acre-foot is a standard measure of water and refers to one acre of land covered in a foot of water.

The city's San Juan-Chama project, which would bring new water to the city's municipal water supply, will keep Santa Fe satisfied until only 2040. After that, according the studies, the city will need an additional water supply or risk running dry.

Tonight's meeting, which will focus on Santa Fe, is scheduled to start at 7 p.m.

Demand might exceed water ly in 60 years, report says

By BEN NEARY The New Mexican

12 .

Santa Fe County's population will nearly triple over the next 60 years, and unless new sources of water are found to meet domestic needs, demand will greatly exceed the supply, according to a report prepared by the Jemez y Sangre Water. Planning Council.

The council, which includes local governments, acequias and federal agencies, will hold a series of public meetings beginning Thursday and continuing throughout February to discuss reports the council has commissioned on increasing demand for water, its limited supply and possible ways to make up the difference.

The council has received state and federal money to come up with a regional water plan. Ultimately, the Jemez y Sangre plan will take its place as one of 16 such plans that will cover the state.

The Jemez y Sangre planning area includes the northern twothirds of Santa Fe County, the southeastern tip of Rio Arriba County and all of Los Alamos County.

Amy Lewis, water-resource planning coordinator with the City of Santa Fe, drafted grant applications to secure funding for the Jemez y Sangre Water Planning Council. She serves as an organizer and spokeswoman for the council.

The University of New Mexico Bureau of Business and Economic Research prepared a study predicting population increase over the next 60 years in the planning area.

The study predicts the popula-

just the water planning area, will grow from 128,000 to 362,000 by 2060. For all of Rio Arriba County, the study predicts the population will increase from 38,000 to 46,000. And for Los Alamos County, it predicts the popula: tion will increase from 19,000 to nearly 22,000.

Lewis said the council estimates it will take an additional 31,000 acre feet of water to meet the increased demand in the planning area by the year 2060. Of that amount, she said that water from the federal San Juan/Chama diversion project could provide perhaps 12,000 acre feet.

The San Juan/Chama project carries water into New Mexico from southern Colorado through a tunnel system. An acre foot is about 325,000 gallons, the amount of water that would cover an acre to a depth of 1 foot.

"We're left with 19,000 acre" feet where we don't know where that's going to come from," Lewis said. "Will it come fromagriculture? Will it come from Jicarilla Apache's San Juan/Chama water that will be leased to the region?"

Unless the area works now and addresses regional supply and delivery questions, Lewis said the pressure will increase to try to make up any shortfalls by increasing reliance on domestic wells.

What I'm trying to show is that if we don't plan, if we don't talk to each other, and we stick our head in the sand and continue to go as we have been going, and the state engineer continues to allow domestic wells, the (shortfall) could get filled in with domestic wells," Lewis said. But domestic wells have a cost.

Some places in the study area tion of all of Santa Fe County, not already see water being drawn out of the aquifer faster than it's naturally being replenished.

The council wants to get public i involvement at this point to start the discussion about what the alternatives are to planning for the region's water future, Lewis said.

"If people really want to stop growth, we have to discuss what the implications are," Lewis said. "That means my son couldn't stay here, and have a job and a family. People want to keep doing what they're doing on their land, but they don't want their neighbor to impact them."

Under state law, the New Mexico State Engineer's Office has authority to consider whether particular applications to transfer water rights meet the standard of satisfying public welfare. Lewis said the public meetings are intended to help come up with a definition of public welfare.

The following meetings, all from 7 p.m. to 9 p.m., are scheduled:

Thursday, Velarde Elementary School.

Feb 7, Hilltop House, Los Alamos.

Feb. 8, La Cienega Community Center.

■ Feb. 13, El Convento, Española.

Feb. 15, Tesuque Elementary School.

Feb. 19, Eldorado Elementary School.

Feb. 20, Room 5, Sweeney Convention Center, Santa Fe.

Feb. 21, Jemez Room 3 at Santa Fe Community College.

Feb. 22, Pojoaque Elementary School

Feb. 27, St. Joseph's Parish Hall, Cerrillos. ,

Your words will count at water-planning sessions

the luck, snowpack on the Jemez and Sangre de Cristo ranges will spare Northern New Mexico another tinderbox spring and early summer. With greater fortune, and with plenty of participation from people all over el norte, our area will worry less about withered crops and concern itself with water planning against dry years to come

For the past couple of years, a group called the Jemez y Sangre Water Planning Council has been preparing several important reports:

A summary of all the known sources of water in rivers, creeks and aquifers; how much engineers and hydrologists think there is; and an educated guess as to water quality.

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The West's Oldest Newspaper

January 27

Founded 1849

A projection of population growth for the next 60 years. For Rio Arriba and Los Alamos Counties, the experts don't think it will be substantial; for Santa Fe County, however, we could be looking at more than 350,000 people by 2060.

That's a lot of bathtubfuls for this high desert - not to mention for the downriver cities of Albuquerque, Las Cruces-El Paso-Juárez and on down to the Gulf of Mexico. Nearly all of them depend on the Rio Grande - which, in some years, isn't so grande even where the Rio Chama flows in and few folks are taking it out. It took lawsuits from Texas to put New Mexico offi cialdom in a water-planning mood in the first place. Since then, environmentalists have descended on the courts with their own agendas, forcing upstreamers to take a serious look at our water needs - and how much of the stuff we can count on in years to come: El norte and the rest of the state are long past due for water planning. And rather than letting big-city bureaucrats do it, the process should include those who will be affected by it.

With that in mind, the Jemez y Sangre council, which includes community water associations, homebuilders' groups and acequias, as well as local, state and federal governments, including the Bureau of Indian Affairs, is holding public meetings throughout February. The 7 p.m. sessions begin at Velarde Elementary School Thursday. They're being posted in the communities of sub-basins between Embudo and Cochití Lake. *The New Mexican*, among others, will carry notices. Santa Fe will be the scene of two meetings: Feb. 20 at Sweeney Center and Feb 21 at Santa Fe Community College.

The water council wants to hear from you: How much will you, your family, your neighbors need? What does water mean to your community? How would you like to see it managed over the next 60 years?

Your words, in the month to come, could carry weight for decades to come.

said. "If a farmer wants to sell water rights, the city should be

exhausted our immediate guickfixes."

City water planner addresses future supply

,In late January the Santa Fe Real Estate Guide interviewed hydrologist Amy Lewis, Santa Fe's water resource planning coordinator and a member of the Jemez y Sangre Water Planning Council.

What is the subject and purpose of the February JYSWPC meetings?

Lewis: The meetings will be the first public presentation of two major studies which the JYSWPC has developed. The first is a population study which gives us an idea of how much our population will grow over the next 60 years. The second is a water supply analysis which summarizes what we know about our water budgets in 10 sub-basins within the region.

The council has taken the information from the two studies and projected how much water we may need to meet the projected population and where that water might come from. The results show that over the next 60 years an additional 31,000 acre-feet/year (afy) will be required to meet the municipal and domestic needs of the region, above the 22,000 afy presently diverted for those purposes. Only about 12,000 afy of additional supply (above what is already diverted) is available from San Juan-Chama presently contracted by the city and county of Santa Fe and the city of Española (assuming we get return-flow credits).

That means 19,000 afy must come from other San Juan-Chama water, other irrigation rights on the Rio Grande, or the demand must be reduced, or a combination of these. But if we don't plan and choose to ignore this problem, the water could be diverted through individual domestic wells that are automatically granted by the Office of the State Engineer under state law.

The purpose of the February meetings is to convey this information that we have gathered and obtain information about existing water plans and begin the process of sorting through this dilemma the region faces. My hope is that we can be creative and build a community out of this problem. My fear is that the problem will be divisive and divide us more.

I understand that Colorado does not release water into the Azotea Tunnel in times of drought, so our San Juan-Chama water supply is not guaranteed?

The San Juan-Chama water is stored in reservoirs and not dependent on monthly flows. Even though we have been told that our contracted right of 5,605 afy is a "firm yield" we should be prepared for times of drought. Our goal is to move to a more conjunctive use of our water resources, rely on renewable supplies (surface water) as much as possible when it is available and rest the aquifer so that we can tap that during times of drought.

Does the city allotment of San Juan-Chama water expire after each year, so if we don't use it we lose it?

We pay to store our unused San Juan-Chama water in Heron Lake. With all the snow we've had, will the city relax the 5-month-old water restrictions soon? The city manager is considering lifting the Stage 3 restrictions but may wait for the Feb. 1 runoff report from the Natural Resource Conservation Service to make the final decision.

Is the city doing any thinning in the watershed?

The city is working with the U.S. Forest Service to treat up to 7,000 acres in the watershed. A draft environmental impact statement should hit the streets in the next few weeks. This will involve cutting trees up to 16 inches (not all trees up to 16 inches) and prescribed burns.

In the meantime the City of Santa Fe is beginning on the first stage of treatment on about 250 acres of its own land. We will thin up to 6-inch trees and haul the material out of the canyon for latillas, firewood or chips. The city has hired a contractor to perform this work. No prescribed burns will be performed by this contractor.

The motivation is to reduce the risk of a catastrophic fire which could result in severe erosion, filling our reservoir with sediment and debris. I have pictures of Los Alamos Canyon Reservoir which I took in December and it looks like a primordial coze. This is what we are trying to prevent.

The Santa Fe River supplies 40 percent of our water needs, a supply we can not affort to go without. We are also curious to see if the water yield is increased by the thinning project, but it is not the motivating force.



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Report: City's thirst for water can't keep pace

By BEN NEARY/The New Mexican, The New Mexican - 2/21/2001

Faced with a planning report concluding that Santa Fe's population will nearly triple over the next 60 years while water resources will fail to keep pace, many city residents on Tuesday said local governments should consider strict conservation measures as well as moratoriums on growth.

The Jemez y Sangre Water Planning Council, which includes local governments, acequias and federal agencies, is holding public meetings around the county to get comments on possible ways to meet the rising demand for water. More than 60 people attended Tuesday's meeting at Sweeney Center in Santa Fe.

The study, which is scheduled to be finished next year, covers the northern two-thirds of Santa Fe County, the southern tip of Rio Arriba County and all of Los Alamos County. It's intended to be one of 16 regional water plans that ultimately will cover the entire state.

The study predicts that over the next 60 years, the population in Santa Fe County will increase from 128,000 to 362,000. Rio Arriba's population will increase from 38,000 to 42,000 while Los Alamos will increase from 19,000 to 22,000, the study predicts.

The increase in population in the planning area translates into an increase in demand for water of 31,000 acre feet per year, the council's study says. Only about 12,000 acre feet of that can be covered by water from the federal San Juan/Chama diversion project, leaving the area about 19,000 acre feet short. LINKS Send a letter to the Editor

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Work at The New Mexican February 21, 2001

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WHAT'S HOT

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• LINK TO THE NEW MEXICO LEGISLATURE: Find a bill in the 2001 session.

• THE CITY'S SNOW PLAN: Look up your Santa Fe address to find your street's plowing schedule.

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SEARCH THE SITE SUBSCRIBE VACATION STOP DELIVERY PROBLEMS WEB SITE FEEDBACK LETTERS RACK LOCATIONS 150 YEARS ADVERTISE IN PRINT ADVERTISE ONLINE CONTACT US WORK AT THE NEW MEXICAN The San Juan/Chama project brings water into New Mexico from southern Colorado through a tunnel.

An acre foot is about 325,000 gallons, the amount of water that would cover an acre to a depth of 1 foot.

The city and county of Santa Fe have contracts with the federal government for the San Juan/Chama water that expire in the year 2016.

However, Amy Lewis, water-resource planning coordinator with the city of Santa Fe, told Tuesday's meeting that city officials intend to meet with Sen. Pete Domenici, R-N.M., today to ask him to try to make the San Juan/Chama water rights perpetual.

Lindsey Grant, a writer on population issues who is working with Jemez y Sangre Planning Council, said people might dismiss as absurd projections that Santa Fe County's population will nearly triple over the next 60 years.

But Grant said, "Well, Las Vegas, Nev., is absurd, too."

Under comments from the audience, Nan Bourne of Santa Fe said the information on growth had been presented as a juggernaut bearing down on the city.

"We act like there is nothing we can do about it," Bourne said. "I would say, put a moratorium on growth until we know exactly what we have."

George McLaughlin, who said he moved to Santa Fe recently from the Midwest, said he believes it would be disastrous to stop growth in the area. However, he said residents need to practice conservation measures.

"I am appalled how many people who come from areas like I did who want to landscape their homes just like the places they left," McLaughlin said. "Sodded lawns have no place out here."

Melia Lewis of Santa Fe said citizens must conserve water. She said New York City undertook a massive conservation campaign RENTALS MERCHANDISE ANNOUNCEMENTS ANIMALS BUSINESS/FINANCIAL LEGAL NOTICES FULL INDEX

SERVICE SUBMIT OPEN HOUSE "To me, it feels very challenging as well as very exciting, instead of looking for new sources all the time," Lewis said of the conservation measures. "The information is there, and I think it would be a wonderful challenge to the city to say, instead of being water gluttons, to say, 'We live in the desert. We chose to live in the desert.' "

Carolyn Sigstaedt, a city resident who recently ran unsuccessfully for Santa Fe County Commission, said the area needs to install meters on wells. "How can we know where we're going if we don't know how much we're using?" she said.

The council has three more public meetings remaining on the report:

• Today, at Jemez Room 3 at Santa Fe Community College.

· Thursday, at Pojoaque Elementary School.

 \cdot Tuesday, at St. Joseph's Parish Hall in Cerrillos.

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Sangre

Water study: Future of Santa Fe bleak

▶ Public Utilities Committee gets 21 proposed solutions to water crisis

> **By TOM SHARPE** The New Mexican

Santa Fe and vicinity face a bleak water future, with water demand outpacing supply over the next half



Water Planning Council, which sponsored the study, Wednesday offered city councilors on the Public Utilities Committee 21 proposed solutions to the continuing water crisis. five The

categories include improving system efficiency. mitigating drought, reducing demand, increasing supply and restoring and protecting the supply for existing demand and the environment.

The most alarming part of Moreno's presentation concerned population projections for Santa Fe County and the surrounding area, includ-

Please see WATER, Page B-4



Ed Moreno from Sangre y Jemez Water Planning Council speaks during this week's public utilities meeting Luis Satumo

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Meeting the Need: Water Alternatives for the 21st Century

The Jemez y Sangre Water Planning Council is working on the regional water plan and has analyzed 21 possible alternatives for achieving a sustainable water supply for the 21st Century.

Public meetings have been scheduled in the region where residents can examine the alternatives, talk about key scenarios for our water future, and make recommendations to elected or public officials.

The Council expects to present the plan to the public and key state and local officials in early 2003.

PUBLIC INPUT IS NECESSARY AND VALUABLE

It is projected that the population of the Jemez v Sangre region will double over the next 60 years, based on trends that existed in the 1990s. The plan will recommend

alternatives to help local governments meet and/or reduce the gap between supply and demand of 31,500 acre-feet.

Moreover, the plan will also recommend ways to meet and/or reduce the demand while protecting those aspects of life in northern New Mexico that are special and which depend on water. That concept, known as PUBLIC WELFARE, will also be discussed at the public meetings.

The Jemez y Sangre region includes the northern two-thirds of Santa Fe County, southeastern Rio Arriba County and all of Los Alamos County - every community between Embudo and Madrid whose watersheds drain into the Rio Grande.

For information about the Jemez y Sangre Regional Water Plan, call Amy Lewis, contract hydrologist and coordinator for the Council, at 982-0405, or consultant Ed Moreno, 466-1183.

SCHEDULE OF MEETINGS - OCTOBER 2002

All Meetings 7:00 - 9:00 p.m.

Santa Fe Cerrillos / San Marcos Thursday, October 3

Española

Wednesday, October 2 Sweeney Convention Center New Turquoise Trail Fire Station (across from San Marcos Feed & Cafe)

Monday, October 7

El Convento, Española Plaza



Water Council Sets 3 Public Meetings

Journal Staff Report

The Jemez y Sangre Water Planning Council will hold three public meetings to discuss plans to meet future water needs in the tri-county area. The council covers the northern two-thirds of Santa Fe County, southeastern Rio. Arriba County and all of Los Alamos County.

Meetings from 7 to 9 p.m. will be held Wednesday at the Sweeney Convention Center in Santa Fe, on Thursday at Turquoise Trail Volunteer Fire Department's new fire station in San Marcos and on Oct. 7 in Española at the Misión Convento in the Plaza.



Forum overflows with water questions

▶ Water Planning Council trying to come up with regional plan

By WENDY BROWN The New Mexican

The planners of a public meeting Thursday night for the Jemez y Sangre Regional Water Plan said they wanted to hear the water concerns of people who live in the N.M. 14 area south of Santa Fe.

They weren't disappointed. The only time the questions stopped in the packed room was during presentations on the plan.

"If there were no golf courses," how would that go toward saving water?" asked Michael Kluck, who lives near N.M. 14.

Amy Lewis, a hydrologist working on the plan, told Kluck he'd made an excellent point. Las Campanas, she said, had used 10 percent of Santa Fe's water supply this summer for golf.

The Jemez y Sangre Water Planning Council has been working since 1998 to come up with a regional water plan, and the meeting was one of three planned for this week and next. The 24-member council is made up of city and county governments and other organizations in an area that includes Los Alamos County, parts of Rio Arriba County and most of Santa Fe County.

Ed Moreno, a facilitator hired to run the meeting, said the plan will go to the state Interstate Stream Commission when it is completed, but city and county governments will probably end up putting most of the plan to use.

The council also held a public meeting Wednesday in Santa Fe, and about as many people attended that meeting as the N.M. 14 meeting, held at the Turquoise

Trail Fire Station, said Moreno. About 40 people attended each meeting.

The council wanted to hold a meeting in the N.M. 14 area because the drought had been "especially acute" there this summer, Moreno

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Friday

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WATER _

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said.

Marge Johnson, who lives in the N.M. 14 area, asked whether the council had looked into the ways people had changed the ecology through their lifestyles.

Lewis told Johnson the council had looked at the ways people had changed the ecology — by paving roads, for example.

"There's been an acknowledgement of how we've messed up the system, and we have to look at ways to change it back," Lewis said.

Hugh Nazor wanted to know how the council was addressing water sustainability. "Until we know how much water we have ... we won't know how much we're falling behind on sustainability," he said.

The hydrologists assured Nazor they are addressing the issue by tracking the area's water availability as best they can. Other members of the audience touched on agriculture, construction and the vast amount of water it takes to cool a power plant.

The council will hold its third public meeting in Española from 7 p.m. to 9 p.m. Monday at El Convento in the Española Plaza. The council has held public meetings periodically throughout the planning process, Moreno said, and although the final plan will be many inches thick, the council plans on producing a summary for lay people.