> Under drought/catastrophic conditions (extreme drought, acts of sabotage, water quality restrictions, OSE/ISC restrictions), the City shall provide the County independent water system an amount of water not to exceed 50% of the County's total 1,700 afy of diversion capacity from the BDD project. After the deliveries of water from the BDD project begin and when the County's diversion of surface water from the BDD drops below 850 afy (50% of 1,700 afy), the City independent water system shall provide the County independent water system the necessary water to maintain deliveries of no less that 850 afy.

The County views this provision as "bottom half" protection, because it only affords backup water supply when deliveries from the BDD to the County drop below 850 afy. For example, if deliveries from the BDD to the County dropped to 800 afy, the City would be obligated to deliver 50 afy to the County. The remaining 850 afy would have to be obtained from some other source.

In order to achieve a 90% backup supply, the County will need approximately 680 afy of backup supply from some other source. This plan proposes that that source be groundwater. Through permitting and development of a County well field with the ability to pump up to 680 acre-feet in any given year, as necessary to bring County supplies up to approximately 1,530 afy, or to meet 90% of maximum peaking required on a daily basis if BDD deliveries drop below demand.

Use and development of new groundwater supplies in the Santa Fe Basin is a highly charged issue. In accordance with this Plan, the County undertakes such development *only* in the context of its overall conjunctive management planning, which places the greatest and primary reliance on surface water. The permitting and development of additional groundwater must be viewed in the context of an overall management strategy that, in fact, has a net beneficial hydrologic effect, by causing more water to be imported into the Santa Fe Basin and by reducing overall pumping demands on local groundwater resources in the service area of the County water utility.

It must be recognized that a successful surface water importation strategy must include a groundwater component. The County's proposed supplemental groundwater supply, as a component of an overall management strategy, provides essential reliability and dependability.

In 2005, the Board of County Commissioners directed the water resources department to investigate the best locations for County wells. The County hired the hydrology firm of Intera to develop a mathematical groundwater model of the Santa Fe Basin and spatial model to assist the County in determining the best locations for potential wells, given a number of factors including land status, aquifer characteristics, existing water rights and water resources and the proximity and availability to existing County utility infrastructure. In 2006, the County Water Resources Department (now the Water and Wastewater Operations Division of the Growth Management Department) and Intera conducted public meetings and made available the initial results of the modeling effort, showing effects of pumping up to an additional 400 afy from hypothetical County well sites. Further development of the mathematical groundwater model, in cooperation with the State Engineer Office and the City of Santa Fe, is currently in progress. This model will be utilized in the decision-making process and assure efficient use of water resources while avoiding impairment of existing uses.

B. Proposed Multi-Year Rolling Average.

Consistent with this Plan, the County will request from the State Engineer a ten-year rolling average of its groundwater use consistent with reliance on groundwater as a secondary source. Approval of a rolling average will drastically reduce the number of acre-feet per annum of water rights needed to be permitted in County wells in the Santa Fe Basin.

In most years the historic hydrograph of the Rio Grande suggests the BDD will be able to deliver the full County allocation of 1,700 afy. Likewise, in most years groundwater backup supplies would not be needed. The County believes it would be an inefficient use of public resources to purchase and transfer 680 afy of groundwater rights that would not be used in most years.

At present, the County has approximately 200 acre-feet of Santa Fe Basin water rights available for long-term groundwater back-up on an annual basis. Using a ten-year rolling average, 200 acre-feet per year could produce up to 2,000 acre-feet of back-up supply in any ten-year period. The following graph shows two scenarios utilizing 620 acre-feet for three years of backup groundwater supply over a ten-year period and the other scenario presumes no water from the BDD for an entire year. Both scenarios presume small amounts of water to be diverted for infrastructure maintenance issues.

Figure 6: 10 year Rolling Average with wells pumping 620 acre-feet for 3 years

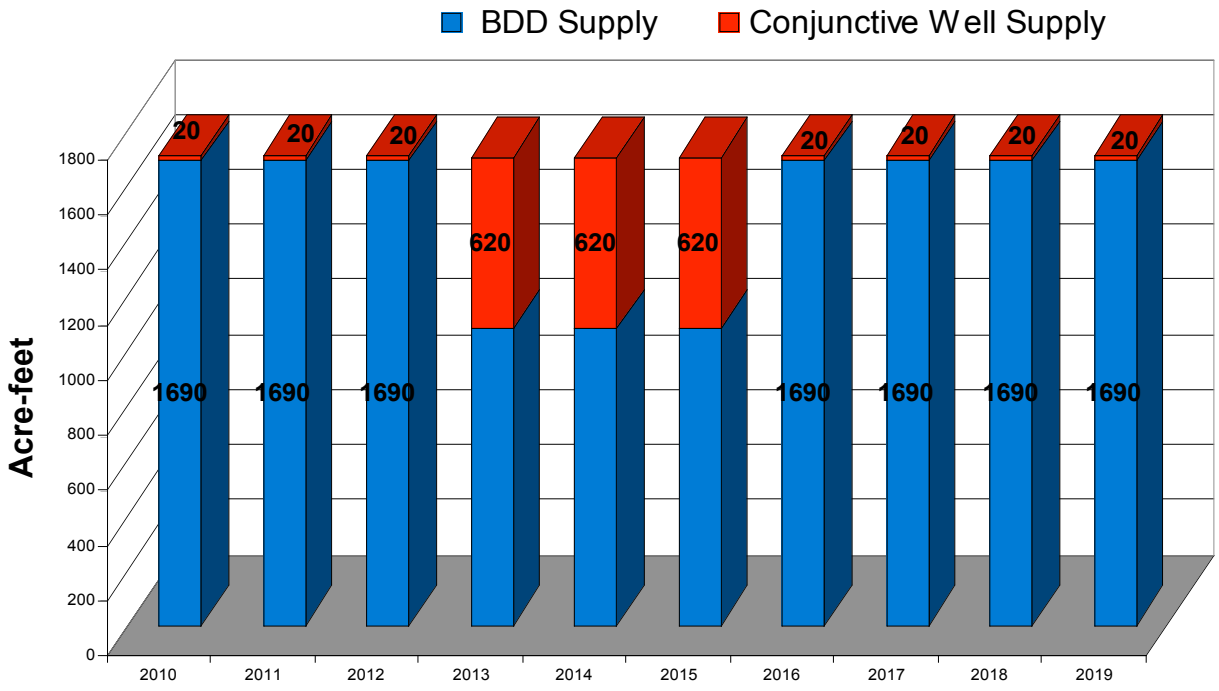
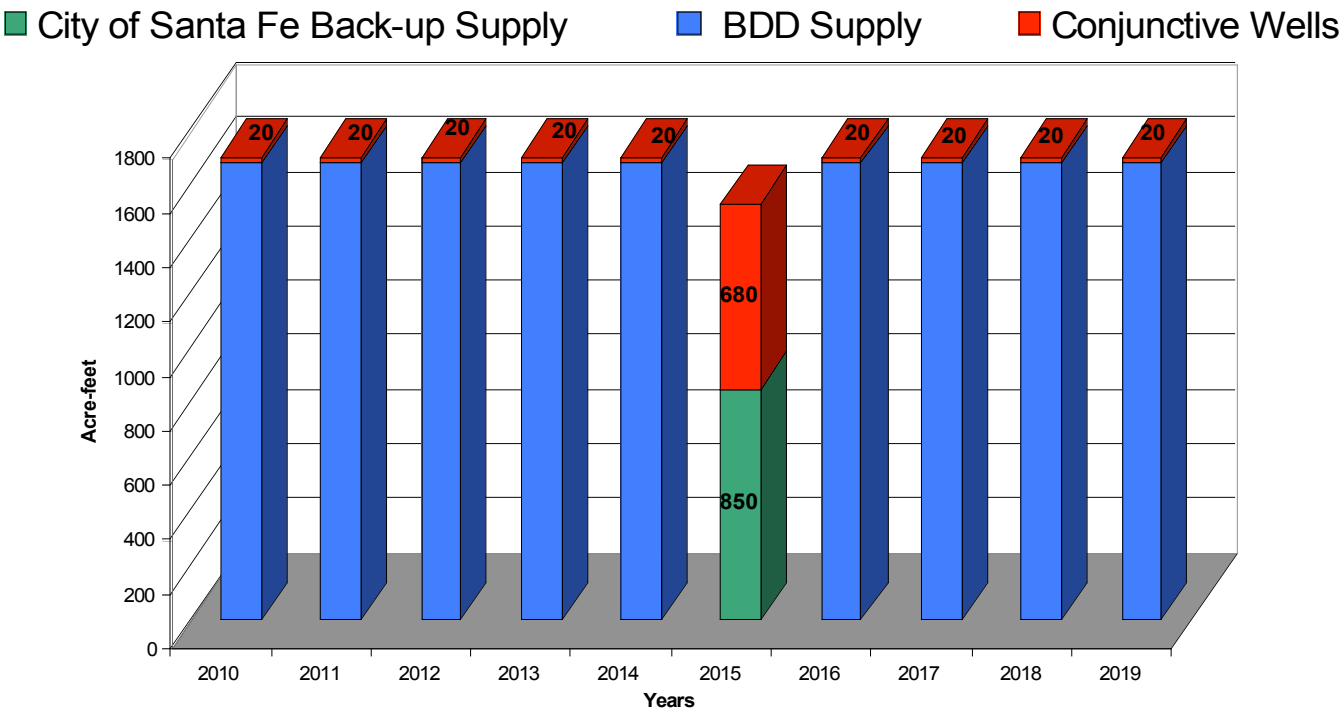


Figure 7: No BDD Water for 1 year



In order to prevent impairment, wells permitted with such a multi-year accounting would be managed so as not to interfere with neighboring wells in years in which pumping is at high levels. With respect to depletions on surface flows, resting of wells is expected to even out surface flow effects so that even though a well is pumped in small amounts some years and larger amounts in others, the net effect should moderate calculated depletions to surface flows.

To evaluate the predicted impacts of a 10 year rolling the Santa Fe County Regional Groundwater Model was utilized. The difference in pumping 200 acre-feet per year from 5 hypothetical well locations versus pumping 620 acre feet for 3 years with the wells resting, excluding small maintenance level pumping, for the remaining 7 years. (Figure 6 is a chart of this scenario) Tables 6 and 7 below are the calculated depletions to streams and springs after 40 years of pumping. No additional impacts to spring and streams are calculated as a result of utilizing the 10 year rolling average with the exception of 0.01 acre-foot estimated depletion to the Rio Tesuque.

Table 6: Calculated Stream Depletions in Acre-feet

Stream Name	40 Year Stream Flow Reduction: Pumping 200 afa from 5 wells	40 Year Stream Flow Reduction: 10 year Rolling Average	Net Difference
Nambe	0.01 afa	0.01 afa	No Change
Rio Tesuque	0.42 afa	0.43 afa	0.01 afa Increase
Pojoaque Creek	0.09 afa	0.09 afa	No Change
Rio Grande	4.10 afa	3.94 afa	0.16 afa Decrease
Santa Fe River	3.40 afa	3.40 afa	No Change
Galisteo Creek	0.25 afa	0.25 afa	No Change

Table 7: Calculated Depletions to Springs

Springs	40 Year Stream Flow Reduction: Pumping 200 afa from 5 wells	40 Year Stream Flow Reduction: 10 year Rolling Average	Net Difference
Cieneguilla	0.73 afa	0.70 afa	0.03 afa Decrease
Cerrillos	0.02 afa	0.02 afa	No Change
Mitchell	0.03 afa	0.03 afa	No Change
La Cienega	0.58 afa	0.54 afa	0.03 afa Decrease
unknown1	0.72 afa	0.65 afa	0.07 afa Decrease
unknown2	0.42 afa	0.39 afa	0.04 afa Decrease
Canoncito	-0.42 afa	-0.39 afa	0.03 afa Decrease
unknown3	0.49 afa	0.44 afa	0.03 afa Decrease
unknown4	0.07 afa	0.06 afa	0.01 afa Decrease
Coyote	0.00 afa	0.00 afa	No Change
San Marcos	0.00 afa	0.00 afa	No Change
unknown5	0.05 afa	0.05 afa	No Change
Cottonwood	0.00 afa	0.00 afa	No Change
Galisteo	0.00 afa	0.00 afa	No Change
Sunrise	0.02 afa	0.01 afa	0.01 afa Decrease
Arroyo Hondo	0.02 afa	0.02 afa	No Change
Guise	0.01 afa	0.01 afa	No Change
Bonanza	0.01 afa	0.01 afa	No Change

Such a multi-year rolling average accounting of groundwater withdrawals allows flexibility of use consistent with the use of groundwater as a secondary source of supply. In addition, it should not change and may even improve depletions effects on surface waters as compared to constant annual pumping.

The use of multi-year rolling averages is not new in New Mexico. In the Colorado Basin in New Mexico (i.e., the San Juan River and Gila River in New Mexico), a ten-year rolling average is used for purposes of interstate compact accounting. In the Roswell Artesian Basin, the State Engineer allows a five-year rolling average for groundwater use.

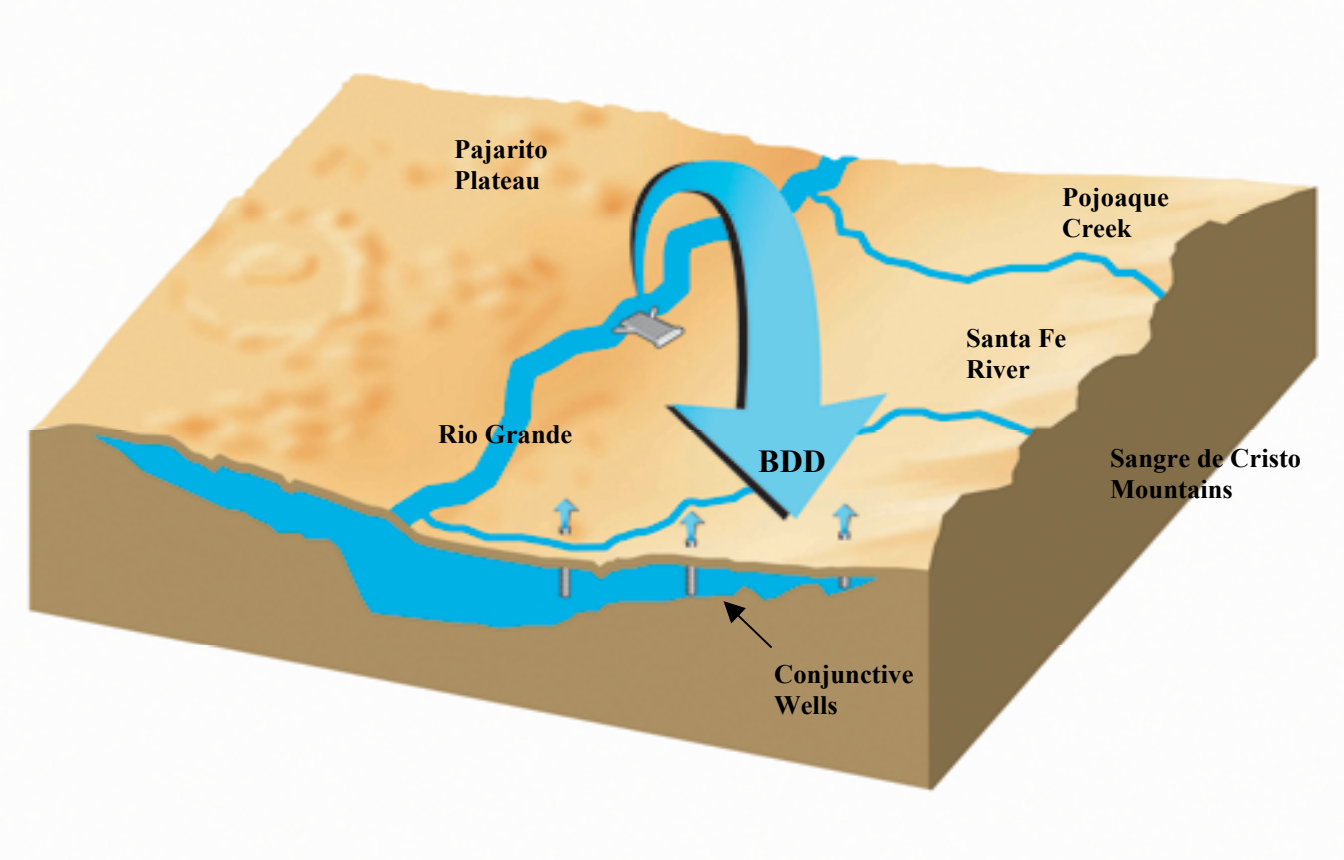
Depending on the length of multi-year accounting period allowed by the State Engineer, the 200 acre-feet of Santa Fe Basin water rights already available to the County may be enough to meet the County's need for backup groundwater supply.

C. Hydrologic Benefit to Santa Fe Basin Water Resources

Importation of Rio Grande water from the BDD, as an alternative to local groundwater withdrawals, will directly enhance the water resources of the Santa Fe Basin. The importation of Rio Grande water has a double benefit for the local aquifer as it reduces demand for groundwater pumping and at the same time creates a new source of re-useable water.

The County's portion of the BDD will deliver 1,700 afy into the Basin. It is reasonable to expect that about half of that amount will be consumed or depleted by use. The other half or approximately 850 afy will be available for reuse, aquifer recharge and return flow. The following schematic figure graphically portrays this movement of water.

Figure 8: Santa Fe Basin



D. Use of BDD Capacity to Increase Flows in the Santa Fe River.

The BDD will also present an opportunity to increase flows of the Santa Fe River. Currently, almost all of the runoff in the upper Santa Fe Watershed is impounded in the City of Santa Fe reservoirs and is used to meet customer demand. Once the BDD becomes operational, however, some of the demand currently supplied from the reservoirs could instead be supplied from the Rio Grande. Such a substitution of supply could free up water impounded in the reservoirs to be released as Santa Fe River flows.

This Plan proposes that the County and the City cooperate to use excess capacity available in the BDD to divert additional water from the Rio Grande in order to increase flows in the Santa Fe River. The County believes it will have unused capacity for a number of years beginning 2011. If the County is successful in completing its water rights acquisition and transfer process, the County will also have in place water rights to divert up to its full capacity.

Starting in 2011, with commencement of BDD operations, the County proposes to make available to the City on an annual basis excess County capacity in the BDD for the purpose of augmenting City supplies and thereby making available impounded Santa Fe River water to be released for in stream flows. Assuming the necessary water rights are in place, the County will make the rights available at no cost and will only ask the City to pay the operation and maintenance costs associated with the proposed use.

It must be recognized that this proposal only offers a short-term and declining solution. Over time, as County customer demand increases and then reaches the limit of County capacity, County capacity and water rights will no longer be available. The County is willing to cooperate with the City to find other means of continuing in stream flows consistent with long-term planning efforts to secure additional and expanded sources of supply.

V. BACKUP AND ALTERNATIVE SOURCES OF SUPPLY

A. Santa Fe Basin Groundwater Rights

In order to begin the process of establishing a groundwater backup supply, in 2006 the County filed applications to transfer seven existing Santa Fe Basin groundwater rights comprising 92 afy to a number of proposed new County wells. In addition, the County is co-applicant to the transfer for County use of the Hagerman well rights in the amount of approximately 70 afy. The County also has water rights associated with the Valle Vista wells and pending domestic well transfers. Below is a table summarizing the ground water rights available to provide back-up water supply as proposed by this plan:

Table 8 : Pending In-Basin Water Rights Transfers

SELLER'S NAME/	OSE FILE NUMBER	QUANTITY APPLIED FOR (AFY)
EL MONTE, INC. & THE MONTOYA IRREVOCABLE GREAT GRANDCHILDREN'S TRUST (Zafarano)	RG-2644, RG-2644-X & X-2	26.00
GARDNER ASSOCIATES, LLC & CENTURY BANK FSB (Stagecoach Motel)	RG-28789	5.53
KOMIS LAND COMPANY	RG-31156	6.09
KOMIS, PETER	RG-591	13.55
KOMIS, PETER (Zafarano)	RG-2644, RG-26344-X & X-2	26.00
PEARSON, ROBERT D.	RG-53-F	3.15
SAN CRISTOBAL VILLAGE, LLC (Santa Fe Country Club)	RG-20379 & RG-20379S)	12.0
PNM HORSE PARK (Hagerman Well)	RG-590	69.93
VALLE VISTA	RG-2251	36.00*
DOMESTIC WELLS		5.51
		Total: 203.76

*Note: until 2019, 60.8 afy may be diverted.

Because the above proposed transfers all involve Santa Fe Basin water rights, the effect of the proposed new use is simply a small shift of the proposed pumping center, with no change to the overall pumping right.

As discussed in Section IV, above, the pending transfers may be enough to meet the County's backup need of 680 acre-feet in shortage years if the State Engineer allows multi-year accounting. If the State Engineer does not allow multi-year accounting, the County will have to acquire additional rights that will permit a total in-basin groundwater pumping right of 680 acre-feet per year. Because sufficient additional in-basin rights may be difficult or expensive to acquire, the County may have to transfer Rio Grande main stem rights into County wells and will have to acquire tributary surface rights necessary to offset additional surface depletions caused by increased in-basin pumping.

B. 500 AFY of Wholesale Water from the City of Santa Fe.

In addition to the 1,700 afy that will be provided from the BDD as described in Section III, above, the County also has the right to receive 500 afy of wholesale water from the City of Santa Fe, pursuant to the 2005 Water Resources Agreement. Section 2 of that Agreement provides

> **Quantity. Wholesale Water Delivery to the County Independent Water System.** From the effective date of this Agreement until deliveries of water from the BDD project begin, the City Independent Water System shall provide up to 875 afy to the three points of delivery currently serving the County Independent Water System. After deliveries of water from the BDD project begin, the City Independent Water System shall provide up to 500 afy in perpetuity to the three

points of delivery of the County Independent Water System. Wholesale water delivery shall be subject to shortage sharing, Section 9 of this Agreement.

Paragraph 12 of the Water Resources Agreement provides that the County shall pay the City for the wholesale water based upon the City's wholesale water delivery rate, now currently $3.50 per 1,000 gallons.

Under this Plan, the County intends to use this wholesale water source of supply when needed and in the future when County demand exceeds 1,700 afy. This source of supply is relatively expensive and presently is not the County's first choice of supply.

C. Aquifer Storage and Recovery.

Aquifer Storage and Recovery Overview

The basic premise of aquifer storage and recovery is to store water underground when surplus supply exists; the water stored is either recovered directly at a later date or serves to recharge the aquifer. The source of water for storage is generally surface water or water reclaimed from treated effluent.[1] The primary mechanisms for conveying water into the aquifer are by injection well, Aquifer Storage and Recovery (ASR) Well or infiltration through a recharge basin. Recovery of stored water can occur directly in the case of an ASR well or indirectly down-gradient of an infiltration basin.

Injection wells inject water into an aquifer whereas an aquifer storage and recovery well permits injection and recovery from that same well. Utilization of recharge basins are favorable where the water table is shallow and where soils are permeable. These basins require acquisition of land and periodic removal of sediment to promote infiltration. Infiltrated water may be of a slightly lesser quality than that required for direct injection as the sediments in the vadose zone can serve to attenuate or lessen some constituents.

Among the advantages of underground storage are the ability to store surface water when supply is abundant (spring runoff), elimination of evaporative loss associated with surface reservoirs, and reduction in salt water intrusion and subsidence due to over-pumping.

Underground storage is a cost effective and environmentally sensitive technique for water storage, and much preferred to the large surface water projects so common in the West. Public acceptance of effluent reuse needs to be taken into consideration. Water quality requirements are dependant on regulatory requirements, quality parameters of the aquifer, and the interaction of the existing groundwater with the stored water.

In 1999, the State Legislature passed the Ground Water Storage and Recovery Act, Article 5A, Chapter 72, NMSA 1978, which creates a comprehensive permitting and administrative system for the injection and later recovery of water from defined aquifers. This practice is commonly known as aquifer storage and recovery (ASR). Under the statute, the County would be eligible

[1] Effluent is generally treated to drinking water quality prior to injection into the aquifer pursuant to standards established by the Water Quality Control Commission and administered by the New Mexico Environment Department.

to apply for a State Engineer permit to engage in ASR provided the local aquifer characteristics, including required confinement of injected resources, could be met.

The County has conducted a preliminary investigation of this alternative, and in particular has made an initial assessment of the feasibility of implementing ASR as currently practiced in the State of Arizona. It is expected that ASR and other techniques discussed in this section will play an ever-increasing role in the Santa Fe Basin.

D. Return Flow and Reuse.

Both the native and San Juan-Chama water rights that will constitute the supplies available from the BDD are consumptive use water rights. That means that the full 1,700 afy may be consumptively used. It is likely that only about half of the amount diverted is consumed by the initial use of County customers. In order reach full consumptive use of the right, the County would need to establish a wastewater collection and treatment system to allow either reuse or return flow in order to obtain return flow credits. The County is in the process of developing a wastewater collection system, as described in the County's Water and Wastewater Draft Utility Plan dated January 2008.

E. Conservation

Conservation is an important element of the County's water strategy. The County's Land Development Code strictly has for many years restricted water use in new developments, and more recently was amended to require very strict water conservation requirements, including water catchment and storage, and use of native plant species to reduce overall outdoor usage. These aggressive conservation measures have paid off in reduced per capita consumption. Santa Fe County utility customers are among the lowest per capita water users among water users in the Southwest United States. The following is a summary of conservation ordinances adopted by Santa Fe County for new development:

Water Conservation Ordinance: This ordinance adopted in 2002 and amended in 2006 addresses water conservation for all residential and commercial uses of water within Santa Fe County. It outlines methods by which County residents and businesses can reduce their water use both indoors and outdoors and describes the domestic well metering program.

SFC Utility Metering, Billing and Rate Structure: Customer water use is metered and billed on a monthly basis. The bills provide individual customers information about their usage patterns and the cost associated with such usage. In addition, the monthly bills provide a convenient mechanism to distribute conservation-related information. The SFC Water Utility's rates are designed to provide a financial incentive to residential and non-residential customers to conserve water. The SFC Water Utility uses an inclining rate structure designed to encourage conservation. Additionally the utility has a three stage emergency water policy which allows mandatory water restrictions and penalties for violations.

Water Allocation Policy: By a resolution approved March 28, 2006 a limit was placed upon the amount of water a residential property will receive from the SCF Utility.

Rainwater Catchment Systems: Ordinance 2003-6 requires water harvesting plan to accompany all applications for development permits in Santa Fe County. This is not only a conservation measure but also help mitigate urban runoff.

Hot Water Recirculation Devices: Ordinance 2006-8 requires installation of a hot water recirculation system in homes built after the effective date.

Swimming Pool Restrictions: Ordinance 2007-1 restricts the size of a swimming pool to no more than 30,000 gallons and requires a cover to minimize evaporative loss.

Extraterritorial Zoning Ordinance: This ordinance was amended in 1999 to adopt ground water management methods. Santa Fe County prohibits the drilling of new domestic wells on lots located within 200 feet of an existing regional water system distribution line.

Santa Fe County Land Use Code: Santa Fe County requires water restrictive covenants that run with the land for all new subdivisions or land divisions seeking a density adjustment based on water conservation.

The County is in the process of updating further its water conservation requirements as a part of its amendment to the County's 40 Year Water Plan. As discussed in Section C-1 during time of shortage of supply from the BDD, this Plan assumes that 10% of the shortage will come from conservation and use restrictions.

An analysis of gallons per capita per water per day (gpcpd) usage from homes served by the Santa Fe County Utility was performed (Table 9). The average gallons per capita per day for the county has decreased by 20% due to an inclining rate structure imposed in 2006 and above average precipitation.

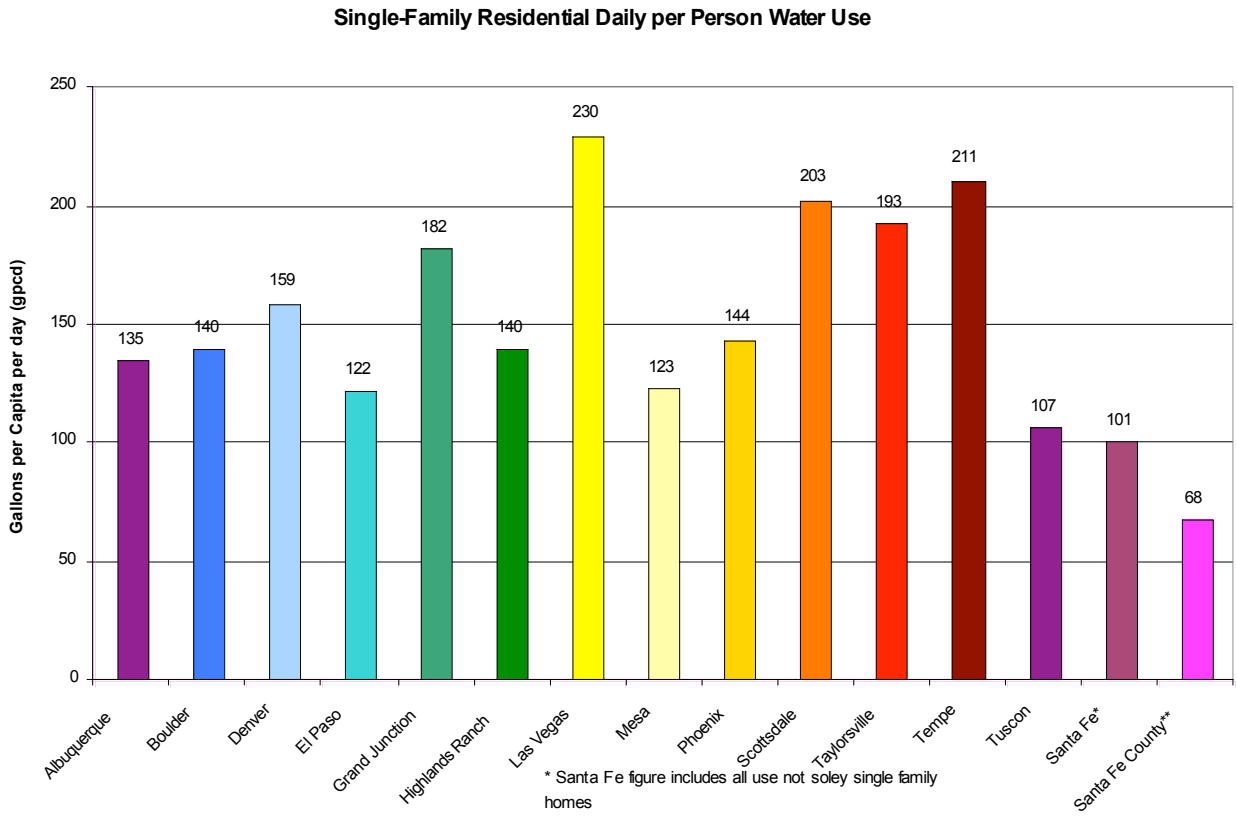
Table 9: Utility Residential Water Use

Santa Fe County Water Utility: Gallons Per Capita per Day (GPCPD)[1]													
Year	**Jan**	**Feb**	**Mar**	**Apr**	**May**	**Jun**	**Jul**	**Aug**	**Sep**	**Oct**	**Nov**	**Dec**	**Average**
2004	52	64	59	76	107	107	105	110	103	60	57	52	79
2005	49	61	51	62	69	125	125	115	132	70	51	50	80
2006	55	57	55	60	68	79	75	63	59	60	51	51	61
2007	51	61	55	59	65	70	90	82	85	69	64	52	67

[1] $\text{Per Capita Water Usage} = \frac{\text{Quantity of water sold to homes using} > 500 \text{ gallons per month}}{\text{Number of homes using} > 500 \text{ gallons per month}} x \frac{1}{\text{US Census per Household Size}}$

In comparison to other southwestern cities Santa Fe County has the lowest residential per capita water use.[1]

Figure 9: Western Residential Water Use



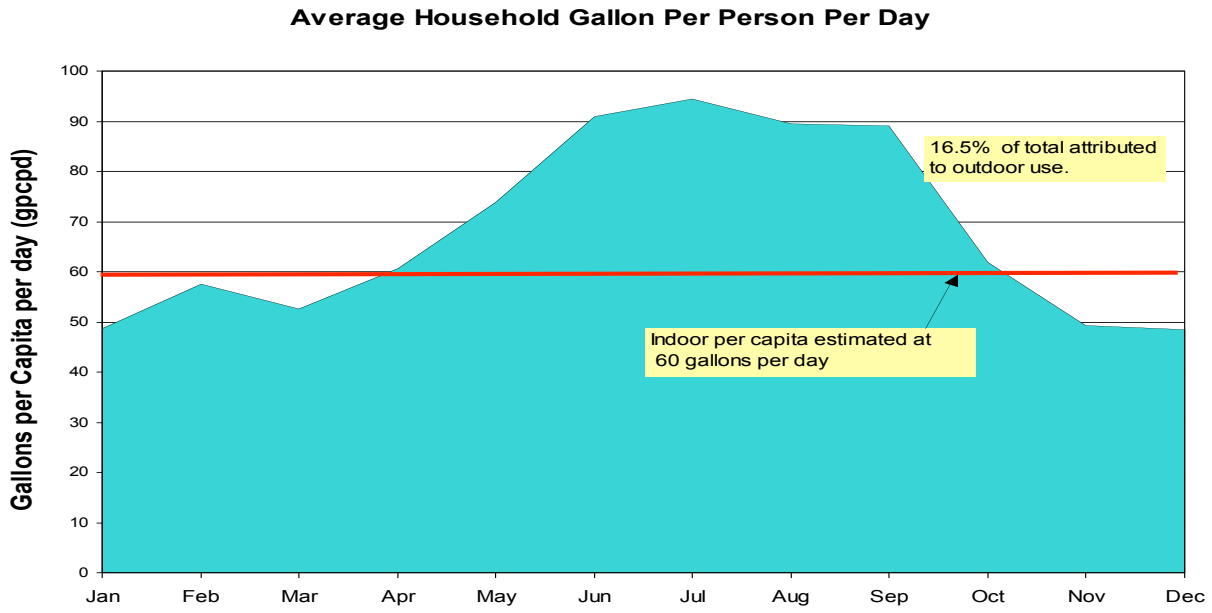
A primary non-essential water use is outdoor irrigation. A conservative estimate of indoor water usage is 60 gallons per capita per day (gpcpd) is arrived at by subtracting this figure from the total water usage during the irrigation season (April – September). The actual indoor gpcpd for the utility is around 52 gpcpd using 60 provides a small buffer for unforeseen events.

By such a calculation, an estimate of outdoor water usage can be calculated. Utilizing water use data from 2004 to 2007, and applying these principles, it is estimated that 16.5% of the total residential use of customers of the Santa Fe County Water Utility can be attributed to outdoor

[1] Western Resource Advocates "Smart Water A comparative Study of Urban Water Use Across the Southwest" (2003)

irrigation. Figure 3 below illustrates this estimate. Though rigorous conservation measures the utility presumes the outdoor water use can be reduced by 50 to 60 percent.

Figure 10: Average Domestic Water Use Gallons per Person per Day



F. Other Sources of Supply.

In order to meet customer demand over time, the County will continue to identify and acquire additional sources of supply consistent with its 40-year water planning horizon pursuant to NMSA 1978, § 72-1-9. It is the County's policy not to acquire water rights from active acequias or community ditches, unless required by a State Engineer permit condition, for example, to offset depletion effects on surface flows caused by groundwater pumping. The County may consider acquisition of acequia water rights where approved by Board of County Commissioners and the acequia based on a finding that the transfer will not harm the acequia.

VI. OFFSETS ON THE RIO POJOAQUE STREAM SYSTEM

A. Overview of Strategy to Offset Effects on Pojoaque System

This Conjunctive Use Management Plan sets forth the County's planning principles and objectives for the conjunctive use of groundwater pumped by the County from the Santa Fe Basin. Although the Plan is limited to County wells located in the Santa Fe Basin, effects of

pumping in the Santa Fe Basin may extend into the adjoining Nambe-Pojoaque-Tesuque (NPT) Basin and may cause depletions of stream flows there. Therefore, the County is committed to the offset strategy outlined in this Section VI to assure that surface uses are not impaired by depletion effects, if any, on the NPT Basin.

Because the thrust of this Plan is to rely on Rio Grande surface water as the primary source of supply and to use groundwater as a backup or supplemental supply, the County anticipates no or negligible depletions on the NPT surface flows. Preliminary modeling of an annual pumping average of 200 acre-feet, identified in Section V (A), reveals that effects of County pumping as proposed in this document on the Rio Tesuque, the closest NPT stream, would be small. Through careful well siting and management, the County believes it may be possible to further decrease, and perhaps avoid, any effects on this stream system.

In the event that effects cannot be avoided, the County's offset strategy relies on: (1) retiring for offset purposes existing NPT surface water rights, and (2) providing wet water offsets as required by the Aamodt Settlement Agreement. Both components are discussed below.

B. Use of NPT Surface Rights for Offsets

In general, the State Engineer will condition groundwater permits (excluding domestic well permits) to require offsets of any new or additional surface water effects in order to avoid impairment of existing surface uses. For example, a permit to appropriate groundwater under NMSA 1978, § 72-12-3 would require as a condition of approval offsets of effects on surface flows. Another and more relevant example is the transfer or change of use of an existing groundwater right under Section 72-12-7. In taking action on a ground water transfer, the State Engineer may be expected to require offsets of any increase in surface water depletions caused by the change in use.

Because the 200 afy of water rights described in Section V(A) are existing "pre-basin" rights that do not have an offset requirement, a change of use and change of points of diversion to the County water utility will likely have an immeasurable change in effect on surface flows either in the Santa Fe or NPT Basins.

To the extent that the State Engineer requires offsets for County effects on NPT surface flows, the County intends first to transfer and retire 4.49 afy of consumptive use rights adjudicated under Aamodt Subfile No. 20-10 and acquired by the County in 2005, as necessary to comply with State Engineer permit conditions. *See* Appendix A. Table 8.

C. County Obligations under the Aamodt Settlement

As also discussed in Sections VII(B) and (F), Santa Fe County is a party to the adjudication of Nambe-Pojoaque-Tesuque Basin, *New Mexico ex rel. State Engineer vs. Aamodt*, No. 66-CV-06639 MV/LCS (D. N.M.), known as the *Aamodt* case. On May 3, 2006, the County along with

the Pueblos of Nambe, Pojoaque, San Ildefonso and Tesuque, the City of Santa Fe and the State of New Mexico signed the Aamodt Settlement Agreement, which will resolve Pueblo claims to basin water and protect existing uses. The agreement will not become effective until a number of conditions are met, including approval of the settlement by Congress.

Under the Settlement Agreement, both the County and City of Santa Fe agree to limit the use of water rights retirement to offset effects, as indicated in 3.5:

> **3.5 Municipal and County Offset Rights.**
> Wet water will be provided to offset surface depletion effects on the Rio Tesuque and Rio Nambé-Pojoaque of City of Santa Fe and County of Santa Fe out of Pojoaque Basin groundwater pumping. The location(s), timing, and amounts of these deliveries shall be addressed in the Cost Sharing and System Integration Agreement and shall be determined by the State, City, County, and the Pueblos; provided, however, that offset water on the Rio Tesuque must be provided to a location on Tesuque Pueblo at a time acceptable to Tesuque Pueblo. Nothing in this wet water offset mechanism shall preclude the use of existing City and County offset rights. One mechanism for providing such offsets is described in Section 9.6.5.

Section 9.6.5 of the Aamodt Settlement Agreement provides that the County may receive offset credits of up to 50 afy for delivering water to Tesuque Pueblo through the Regional Water System contemplated by the settlement. The provision further allows: "If the County or the City desire to provide additional offsets, either may cause additional water to be delivered from that portion of the Regional Water System serving Tesuque Pueblo at the time(s) and location(s) to be determined by Tesuque Pueblo or as provided in Section 3.5."

Consequently, in order to comply with offset requirements for County effects on NPT surface flows, the County will make available wet water offsets to the extent retirement of water rights up to the maximum described in Section VI (B) is insufficient.

VII. REGIONAL COORDINATION OF CONJUNCTIVE USE

The County recognizes that its water supply, and in particular its proposed groundwater supplies, emanate from a shared regional aquifer that is closely linked to surface flows within the Santa Fe Basin, including La Cienega Creek, and possibly the Nambe-Pojoaque-Tesuque stream system. The County has entered into or negotiated agreements that call for cooperative and regional planning consistent with this conjunctive use Plan. As part of finalizing this Plan, the County will conduct public meetings and will consult with the City of Santa Fe, the Pueblos of Nambe, Pojoaque, San Ildefonso and Tesuque.

A. City of Santa Fe

The County entered into an agreement with the City providing for coordinated conjunctive use of water in the Santa Fe Basin. See Water Resources Agreement between the City of Santa Fe and the County of Santa Fe, January 11, 2005. Paragraph 8 of the Agreement provides:

> **Conjunctive Use and Sustainability.** The City and County agree to implement conjunctive use management by relying on surface water when it is available and using groundwater only as necessary… the City and County will develop a "Comprehensive Joint Conjunctive Use and Sustainability Water Resources Strategy" that places the use of surface water as a higher priority than the use of groundwater and which manages the regional aquifer on a sustainable basis…. The strategy shall incorporate the principle that the County and the City will consult prior to the drilling of new wells in the area around the City and County independent water systems as they exist at the time of signing of this Agreement, so as to encourage cooperation, avoid conflict and avoid the impairment of City and County water rights.

The instant County conjunctive use Plan is formulated, in part, for the purpose of carrying out the County's portion of the above-stated agreement between the City and the County.

B. Pueblos of Nambe, Pojoaque, San Ildefonso and Tesuque

As part of the settlement of the four Pueblos' claims in the *Aamodt* case within the Nambe-Pojoaque-Tesuque Basin, the County has also been party to negotiated language providing for conjunctive use of surface waters with groundwater in the Santa Fe Basin. See Cost-Sharing and System Integration Agreement, *New Mexico ex rel. State Engineer vs. Aamodt*, No. 66-CV-06639 MV/LCS (D. N.M.). Paragraph 3.6.2 of the Agreement provides:

> In order to reduce and mitigate the effects of groundwater pumping by Santa Fe County on the ground and surface water supplies of the Pojoaque Basin, the County shall develop and implement, in consultation with the Pueblos, conjunctive management strategy with regard to its ground and surface water resources which (1) utilizes surface water supplies to the maximum extent feasible and in a manner which minimizes effects on the ground and surface water supplies of the Pojoaque Basin; and (2) otherwise utilizes both surface and ground water in a manner which minimizes effects on the ground and surface water supplies of the Pojoaque Basin.

It is the County's intent that this Plan fulfill its consultation obligation with the four Pueblos as provided above.

C. La Cienega

The County has also agreed to consult with La Acequia de la Cienega regarding the contents of this plan. In particular in correspondence from the County Manager to the Acequia Commission provided:

> The County welcomes any comments and input from you and your organization. County staff is available to meet with you and share information regarding our

> proposed plans. Santa Fe County plans to propose before the end of the 2007 calendar year a Conjunctive Management Plan which will describe the County's combined use of City wholesale water, future Buckman Direct Diversion surface water and Santa Fe basin drought groundwater supplies. County staff will commit to providing a copy of the Conjunctive Use Plan to you one (1) month before the matter is presented for action to the Board of County Commissioners so that you may provide advance comments and pose any questions.

See letter from Roman Abeyta to the Commissioners of La Acequia de la Cienega and Thomas A. Simons, IV, dated October 18, 2007

VII. CONCLUSION.

This Plan, along with the County's 40-Water Plan (as amended), is intended to define County Conjunctive Use Plan and Management in order to make the most efficient use of available water supplies by, in particular, relying primarily on renewable water supplies and preserving groundwater supplies for times of greatest need. This Plan will benefit County water customers by providing a more diversified and reliable supply. The approach will also benefit the Santa Fe Basin by reducing the demand on local water resources and, indeed, bringing in a substantial amount of imported water to the basin.

APPENDIX A: Santa Fe County Water Rights Transfers

Table 10: Completed and Pending Transfers to the Buckman Well Field

WATER RIGHT/ OSE FILE NUMBER	QUANTITY APPLIED FOR IN TRANSFER APPLICATION	QUANTITY APPROVED FOR TRANSFER BY OSE	COMMENTS
BALDONADO (McCarthy) SD-05023 into RG-20516 et al	32.34 afa CU	32.13 afa CU* (45.90 afa DIV) on 12/13/05 (* Denied for 0.30 due to home site)	Subject to Lease Back until 12/31/08
BARRERAS (McCarthy) SD-06348 into RG-20516 et al	10.92 afa CU	10.50 afa CU* approved on 12/1/05 (*Denied for 0.42 afa structures on site)	Subject to Lease Back until 12/31/08
CHAVEZ (McCarthy) SD-06454 into RG-20516 et al	6.32 afa CU	6.13 afa CU* approved on 12/21/05 (*Denied for 0.168 afa CU)	Subject to Lease Back until 12/21/08
LEMITAR FARM SD-02810 into RG-25016 et al	71.19 afa CU	11.07 afa CU approved in 1/22/2003	No lease back
KELLY-HERKENHOFF SD-06497 into RG-20516 et al	246.79 afa CU	246.79 afa CU approved 8/15/2005	Subject to Lease Back
TWINING & WHITEHOUSE (McCarthy) SD-03179 and SD-03179-AA Into RG-25016, et al (Twining) & SD-03179-A into RG-20516 et al (Whitehouse)	84.84 afa CU	84.84 afa CU (42.42 afa approved from each tract) approved on 11/05/05	No lease back
VIGILS and VIGIL TRUST SD-05214 and SD-05215 into RG-20516 et al	134.141 afa CU	25.82 afa CU approved on 12/12/05; remainder denied	No lease back
GREER SD-03942-A into RG-20516 et al	50.085 afa CU	50.085 afa CU approved on 01/23/07	No lease back
JENKINS / BOYLAN/SIEBERT SD-06764 into RG-20516 et al	9.681 afa CU	9.387 afa CU approved on 03/12/07	Denied for 0.294 afa CU due to lack of evidence that water has been put to beneficial
Rancho Viejo RG-1811-A-C-A-B into RG-20516 et al	5.0 afa CU	5.0 afa CU	Approved 10-11-07 via settlement agreement
Rancho Viejo RG-1811-A-C-C into RG-20516 et al	5.0 afa CU	5.0 afa CU	Approved 10-11-07 via settlement agreement
Rancho Viejo RG-1811-A-C-A into RG-20516	50.0 afa CU	50.0 afa CU	Approved 10-11-07 via settlement agreement
TOTAL		**536.752 afa cu**	

Table 11: Completed Transfers to the Buckman Direct Diversion

WATER RIGHT/ OSE FILE NUMBER	QUANTITY APPLIED FOR IN TRANSFER APPLICATION	QUANTITY APPROVED BY OSE	COMMENTS
COUNTY SAN JUAN / CHAMA SP-4844	375 afa cu	367.5 afa cu	Requires gpcpd reporting and meter plan

Table 12: Transfers in Process to Buckman Direct Diversion

SELLER'S NAME/ OSE FILE NUMBER	QUANTITY APPLIED FOR IN TRANSFER APPLICATION	QUANTITY EXPECTED TO BE APPROVED FOR TRANSFER BY OSE	COMMENTS
BACA-GONZALES	34.80 afa CU	34.80 afa CU	Delivered to Santa Fe County for signature on 5/9/07.
BORREGO (NM Building Products, Inc.) SD-07101 into SP-04842	17.68 afa CU	17.68 afa CU	Publication completed.
JARAMILLO SD-07316 into SP-04842	4.935 afa CU	4.935 afa CU	Publication completed.
OSO "8" INVESTMENTS LLC SD-07137 into SP-04842	93.723 afa CU	93.723 afa CU	Publication completed.
PEÑA BLANCA PARTNERSHIP SD-06920 into SP-04842	15.6137 afa CU	15.6137 afa CU	Publication completed. Protested by La Cienega.
PEÑA BLANCA PARTNERSHIP SD-02205 into SP-04842	35.253 afa CU	35.253 afa CU	Publication completed. Protested by La Cienega.
RANCHO VIEJO (La Estrada) SD-04729 into SP-04842	292.005 afa CU	292.005 afa CU	Delivered to Santa Fe County for signature on 12/11/06.
SANCHEZ SD-07351 into SP-04842	9.7335 afa CU	9.7335 afa CU	Publication completed.
SUERTE DEL SUR LLC SD-06468 into SP-04842	222.768 afa CU	222.768 afa CU	Publication completed.
Total		**726.5112 afa CU**	

Table 13: In-Basin Transfers to County Well Field

SELLER'S NAME/ OSE FILE NUMBER	QUANTITY APPLIED FOR IN TRANSFER APPLICATION	QUANTITY EXPECTED TO BE APPROVED FOR TRANSFER BY OSE	COMMENTS
EL MONTE, INC. & THE MONTOYA IRREVOCABLE GREAT GRANDCHILDREN'S TRUST (Saharan) (RG-2644, RG-2644-X & X-2)	26 afa cu	26 afa cu	Publication completed.
GARDNER ASSOCIATES, LLC & CENTURY BANK FSB (Stagecoach Motel) (RG-28789)	5.53 afa cu	5.53 afa cu	Publication completed.
KOMIS LAND COMPANY (RG-31156)	6.09 afa cu	6.09 afa cu	Publication completed.
San Cristobal Village (RG-20379 et al)	12.0 afa cu	12.0 afa cu	
KOMIS, PETER (RG-591)	13.55 afa cu	13.55 afa cu	Publication completed.
KOMIS, PETER (Saharan) (RG-2644, RG-26344-X & X-2)	26 afa cu	26 afa cu	Publication completed.
PEARSON, ROBERT D. (RG-53-F)	3.15 afa cu	3.15 afa cu	Publication completed.
Total		**92.32 afa cu**	

Table 14: Other In-Basin Transfers

WATER RIGHT/ OSE FILE NUMBER	QUANTITY APPLIED FOR IN TRANSFER APPLICATION	QUANTITY EXPECTED TO BE APPROVED FOR TRANSFER BY OSE	COMMENTS
RG-590-HAGARMAN	190.75 afa cu	116.55 afa cu	Hearing Stayed pending adjudication of right
RG-75904 et al into RG-22251-RG-22251-S-8	5.608 afa cu	5.608 afa cu	Hearing Stayed
Total		**122.158 afa cu**	

Table 15: Top of the World Transfers to Aamodt

WATER RIGHT/ OSE FILE NUMBER	QUANTITY APPLIED FOR IN TRANSFER APPLICATION	QUANTITY EXPECTED TO BE APPROVED FOR TRANSFER BY OSE	COMMENTS
TOP OF THE WORLD I RG-1441 thru RG-1441-S-11 into RG-68622 RG-6862	588 afa cu	588 afa cu	For Aamodt Settlement

Table 16: Rights not yet transferred

WATER RIGHT/ OSE FILE NUMBER	QUANTITY APPLIED FOR IN TRANSFER APPLICATION	QUANTITY EXPECTED TO BE APPROVED FOR TRANSFER BY OSE	COMMENTS
Top of the World	1,164 afa cu	1,164 afa cu	For Aamodt Settlement
GREER II	67 afy cu		
TURIN Aamodt Subfile No. 20-10	4.490 afy cu	4.490 afa cu	Historic Supply at
LAS LAGUNITAS	34.427 afa cu	22.445 afa cu	Water rights associated with ponds may not be transferable.
Total		**1190.935 afa cu**	