In the Matter of the Application of Suburban Water, Inc., d/b/a Suburban Water Company, for an Order Increasing Its Rates in Leavenworth County, Kansas	))))	Docket No. 11-SUBW-448-RTS

REDACTED DIRECT TESTIMONY

PREPARED BY

JUSTIN GRADY

UTILITIES DIVISION

KANSAS CORPORATION COMMISSION

** [redacted] **

** Denotes Confidential Information**

Q. Please state your name and business address.

A. My name is Justin T. Grady and my business address is 1500 Southwest Arrowhead Road, Topeka, Kansas, 66604.

Q. By whom, and in what position, are you employed?

A. I am employed by the Kansas Corporation Commission (KCC or Commission) as a Managing Auditor.

Q. What is your educational background and professional experience?

A. In December of 2009, I earned a Master of Business Administration degree, with concentrations in Corporate Finance and Investment Management, from the University of Kansas. I also hold a Bachelor of Business Administration degree with majors in Finance and Economics from Washburn University. My employment with the KCC began in 2004 as a Regulatory Auditor and in 2007 I was promoted to Senior Auditor. In August of 2010 I was promoted to my current position. While employed with the Commission I have participated in various investigations and rate case proceedings including ten rate case audits of investor-owned utilities, various surcharge and tariff filings, the acquisition of Aquila's Kansas Gas properties by Black Hills Energy, and the recent energy efficiency filings of Kansas Gas Service, Empire District Electric Company, Black Hills Energy and Kansas City Power and Light Company.

A. Please discuss your previous testimony filing experience.

A. I have filed testimony before this Commission on multiple occasions regarding various regulatory accounting and ratemaking issues. My previous testimony experience includes filings in the following Dockets: 04-AQLE-1065-RTS, 05-

AQLG-367-RTS, 05-WSEE-981-RTS, 06-KCPE-828-RTS, 06-KGSG-1209-RTS, 07-AQLG-431-RTS, 07-KCPE-905-RTS, 07-BHGC-1063-ACQ, 08-WSEE-1041-RTS, 09-KCPE-246-RTS, 10-KGSG-421-TAR, 10-EPDE-497-TAR, 10-KCPE-415-RTS, 10-BHCG-639-TAR, and 10-KCPE-795-TAR.

Q. What were your responsibilities during Staff's review of Suburban Water Company's (Suburban) abbreviated rate case filing?

A. My responsibilities were to oversee and assist in the preparation of the revenue requirement analysis, and to conduct Staff's analysis of Suburban's water supply practices in response to the Commission's questions and concerns as expressed in the *Order on Application* (Order) dated November 3, 2010 in Docket No. 10-SUBW-602-TAR (the 602 Docket). My duties were carried out under the direction of Jeff McClanahan, Chief of Accounting and Financial Analysis.

Q. What is the purpose of your testimony in this case?

A. In this testimony I will provide the Commission some of the background as to why Suburban is filing an abbreviated rate proceeding, an overview of Staff's efforts in this proceeding, a summary of each Staff witness's role and responsibilities during the course of the investigation, and Staff's findings with regard to Suburban's water supply practices.

Q. Why did Suburban file this abbreviated rate case?

A. This abbreviated case, and the two rate cases that are expected to follow it, are the outcome of the Commission's Order denying Suburban's request to implement a Purchased Water Adjustment, a tariff mechanism which would have allowed Suburban to recover the yearly increase or decrease in the cost of water it

purchased to serve its customers. In the Order the Commission expressed concerns about Suburban's water supply practices, and questioned the reasonableness of certain elements of the water purchase contract between SWC and the City of Kansas City, Kansas Board of Public Utilities (BPU). The Commission also directed its Staff to work with Suburban to develop an abbreviated rate case process that would provide the Commission the information it needs to establish just and reasonable rates to recover the increased cost of purchased water while lessening the financial burden of rate cases expense for Suburban and its customers. Staff and Suburban collaborated, and in an open meeting on December 3, 2010, presented to the Commission a rate case plan that contemplated three rate cases, in late 2010, 2011 and 2012. The first and last cases are anticipated to be limited to the increased cost of purchased water, and the cost of filing the rate case. The second rate case is not limited and is anticipated to include Suburban's full cost profile. A copy of the letter outlining the details of the plan is attached as Exhibit JTG-1.

Q. What concerns did the Commission express regarding Suburban's water supply practices, and the BPU water purchase contract?

A. The Commission, in its Order expressed the following concerns:

- Suburban was becoming increasingly dependent on BPU for its water supply, with the percentage of total water being purchased from BPU increasing from 12% in 2002 to 56% in 2009. (¶ 12)
- Suburban's company owned wells were producing less and one well field had been completely shut down. The Commission expressed concern that the

record did not adequately explain the reason for this decline in production (a lowering of the water table, mechanical degradation, etc.). (¶ 13)

- The record was unclear about alternative water sources available to Suburban. The Commission questioned Suburban's other wholesale water options, efforts to gain access to additional groundwater, and whether Suburban had the capabilities to intake and treat raw (surface) water. (¶ 14)
- Suburban Water is not actively pursuing other wholesale water options to provide an alternative to BPU. The Commission mentioned Water One specifically as a possible wholesale option, and questioned whether Suburban had the ability to tap into Water One's infrastructure for an interconnect. The Commission also referred to the City of Leavenworth as a possible wholesale supply option. (¶¶ 15, 37)
- The record was unclear as to whether the water being purchased by Suburban from BPU was indeed "surplus water" not needed now or in the future for the City of Kansas City and its inhabitants. (¶ 19)
- There was uncertainty regarding which cost component of the BPU water purchase contract was subject to change by BPU, and whether Suburban planned on challenging or renegotiating any terms of the contract. (¶ 20)
- BPU had yet to adopt a rate schedule, and therefore the Commission couldn't be assured of the increases that would accrue to Suburban's customers. (¶¶ 22, 23).
- The reasonableness and legality of BPU providing free services to the Unified Government, Public Fire Hydrants, and Interdepartmental sales. (¶ 24)

- The reasonableness and legality of BPU charging Suburban a PILOT fee on its purchased water. (¶¶ 25, 30, 32, 33)
- BPU is not bound to make capital improvements, even if the recommended increases were approved (¶ 26)
- The record did not support that water purchased from BPU was Suburban's least cost supply option. (¶ 26)
- The extent of Suburban's involvement in the BPU rate case process. (¶ 36).

Q. Please provide an overview of each Staff witness's role and responsibilities in this docket.

A. Two other Staff witnesses will file testimony in this docket.

- Bill Baldry, Senior Auditor, will sponsor the calculation of Staff's revenue requirement, and discuss the different variables responsible for the difference between Staff's revenue requirement and the revenue requirement filed by Suburban in this case. Mr. Baldry also discusses the economics of Suburban's other known wholesale water supply options (The City of Leavenworth and Water One) and why it is currently not economical for Suburban to pursue a purchased water contract with either of those entities. Lastly, Mr. Baldry presents to the Commission a comparison of the retail water rates of each of the water utilities surrounding Suburban's service territory.
- Sonya Cushinberry, Managing Analyst, will discuss Staff's findings with regard to the legality of, basis for, and reasonableness of the PILOT fee assessed by the Unified Government of Wyandotte County to BPU. She

also discusses Staff's findings with regard to whether Suburban is paying for free water services to City and Interdepartmental users. Ms. Cushinberry also discusses Suburban's involvement with BPU's rate setting process, and lastly, addresses the Commission's concerns regarding whether the water Suburban purchases from BPU is surplus water not needed by the City's inhabitants now or in the future.

- My testimony focuses on Suburban's past and present water supply efforts, including information about Suburban's company owned wells, Suburban's previous applications with the Division of Water Resources, a division of the Department of Agriculture, to gain additional groundwater rights, and the characteristics and limitations of the aquifers that provide groundwater in Suburban's area.

Q. Please describe the scope of Staff's investigation into Suburban's water supply efforts and practices, and any Staff recommendations for this abbreviated proceeding.

A. Staff attempted in an abbreviated time frame to learn as much as possible about Suburban's wells and well fields—including Suburban's efforts to rehabilitate the wells to increase production, the aquifers in the area that are available to Suburban, including any limitations or special characteristics of those aquifers, and Suburban's past efforts to secure additional groundwater, including any controlling or limiting factors that produced success or failure in those efforts. Staff pursued this objective while being mindful of the Commission's directive expressed in the 602 Docket to lessen the burden of rate case expense for this

small utility and its customers. Staff relied on data requests to the company[1], publicly available information through entities such as the Kansas Rural Water Association, the Kansas Geologic Survey, the Kansas Water Office (KWO), and the Division of Water Resources (DWR). Also, Staff conducted informational interviews with staff of the DWR and the KWO. Especially helpful were the following interviews, Katherine Tietsort, (Water Commissioner, Topeka Field Office, DWR,) Lane Letourneau, (Water Appropriation Program Manager, DWR,) Doug Schemm, (Environmental Scientist, DWR), and Nathan Westrup, (Public Water Supply Planning, Kansas Water Office).

These individuals were all very familiar with Suburban's past water supply practices and were instrumental in Staff's ability to compile the amount of information we did in an abbreviated time frame and with limited resources. Staff appreciates very much their assistance and participation. To the extent any I have referenced any interview or conversation in this testimony with the aforementioned individuals, it is offered as background or as a generally available knowledge about the subject matter at hand. It should not be relied on as evidence to support any specific conclusion or decision.

As a result of this analysis, Staff has learned that some of the aquifers in Suburban's territory have a history declining water tables, limited production, and special characteristics that require enhanced levels of information (hydrological modeling and analysis) before water rights will be granted. These factors have limited Suburban's production from its wells and have resulted in failure to secure additional ground water resources. If ground water were to be available, it would

[1] See Attached Data Request Report for a listing of all Staff Data Requests.

likely be more economical than purchasing water from BPU. That being said, BPU is currently Suburban's least cost wholesale water option, among the available wholesale suppliers that have been identified. Additionally, it does not appear to be economical for Suburban to pursue surface water collection and treatment, at this time. Suburban feels that it needs to have a study performed that focuses on the best potential for groundwater availability, success at being granted water rights, etc., before it should pursue additional ground water resources. Staff points out that there are risks and benefits to pursuing a study, and that the Commission may want to avail its self of an expert hydrologist to provide more information before making a decision in that regard.

Q. How is the rest of your testimony organized?

A. I will first detail Staff's findings with regard to the aquifers in Suburban's service territory, the characteristics and limitations of the aquifers, and how these limitations have hindered Suburban's efforts to utilize its existing groundwater resources. I will then discuss the history of the Moran and Harper well fields, including water table levels at each site over time, and how the declining water table has affected the production from those wells. Last, I will discuss Suburban's efforts to obtain additional groundwater resources over the last decade, the outcome of those efforts, and Suburban's options regarding additional water resources in the future.

Groundwater Aquifers in Suburban's Territory

(Aquifer Location, Characteristics, Limitations, Etc).

Q. What did Staff learn about the aquifers that exist in the immediate vicinity of Suburban's service territory?

A. Staff learned that the major source of groundwater that exists in Suburban's service territory comes from glacial drift aquifers or from alluvial aquifers that exist along surface water drainages such as Stanger Creek. The Kansas River, a major source of both groundwater and surface water in the region, runs approximately five miles to the south of Suburban's territory. A geologic map of Leavenworth County showing the approximate position of these aquifers is attached as Exhibit JTG-2.[2]

Glacial drift aquifers can be generally described as glacially-buried valleys filled with small rock, gravel, and other permeable materials that are saturated with ground water. A description on the United State Geological Service website describes these aquifers as follows:

> Glacial-deposit aquifers form numerous local, and some regional, highly productive aquifers in the area north of the line of glaciation. These aquifers consist of outwash, terrace, or ice-contact deposits, and they mostly occupy bedrock valleys or areas of interlobate ice marginal deposition. In places, the valley deposits are buried beneath low-permeability till. Groundwater

[2] A full color version of this map can be found at http://www.kgs.ku.edu/General/Geology/County/klm/leavenworth.html

flow in the glacial-deposit aquifers is primarily local, from recharge areas near stream valley walls to discharge in the streams.[3]

One of the Glacial Drift aquifers that exist in Suburban's service territory is the source of the water that feeds the wells at the Moran well field site. Attached as Exhibit JTG-3, is a letter from Ground Water Associates, Inc., to the DWR discussing the unique characteristics of the aquifer, and its limitations for further development. The aquifer referred to in this letter is the "S" shaped aquifer that can be seen on Exhibit JTG-1 that runs from just south of Highway 24 to roughly Highway 32, with I-70 cutting directly through the center, at the southern half of Suburban's territory.

As will be discussed later in more detail, the limitations of this aquifer can be exemplified by declining water levels over time, wells going dry (supply and observation wells), wells not producing to the capacity authorized under current appropriation rights, claims of interference between two wells using the same aquifer, and enhanced informational requirements when seeking water appropriation from this aquifer.

In an interview with Katherine Tietsort, Water Commissioner at the Topeka Field Office of the DWR, it was explained to Staff that the glacial drift aquifers in this area were the second most concerning and complex aquifers in the eastern third of the state, in her opinion. In other DWR correspondence, the

[3] http://water.usgs.gov/ogw/aquiferbasics/uncon.html

aquifer is referred to as having "unique characteristics"[4] and it is explained that "the Division of Water Resources does not have adequate hydrologic information regarding the aquifer in this local area."[5] Staff learned that the DWR has requested additional hydrological surveying of the aquifers in this area from the Kansas Geological Survey, but the request has not yet been granted.

As a result of the unique characteristics and limited detailed hydrologic data about this aquifer, the threshold of information required before water appropriation rights will be granted through the DWR is especially high. In Suburban's request to appropriate water under file No. 47,324 (to be discussed in detail below), the DWR required Suburban to submit a "detailed hydrologic report" proving that "this localized aquifer can support further appropriation of water without impairing any senior water right."[6] The report was required to include "the estimated extent of the aquifer, site specific hydrologic data (e.g. long-term pump tests) estimating the maximum drawdown expected, and evaluating the potential impact on nearby wells." [7] This is one example of the concerns of the DWR Staff regarding future appropriation of water from glacial drift aquifers in Suburban's territory.

A review of Staff Exhibit JTG-1 shows another area of glacial drift aquifers north of Highway 24, between Stranger Creek and Wolf Creek, in the northern portion of Suburban's territory (Township 10 South, Range 22 East). This buried valley has been described as a "deep buried valley" with saturated

[4] See Staff Exhibit JTG-38.
[5] See Staff Exhibit JTG-34.
[6] See Staff Exhibit JTG-34
[7] See Staff Exhibit JTG-34

glacial materials from 13-71 feet in thickness.[8] Suburban's Harper field appears to tap into the very southern edge of this formation. However, most of the information Staff was able to gather was in regards to the aquifer that feeds the Moran well field, not the one running through the northern portion of Suburban's territory.

A review of the DWR water appropriation files (39,186 through 39,188)[9] revealed that Suburban did file for water appropriation rights at a location at the extreme northwest of its territory in 1989, in an area that appears to overlap with this aquifer; however, the application was later requested to be dismissed by Suburban. Staff issued discovery requests to Suburban about this aquifer, and the extent of Suburban's exploration efforts in this area, but the response did not refer to the aquifer referenced (or to the sites covered under the DWR file numbers referenced above); instead, Suburban referred to DWR file No. 46,504, which requested the right to pump water from an alluvial system below Stranger Creek. It's unclear as to whether this glacial drift aquifer could be a viable source of groundwater for Suburban and its customers.

In discussions with Suburban, its management feels very strongly about the potential of ground water supply in the alluvial aquifer below Stranger Creek, however, as discussed in more detail below, the site chosen by Suburban under DWR file No. 46,504 could not support the requested quantities of water and was denied by the DWR. The Kansas Geological Survey bulletin referenced above

[8] Hydrology and Geochemistry of Glacial Deposits in Northeast Kansas, Bulletin 229, Kansas Geological Survey. Denne, et. al. A full copy of this publication is available for review if requested.
[9] These applications were filed on January 6, 1989, and each requested the right to appropriate 6 Million Gallons of water per year, (Total of 18 Million GPY). The applications request 60 days to locate wells. On March 7 of the same year the applications were requested to be dismissed.

describes the Stranger Creek alluvium as offering yields of 10-50 gallons of water per minute, (GPM) as compared to wells on the Missouri river that offer yields of 2,000 GPM. Staff does not have additional information about this alluvial system and whether it has potential to provide an additional source of groundwater.

Suburban Well Production

Q. The Commission in its 602 Order questioned the decline in production of Suburban's wells. What was Staff able to determine about these wells?

A. Suburban has historically used wells from two well fields to serve customers in its service territory, the Moran well field, and the Harper well field. The Moran field is located in the center of section 22, Township 11S, Range 22E. The Harper field is located approximately three miles north of the Moran field, in section 3, of the same township and range. For a map showing the location of both well fields (as well as the observation wells and historical proposed points of diversion covered in DWR file numbers discussed in detail below) see Exhibit JTG-4.

Suburban Harper Well Field

(History, Production Levels, Water Table Decline, Closure)

Q. Please discuss your findings about the Harper field.

A. Of Suburban's two well fields only Moran is still in existence and providing a viable source of water, as the Harper field has been closed. The Harper field originally consisted of three wells, and was Suburban's sole source of water from 1984 through 1989, before the Moran field went in service. The wells in this field were granted water rights under the following DWR file numbers with the following volumes of water.

- 37,167—filed on April 17, 1984, requested appropriations of 6.252 million gallons of water per year (MGY). The application was approved on August 13, 1984 for the entire amount requested. This amount was eventually reduced to 2,665,800 gallons per year for the certificate of appropriation due to lower pumping rates as a result of the declining water table attributed to an over pumping of the aquifer.[10]
- 37,246—filed on July 13, 1984, originally requested 5.874 MGY, later reduced to 3 MGY, and approved on August 13, 1984. This file was later amended by DWR file No. 39,184, approved on October 12, 1995 for the originally requested quantity of 5.874 MGY.
- 37,247—filed on July 6, 1984, requested 3 MGY, approved on August 13, 1984.

From 1995 on, the wells at the Harper field were authorized to produce 11,539,800 gallons of water per year until Suburban closed the facility in 2008 and relinquished its water rights on August 13, 2009.

The Staff of the DWR agreed with that decision, stating that "the wells had gone down to a fairly small production, and were located in a residential area, making it unlikely that the well field could be rehabilitated in a cost-effective manner. It is appropriate to close these out."[11] These rights were terminated by DWR Order on September 1, 2009.

[10] See August 24th, 1995 Memorandum by Dale P. Mahan, attached as Exhibit JTG-5
[11] See Exhibit JTG-6, August 21, 2009 Email from Water Commissioner Katie Tietsort recommending dismissal of the Harper well facility water rights.

Q. Earlier you mentioned the declining water table at the Harper well facility. How much has the water table declined, and why does that affect the production of the wells?

A. Staff was able to find ample evidence that the water table at the Harper well facility has declined significantly in the past. This is unlikely to be a long-term source of water for Suburban because excessive pumping rates in excess of the 12 MGY originally authorized has caused the water table to decline significantly. Exhibits JTG-7 and JTG-8 contain graphs depicting the water table level at the Harper well facility. The first graph, labeled "Leavenworth County Observation Well," was compiled by the DWR using measurements collected by the staff of the DWR, on a quarterly basis at a location across the street from the Harper field, since 1987. The graph shows the water levels through 1995. The second graph, labeled "Suburban Water Company", was compiled from measurements collected by Suburban and depicts a very similar pattern and trend in water levels over time, containing measurements through 2003. Both of these graphs were found in DWR files pertaining to the Harper well field.

Exhibit JTG-9, contains a table labeled as "Static Water Level Master Sheet," originally compiled as part of an impairment investigation being conducted by the Water Management Staff of the DWR,[12] which contains well levels from several observation wells, the Moran well field, and the Harper well field. This table contains a host of different measurements taken by Suburban and the DWR from 1988 to 2004. These graphs and chart depict a steady lowering of

[12] This impairment investigation, originally requested by SWC in reference to a RWD No. 7 well to the south east of the Moran well field site, is discussed in detail below.

the water table from the late 1980's at Harper, Moran, and most of the observation wells.

Q. Earlier you stated that the wells probably couldn't support a level of pumping much above 12 MGY. What do you base that statement on?

A. In response to Staff Data Request No. 15,[13] Suburban stated that the static water level at the Harper field was back to 35 feet in 2010, signifying that after 2 years of not being pumped, the water had recharged in the aquifer. However, it does not appear that this aquifer is a viable option to support SWC's future operations. The limiting factor restricting the retrofitting of the Harper field was the limited rate of production (less than 12 MGY). Increasing production beyond 12 MGY has been shown to drastically reduce the static water level at the Harper field. As shown in the graphs referred to above depicting the water levels at the Harper field, a significant decline in the water table occurred from 1987 to 1989. During this period, DWR files indicate that SWC was pumping 12.1 MGY in 1987, 20.25 MGY in 1988, and 26.1 MGY in 1989.[14] This is despite the fact that only 12.25 MGY was approved for appropriation at this well facility. This is the "over pumping" of the aquifer that was referred to in exhibit JTG-5.

This drastic reduction in the water table levels in just three years while water in excess of 20 MGY was being removed from the aquifer supports the notion that this aquifer cannot support pumping levels significantly greater than 12 MGY originally authorized. Despite declining pump rates after the Moran field went into service in 1990, the water table beneath the Harper field stood at

[13] See Staff Exhibit JTG-10
[14] See Staff Exhibit JTG-11. Field Inspection report attached to Dale P. Mahan's August 24, 1995 memo regarding certificates of appropriation for the Harper wells.

43.7 feet in January of 2008.[15] At this level, even with pump rates significantly less than the amount authorized (averaging 5.9 MGY a year for the four years 2004-2007)[16] the wells at the Harper facility were cavitating[17] and Suburban eventually decided that it was not cost effective to continue to operate the facility.

Suburban Moran Well Field

(History, Production Levels, Water Table Decline, Impairment Complaint, Unpermitted Wells)

Q. Please discuss your findings about the Moran field.

A. The Moran field is located in the center of section 22, approximately three miles south of the Harper field and in the same township and range. This well field is currently operating, with four wells, pumping a total of approximately 60 MGY (DWR water use reports average 62,354,502 gallons from 2006 to 2008), and Suburban reports right at 60 MGY for 2009 and 2010.[18] This well field previously had a total of five wells, one of which is no longer pumping (after 2007) that Suburban attributes to a lowering of the water table.

The Moran well field operates under water rights granted in the following DWR file numbers:

- 39,287—filed on March 8, 1989, originally requesting three wells, later revised to four wells, for a total of 30 MGY. The first three wells were completed in 1989; the fourth was completed in 1995. The first three

[15] Response to Staff Data Request No. 32, attached as Exhibit JTG-10 behind the response to Staff Data Request No. 15.
[16] Suburban reported water usage to DWR.
[17] Cavitation is the formation of air bubbles in the well pump, caused by a reduction in the pressure of the water being removed from the well, in this instance as a result of a drawdown in the water table.
[18] See Staff Exhibit JTG-12 for SWC's response to Staff Data Request No. 13, providing yearly production totals from the Moran field for 2000-2010.

wells began pumping in 1990. At the time the wells were drilled they were drilled to approximately 71 feet, the point at which limestone was encountered, and the water table was at about 27 feet. This application was approved on October 12, 1995.

- 41,844—filed on September 29, 1995, requesting an additional 90 MGY, for a total of 120 MGY, from the four wells in existence at the time and pumping at the Moran field. This application was approved January 9, 1996.
- 42,733—filed on April 4, 1997, requesting a fifth well, drilled in 1996, to be authorized 24 MGY, as an alternative source of supply to meet peak demands on the system, not to be granted in addition to the existing 120 MGY appropriation rights. This application was approved August 18, 1997.

These five wells operated until 2007, when the water table declined to a point that the fifth well could no longer be in operation. Although the Moran field is currently authorized to produce 120 MGY, it has never reached that level of production, and the water table at the site has declined from approximately 34 feet beneath the surface in 1989 to 53 feet last observed by the DWR on March 2, 2011.[19]

Q. To what does Suburban attribute the decline in production of the Moran field from approximately 69.9 MGY in the year 2000 to 60.7 MGY in 2010?

[19] The March 2, 2011 water level measurement was provided to Staff from John Munson of the DWR technical services unit.

A. In response to Staff Data Request No. 13, and the follow up, Staff Data Request No. 30,[20] Suburban attributes the loss in production of the Moran field to the decline in the water table (evident in Exhibit MB-4 and Exhibit JTG-9), and to interference by the RWD No. 7 well that exists approximately ½ mile south east of the Moran field.[21]

Q. Why does the decline in the water table affect the production of the Moran field?

A. The decline in the water table affects the amount of water that can be drawn from the aquifer because the wells can only be pumped at a certain rate for so long before the water column surrounding the wells is lowered to a point below the intake of the wells, requiring the pumps to be turned off under risk of the pumps cavitating. This is exacerbated when the overall water table is lowered, as the water column doesn't have far to drop before falling below the well intake. This phenomenon was referred to as the "Cone of Depression" during discussions with DWR Staff, and is explained in more detail in response to Staff Data Request No. 28 (attached as Exhibit JTG-14).

Impairment Complaint

(RWD No. 7 Well, History of Complaint, Result of Complaints)

Q. Please discuss the history of the impairment investigation requested by Suburban, including the result of the investigation.

[20] Attached as Staff Exhibit JTG-13.

[21] Note: SWC refers to this well being 640 feet from the Moran well field, 40 feet outside the restricted area. Assuming the "restricted" area refers to the minimum required spacing of 1320 feet required by K.A.R. 5-4-4 for all non-domestic wells, the RWD No. 7 well is actually well beyond the minimum required spacing. As the Commission can see from Exhibit JTG-4, the RWD No. 7 well, marked on this map as 43,883 is at least 2600 feet away from the Moran well field.

A. The purpose of this impairment investigation was to determine if the RWD No. 7 well authorized by DWR file No. 43,883 was impairing the ability of the Moran field to pump its senior water rights. File No. 43,883 was filed on September 22, 1999, and requested appropriation of 104.27 MGY. On January 26, 2000, Suburban sent a letter to the DWR expressing concern about the proximity of the RWD No. 7 well to the Moran field, and requested a copy of the application and a hearing before a decision was made by the DWR.[22] On November 2, 2000, Brent Turney of the DWR recommended approval of the application, addressed Suburban's concerns, and described the location of the well as 2950 feet south east of the Moran field.[23] On December 7, 2000, the DWR approved the application, and required RWD No. 7 to maintain an observation well on the site, between its supply well and the Moran field.[24] (This observation well eventually went dry, and the DWR required RWD No. 7 to drill another observation well closer to the Moran well field).[25]

On December 17, 2002, Suburban's attorney, Donald L. Pitts, sent a letter to the DWR further reiterating concerns about the proximity of RWD's well, the declining water table, water quality concerns, and requesting a second observation well between the subject supply well and the Moran field.[26] RWD No. 7 began pumping its well on September 29, 2003, and although the well was authorized for 104.27 MGY, it has never produced to that level. A review of water usage reports filed with the DWR from the years 2004-2007 indicates an average

[22] See Staff Exhibit JTG-15.
[23] See Staff Exhibit JTG-16.
[24] See Staff Exhibit JTG-17.
[25] See Staff Exhibit JTG-18.
[26] See Staff Exhibit JTG-19

pumping of 23,149,000 gallons of water per year. After RWD No. 7 began pumping, it reduced the size of the pump to account for the limitations of the aquifer.[27]

On May 7, 2004, Suburban sent a letter to the Water Commissioner at the time, Iona Branscum, stating that as a result of the RWD No. 7 well pumping, Suburban has had to reduce the pumping capacity of two of it's wells at the Moran field, from 7.5 hp units, down to a 5 hp unit and a 3 hp unit.[28] The letter claims that RWD No. 7's pumping was beginning to affect the ability of Suburban to pump at the Moran field. This letter initiated the impairment investigation by the DWR to determine if the RWD No. 7 well ½ mile to the south east of the Moran field was adversely impacting Suburban's wells. This impairment investigation, if successful, could have led to the Chief Engineer of the DWR to administer RWD No. 7's water rights in a way that allowed Suburban's senior water rights to be satisfied. Exhibits JTG-22 and JTG-23 provide an overview and fact sheet discussing the impairment of water rights and the investigation process. Exhibit JTG-24 provides a copy of the Kansas Administrative Regulations governing water right impairment.[29]

Q. What was the result of the impairment investigation concerning the RWD No. 7 well and the Moran field?

A. The investigation was terminated by the DWR because it was discovered during

[27] See Staff Exhibit JTG-20.
[28] See Staff Exhibit JTG-21.
[29] Found at http://www.ksda.gov/includes/statute_regulations/mainportal/KWAA_Rules_Regs.pdf

the course of the investigation that Suburban was pumping water from two illegal wells (unpermitted with the DWR) between the Moran field and RWD No. 7's well. The pumping of these wells had invalidated any data collected by the DWR during the investigation including pumping tests, aquifer tests, etc.[30] A complete discussion about the unpermitted wells transpires below.

Q. Since the impairment investigation was terminated by the DWR, does that mean Suburban is permanently barred from seeking another impairment investigation by the DWR?

A. No. In dismissing the impairment investigation, the DWR stated, "Please note that this action does not restrict or in any way preclude the Suburban Water Company from filing any complaint in the future pursuant to K.A.R. 5-4-1 if you believe your prior right to the use of water is being impaired by junior users." During discussions with DWR Staff, Staff learned that the DWR still had transducers (equipment to take water level measurements every 30 minutes) in the Moran well field, RWD No. 7's supply well, and an observation well between the two wells. Because nearly a year had passed since the complaint had been dismissed, and another complaint had not been filed, and because the transducer equipment could be utilized in other investigations, the DWR removed the transducer equipment during the first week of March 2011. On March 3, 2011, John Munson of the DWR, sent to Staff via email the water level readings for all three wells taken from May 19, 2009 through March 2, 2011.

[30] See Staff Exhibit JTG-25.

Q. Did Staff conduct discovery as to why Suburban has not requested that the impairment investigation be re-opened?

A. Yes. In response to Staff Data Request No. 51, Suburban provided two reasons why it had not requested to reopen the impairment investigation:

1. A letter from the DWR, dated March 15, 2010, determined that data collected from the observation wells, the production wells, including any and all pumping or aquifer test to date was invalid.
2. Suburban is currently in discussions with RWD No. 7 about possible water supply options that would be beneficial to Suburban. RWD No. 7 has wells located next to the Kansas River that may be able to provide Suburban with a second source of groundwater. These discussions would be jeopardized if Suburban pursued impairment concerns with the DWR.[31]

Q. Above you quoted from the March 15, 2010 letter stating that the impairment investigation could be re-opened if Suburban felt its rights were being impaired by junior users. Why then is Suburban using the dismissal of the investigation as the reason not to request re-opening of the impairment investigation?

A. In response to Staff Data Request No. 62, Suburban stated the following:[32]

1. **[redacted]** In addition, DsWR has stated that RWD No. 7's well is outside their established parameter from other wells that requires proof of impairment of existing rights.

[31] See Staff Exhibit JTG-27 for a copy of the response to Staff Data Request No. 51
[32] See Staff Exhibit JTG-28 for a copy of the response to Staff Data Request No. 62 (Confidential)

2. Suburban understands they could request to re-open the previous impairment investigation against RWD No. 7, however, Suburban also understands that the Moran well field has limited production capability as evidenced by the illegal wells Moran 6 and 7 production impacting the other (Moran) wells and the fact that Moran 5 stopped producing and other Moran wells had to be limited.

Q. What is Staff's reaction to that response?

A. First, a review of the administrative regulations governing the impairment of senior water rights by junior users of water (K.A.R. 5-4-1) provides no mention of the "established parameter from other wells that requires proof of impairment." Suburban refers to this "impairment parameter" in response to Staff Data Request No. 63[33] also. Suburban states that the "DWR has already established that RWD No. 7's well is outside the impairment parameter. Therefore, any impairment investigation would only create animosity between Suburban and RWD No. 7." Again, in my review of the DWR files relating to the impairment investigation, the literature provided by the DWR describing and explaining impairment investigations, or the administrative rules and regulations that govern the impairment of senior water rights by junior users, I have not encountered any mention of an impairment parameter, or any limiting factor relating to distance between wells that impedes or restricts the ability of senior water right holders to seek an impairment investigation if they believe their water rights are being impaired. One would think that if the RWD No. 7 well was outside of the "impairment parameter" that the investigation would have been summarily

[33] See Staff Exhibit JTG-29 for a copy of the response to Staff Data Request No. KCC-63. (Confidential)

dismissed in 2004, instead of in 2009 when DWR discovered illegal well pumping activity by Suburban.

The second part of the data request is also intriguing. Suburban appears to claim that an impairment investigation is not worth-while because the Moran field is limited in production, (presumably because of an aquifer limitation). This is difficult to grasp because Suburban has claimed that the RWD No. 7 well is one of the reasons the field has produced as high as 82,395,200 gallons in 2003, and is only able to produce 60 MGY today without the water table declining rapidly.[34] A successful impairment investigation could lead to the DWR administering junior water rights in a fashion that would enable Suburban to satisfy its senior water right. If anything, one would think that the Moran field being limited would be evidence in support of the decision to request the investigation be re-opened, not a limiting factor impeding one's decision to request the investigation be re-opened.

Q. What is Staff's reaction to Suburban's reference to the possibility of water supply options with RWD No. 7 being a reason to not pursue re-opening the impairment investigation?

A. In response to Staff Data Request No. 63, Suburban stated that it **[redacted]** According to water use reports filed with the DWR, RWD No. 7 currently has two wells, producing approximately a total of 75 MGY, which it uses to serve the customers in it's district. One of the two wells is a well that taps into the alluvial aquifer beneath the Kansas River, and pumps approximately 50 MGY. **[redacted]

[34] See Staff Exhibit JTG-13, where SWC describes the impact of the RWD No. 7 well on the Moran field.

[redacted] ** There are unanswered questions as to whether it would be better for Suburban's customers if Suburban pursued a re-opening of the impairment claim against RWD No.7 in hopes of increasing the production from the Moran field, or to avoid that route in fear of creating "animosity" between Suburban and RWD No. 7 in hopes of preserving a future possible groundwater supply option.

Illegal Wells (Unpermitted with the DWR)

(History, Location, Pumped Volume, Consequences)

Q. Please describe the background of the illegal wells, how the DWR discovered the wells, and what the consequences were for Suburban drilling and pumping the illegal wells.

A. On May 22, 2009, personnel from Suburban, RWD No. 7 and other DWR technical staff met at the headquarters of the DWR, to discuss how the impairment investigation would proceed. A copy of the presentation materials distributed at that meeting is attached as Exhibit JTG-26. In this meeting, John Munson, Hydrologic Analysis, Technical Services Unit-DWR, described his intent to place transducers in wells at the Moran field, and at the RWD No. 7 well. Also, he described the need for another observation well to be drilled between the Moran field and the RWD No. 7 well.

At the meeting it was revealed that Suburban had drilled two new wells, equipped with pumps, south of the Moran field, but Ray Breuer of Suburban

indicated that neither well was pumping.[35] On May 19, 2009, John Munson visited the site of the Moran field, and the RWD No. 7 well, in order to install transducers in the wells, and survey the area between the two well fields to find a suitable location for an observation well. At that time, he discovered two production wells, both equipped and pumping, at a site at or very near the location requested in DWR application No. 44,055, on land owned by the Breuer family. During subsequent meetings with DWR staff, Suburban personnel explained that the wells had been plumbed to flow through the Moran well #5 (DWR file No. 42,733) that went dry in 2007, so the water being reported to the DWR for the years 2007, 2008, and 2009 for Moran well No. 5, was actually being produced from the illegal wells, now referred to as Moran wells No. 6 and No. 7. As a result of these illegal wells, and the false reporting of water usage under Moran well No. 5, Suburban was fined $7,000, and the impairment investigation referred to above was dismissed by the DWR.[36] The DWR also explained to Suburban that it was not too late to get the illegal wells permitted, so application No. 47,324, was filed on June 4, 2009, seeking water appropriations of 26.6 MGY from a battery of two wells at the current location of the illegal wells.

Upon learning that the water from these illegal wells was being reported to DWR under Moran well No. 5, and that Suburban had filed application No. 47,324 to try to get the wells permitted, Staff issued Data Request No. 41, questioning whether the yearly Moran pumping data provided to Staff in response to Data Request No. 13 included the illegally-pumped water and why DWR

[35] Staff Exhibit JTG-30.
[36] See Staff Exhibit JTG-31 for a copy of the Civil Penalty Order issued by the Division of Water Resources relating to the illegal well pumping, and false reporting of water usage data.

application No. 47,324 was not provided to Staff in response to Staff Data Request No. 14, which requested all DWR file Nos. from each application for water rights by Suburban from the year 2000 through 2010.[37] In response to Staff Data Request No. 41, Suburban stated the following:[38]

> Suburban did not provide its file on application file No. 47,324 to its consultant to provide to the Staff in response to Staff DR No. 14, because Suburban was embarrassed about the outcome of that application filed with the DWR in that Suburban was found to have produced unpermitted water and was required to pay a fine for producing the unpermitted water.

In addition, Suburban stated:

> The unpermitted water production from Moran No. 6 and No. 7 wells was included in the Moran well production (submitted in response to DR No. 13). Suburban believed that it should have been allowed to produce water from those wells because production came from the water field that was originally discovered by Suburban and Suburban disagreed with the DWR decision not to allow Suburban to produce those wells." The unpermitted water production from the Moran No. 6 and Moran No. 7 wells was assigned to the Moran No. 5 well as if that water had been produced from the No. 5 well.

[37] See Staff Exhibit JTG-32 for copies of SWC's response to Staff Data Request No. 14, and the amended response to Staff Data Request No. 14.
[38] See Staff Exhibit JTG-33 for the response to Staff Data Request No. 41.

Q. How much water was pumped from the Moran wells No. 6 and No. 7, and for how long?

A. The wells were drilled in April of 2006 on property purchased by Ray Breuer, the President of Suburban, on December 19, 2006.[39] It is unclear how the company drilled wells on property that it did not own at the time. It is also unclear exactly how much water was pumped from the illegal wells. In response to Staff Data Request No. 41, Suburban provided an estimated pumping rate for 2006, 2007, 2008, and 2009, but it is unclear as to accuracy of these numbers. For example, in 2006, Suburban states that a possible 8,752,961 gallons could have been produced from those wells. However, only 1,895,000 gallons was reported to the DWR for Moran well No. 5 for the year 2006. If the production from the unpermitted wells was reported under Moran well No. 5, logic would dictate that the unpermitted well production would have to be less than 1,895,000 for 2006. For 2007, Suburban states that 26,149,100 gallons of water came from the unpermitted wells, while only 24,761,100 gallons was reported to the DWR. In conversations with Suburban, the company claims that Moran well No. 7 went dry in 2008, and stopped pumping, however, the DWR staff observed two wells, equipped and pumping in May 2009, when the wells were discovered.[40] It's unclear about how much water was pumped from these wells, but it appears that around 25 MGY was pumped during the year 2007. Both of the wells were shut down, under

[39] Well logs maintained at the KDHE indicate that the wells were drilled in April of 2006. This is the date relied on by the DWR in its civil penalty order. In response to Staff Data Request No. 59, SWC stated that the property in question was purchased on December 19, 2006.
[40] Staff Exhibit JTG-31

observation of DWR staff, in May of 2009. The wells were then permanently sealed during 2010.

DWR Application No. 47,324 (Illegal Wells)

(History, DWR Informational Requirements, Outcome)

Q. Please discuss the background and outcome of application file No. 47,324, seeking water appropriations from the site of the illegal wells.

A. On June 4, 2009, Suburban submitted an application to the DWR to appropriate 26.6 MGY from a battery of two wells Moran 6 and 7. On June 18, 2009, DWR Staff member Douglas Schemm sent a letter to Suburban describing the initial review of the application, and what additional information would be required in order to continue processing the application.[41] Mr. Schemm explained that because the site of the subject wells did not meet the required minimum spacing of 1,320 feet for non-domestic wells in a glacial drift aquifer, an engineering report or similar hydrologic analysis would be required to show that reduced well spacing could be accomplished without impairing senior water rights (the wells were within 1,320 feet of existing Suburban wells (the Moran field) and the RWD No. 7 well). In addition, Mr. Schemm stated that "the DWR does not have adequate hydrologic information regarding the aquifer in this local area; therefore we are unable to determine what potential impact the proposed appropriation of ground water would have on existing water rights." Due to the DWR concerns about the subject aquifer, and the relative proximity of these wells to other non-domestic wells, Suburban would be required to submit a report providing the estimated extent of the aquifer, site specific hydrologic data (long-term pump

[41] See Staff Exhibit JTG-34

tests), and a map depicting the saturated thickness of the aquifer in the immediate area. It was explained that an accepted ground water modeling program must be utilized, and that the DWR would review any data to see if they agreed with the modeling results.

Q. What was Suburban's response to the June 18, 2009 letter from DWR?

A. On June 24, 2009, Cara Hendricks, PE of the Taylor Design Group sent a letter to the DWR on Suburban's behalf requesting a 60-day extension of time "in order to complete research for the additional information required."[42] Then, on August 31, 2009, Suburban sent another letter to the DWR requesting a 90 day extension of time in order to complete the requested study of the subject aquifer and the referenced two wells.[43] Mr. Raphael Breuer explained that Suburban was in the process of negotiating a contract with Aquaterra to perform the study, and that there was a personnel change at the consulting firm that Suburban had been using to assist it in performing the work. On December 3, 2009, Suburban sent the DWR a letter stating that it had "decided to abandon the referenced wells and requests that Application File No. 47,324 be dismissed."[44] By Order on December 8th, 2009, the DWR dismissed the application to appropriate water from the two wells.

Q. Did Staff issue discovery regarding Suburban's decision to abandon the wells and request dismissal of the water appropriation application?

A. Yes. In Staff Data Request No. 42, Staff asked Suburban for all correspondence between Aquaterra and Suburban (or any other consulting firm contracted to

[42] See Staff Exhibit JTG-35
[43] See Staff Exhibit JTG-36
[44] See Staff Exhibit JTG-37

perform the aquifer modeling study), whether the aquifer modeling study was or was not prepared, for a result of the study if it was prepared, and for a reason for not preparing the study if it was not prepared. In response, Suburban provided the email correspondence with Aquaterra indicating that the cost of the project was estimated at between $23,500 to $62,500.[45] In explanation for not performing the study, Suburban stated "SWC did not have the funds to undertake this study."

Suburban Efforts to Find Ground Water

(DWR Application Nos. 44,055, 44,056, 46,504).

DWR Application No. 44,055 and 44,056

(History, DWR Informational Requirements, Outcome)

Q. Earlier you mentioned DWR Application No. 44,055, and stated that the illegal wells were drilled "at or very near the location" covered under that application for water rights. Please discuss the background and outcome of that application.

A. On February 11, 2000, Suburban filed with the DWR Application No. 44,055 requesting to appropriate 160 MGY from a location very near (within a few hundred feet and on the same property) the eventual site of the illegal wells. On the same day, Suburban filed DWR Application No. 44,056 requesting to appropriate another 160 MGY, at a location approximately one mile south of the

[45] See Staff Exhibit JTG-38 for a copy of the response to Staff Data Request No. 42. Please note, there were multiple pages attached to this response, including open records request detail from the RWD No. 7 well, emails related to other services being performed by SWC, other documents already attached as other exhibits to my testimony, etc. I have included the data request response, and all emails pertaining to the aquifer modeling study in this exhibit. If the Commission wishes to view the entire data request response, I can provide a copy.

Moran field. (The location of each site can be seen on Exhibit JTG-4) Most of the correspondence between the DWR and Suburban regarding these two applications was combined into one document, apparently because of the close geographical location of the two proposed locations, and the fact that they were filed on the same day by the same company. From 2002 until late 2003, the DWR and SWC exchanged various correspondence involving the specific location of the wells, the names and addresses of nearby well owners, the expected use of the water, etc. On October 29, 2003, the DWR sent a letter to the Suburban explaining the following:[46]

> It has been determined that within the area of consideration for both pending applications, there is 232.785 MGY available for appropriation....Please indicate how you wish the 232.785 million gallons be divided between Application File Nos. 44,055 and 44,056.

Staff learned that the available quantity of water (referred to above) was based on a safe yield analysis, which determines annual rainfall, assumes an amount of that rainfall that enters the aquifer as recharge each year, looks at water already being appropriated from the aquifer, and determines availability based on what's leftover.

In the same letter, however, the DWR expresses concern about the pumping rates requested, and states the requirement that additional information would be required due to the nature of the specific aquifer in question:

[46] See Staff Exhibit JTG-39.

> Information in this office indicates that the source of supply for the proposed diversions is buried glacial deposits of the Kansan age. The aquifer proposed to be utilized has unique characteristics that will require additional information to be submitted before the applications can be further processed. This information is needed to determine the potential for impairment to nearby municipal wells and nearby domestic wells. It may be determined, with information submitted, that the applications could be approved with rates of diversions less than requested per file. The requested maximum rate of diversion of 800 gallons per minute per application may be excessive considering the aquifer. Please provide sufficient scientific information that will indicate that the aquifer can safely yield the requested 800 gallons per minute per file. Existing wells in this aquifer currently produce at significantly lower rates of diversion. If the applications are approved, special conditions and requirements may be needed to insure that the source of water is not being over utilized and to prevent impairment to senior water rights. This would likely include the installation of and routine monitoring of an observation well.

Information was also requested in the letter about nearby well owners, place of use of water, etc. On January 22, 2004, the DWR sent another letter to Suburban, reiterating statements about the unique characteristics of the aquifer and

requesting proof of legal access to the two proposed points of diversion (wells) requested in the two applications.[47] On February 25, 2004, Suburban sent a letter to the DWR stating:

> After careful discussion and review, we have come to a conclusion that we are going to set this aside and retire the proposed locations for this project.[48]

On February 27, 2004, the DWR issued an Order dismissing both applications 44,055 and 44,056.[49] This Order was mailed on March 2, 2004. On March 11, 2004, Suburban sent a reply letter to the DWR stating,

> After leaving your office around mid September 2003, I was under the impression that all applications and documents were in place regarding additional water rights so when the latest letter arrived I assumed we were granted the additional rights. It was never my intention to fail to return any required documents in a timely manner. I would like to apologize for this misunderstanding on my part. We would like to pursue additional water rights at a later date. I hope this misunderstanding on my part will not hinder our future applications.

It is unclear why Suburban would be surprised to see an Order dismissing its applications for water rights, when it had requested the dismissal of the applications granting the rights just two weeks prior.[50]

[47] See Staff Exhibit JTG-40.
[48] See Staff Exhibit JTG-41.
[49] See Staff Exhibit JTG-42
[50] See Staff Exhibit JTG-43.

Q. Did Staff issue discovery regarding Suburban's decision to set aside and retire the proposed well locations?

A. Yes. Staff issued Data Request Nos 46 and 47[51], requesting information about whether legal access was able to be gained to the site, why a hydrological study was not performed on the chosen sites, etc. In response, Suburban stated that it was not able to gain legal access to either one of the sites covered under the two applications, (44,055 and 44,056) and that it did not believe that a hydrological study attempting to prove that the aquifer could support the requested water appropriation was economical, since there was no guarantee the water would produce at a rate sufficient for a public supply. Suburban stated that the estimated cost of the hydrological study would be $65,000. Also, because legal access could not be obtained, Suburban could not drill a test well to confirm the necessary quantities of water.

Q. What did Suburban say in the response about its efforts to gain legal access to the proposed well sites?

A. Suburban stated that it attempted to gain access to the sites, and was denied the legal access by both landowners owning the land at the time. The response states that the land owners personally came to Suburban's offices and stated vehemently that they would not allow Suburban access to their land to drill a test well.

[51] See Staff Exhibit JTG-44 for a copy of the response to Staff Data Request Nos. 46 and 47. Note: there were multiple pages attached to this response that were not included in this exhibit. They include copies of correspondence to the DWR, copies of the applications, etc. that have either already been attached as other exhibits, or may not be directly relevant. A full copy of the data request response, including all attachments, is available upon request.

Q. Are the subject properties still owned by the same landowners?

A. No. The land at the site of the proposed wells covered under application No. 44,055, has changed hands. The President of Suburban, Raphael Breuer now owns that land, which, according to the response to Staff Data Request No. 59, was purchased on December 19, 2006. Suburban stated in response to Staff Data Request No. 47 that the site of the proposed wells covered under application No. 44,056 is still owned by the same land owners.

DWR Application No. 46,504

(History, Suburban Pump Test, DWR Reaction, Outcome)

Q. Given Suburban's unsuccessful attempts to secure additional groundwater in the aquifer that feeds the Moran field, has Suburban applied with the DWR for the right to appropriate water in an area outside of this aquifer?

A. Yes. On June 16, 2006, Suburban filed application No. 46,504 requesting to appropriate 350 million gallons per year, at a rate of 1000 gallons per minute (later reduced to 800 GPM) from a battery of four wells located in the southeast corner of Section 1, Township 11S, Range 22E. I have attached a map of Suburban's territory, along with hand written notes identifying the location of this proposed well battery and the other well locations discussed thus far, as Exhibit JTG-45. The proposed location of this well battery is very near the Stranger Creek, in an area that appears to overlap with the alluvial aquifer beneath Stranger Creek.

Q. What was the result of this application?

A. The DWR denied Suburban's application. The proposed well locations did not meet the required minimum spacing to other domestic wells, and a pump test

performed on the area, (at 100 GPM, or 1/8th the requested total) produced a drop in the static water level of a nearby domestic well of 20 feet, causing the well to pump discolored water for several days after the pump test concluded. In addition, the pump test concluded that the aquifer experienced a drawdown of 30 feet during a 24-hour pump; once pumping ceased, the aquifer took more than 24 hours to return to original levels. I have attached a letter to Suburban from the DWR discussing the findings, and the Order dismissing the application as Exhibit JTG-46 and JTG-47, respectively.

Groundwater Study

(Suburban Recommendation, Scope, Costs, Potential Firms, Risks, Benefits)

Q. Given the history of Suburban's unsuccessful efforts to secure additional groundwater, Suburban witness Mike Breuer has suggested (Pg 16 of Mike Breuer's direct testimony) that it needs to have a study performed to determine the likelihood of success of such efforts before attempting to expand its own water resources. Has Staff issued discovery about this study?

A. Yes. Staff issued Data Request Nos. 53, 55, 56, and 57 about the study referred to in the testimony above. Each of the full data request responses is attached as Exhibits JTG-48 through JTG-51. The following bullet points represent the information sought by Staff, and Suburban's response:

- Is the study referred to in the referenced testimony above a limited aquifer modeling study as requested by the DWR for files 44,055 and 47,324? Or would the study cover the entire service territory of Suburban to determine the likelihood of additional water supplies?

In response to Staff Data Request Nos. 55 and 56, Suburban clarified that the study referred to Mr. Breuer's testimony was not a limited aquifer modeling study, but instead a study to look at the glacial deposits in regions across Suburban's territory to identify top areas that might provide Suburban with additional ground water resources. The study would then examine existing domestic and municipal wells in the vicinity to determine if Suburban would be successful in its attempts to appropriate water from the areas. Of course, the cost of a groundwater treatment facility and the cost to extend Suburban's distribution system would also need to be analyzed.

- Who are the potential vendors that have expertise in groundwater exploration and analysis in northeast Kansas?

Suburban stated in response to Staff Data Request No. 53 that the only vendor it knew that could perform such a service would be Aquaterra. In Staff's conversations with DWR personnel, the firms Groundwater Associates, and Terrain Resources, Inc. were mentioned as qualified vendors that may be able to perform a study such as the one referenced.

- What would be the potential cost of such a study?

Originally Suburban responded that the cost of such a study would range from $23,500 TO $62,500, however, this was later rescinded as a misinterpretation of the question, and Suburban's consultant Greg Wilson stated that "SWC has never attempted nor has any idea what it would cost."

- Has such a study been performed before, if not, how did Suburban choose the sites covered under previous DWR applications?

In response to Staff's inquiries, it was revealed that Suburban has not previously had such a study performed, but has relied on the past experience of the employees of the company with drilling wells in the area to determine the most likely sites to appropriate water. As has been discussed, since the Moran field, this strategy has not produced success.

- Does Suburban currently have the financial resources to undertake a study such as the one recommended by Mr. Breuer's testimony?

In response to Staff Data Request No. 57, Suburban stated that it does not have the funds to complete this type of study, and such funds would have to be "raised through an increase in water rates."

Economics of Pumped (Ground) Water

(Variables Affecting Calculation, Assumptions, Results)

Q. If Suburban were to be successful in finding water, what are the factors affecting the economics of pumping that water versus buying water from BPU?

A. If Suburban can find a sustainable source of groundwater to supply its customers, it should be less expensive than the water it is currently purchasing from BPU. Suburban's current cost of pumped water is approximately $.71 per thousand gallons pumped, based on Suburban's historical costs incurred to maintain and operate the wells, recover the original cost of the wells, etc., (based on roughly 65,000,000 gallons of water pumped).[52] Staff issued several data requests (No. 20, 24, 39, 43, 45, and 60) regarding the economics of pumping water from

[52] See Staff Exhibit JTG-52

Suburban's service territory, in order to calculate an approximate cost of pumped water from a new well field, if water can be found.

In response to Staff Data Request No. 24, Suburban provided support for the $400,000 estimated cost of developing a new well field referenced on Pg. 6 of Mike Breuer's testimony.[53] This cost does not represent the capital cost of developing a new well field, but instead includes the annual costs to operate a new field (estimated to be $50,000), and the interest costs of the field over the life of the loan (estimated to be $100,000). Therefore, Suburban's estimated capital cost to develop a new well field, with a treatment facility suitable to treat ground water, is approximately $240,000. In addition, it may be necessary to expand Suburban's distribution network to connect a hypothetical new well field to the system. Suburban estimated this cost at $294,784 in response to Staff Data Request No. 60.[54] Using Suburban's estimates to operate a well field of $.62 per 1,000 gallons of water pumped, and estimated cost of borrowing of 7.5%, Staff was able to calculate an estimated cost of pumped water for a range of volumes of pumped water.[55] Using the assumptions identified, it would be more cost effective for Suburban to pump its water than purchase it from BPU if more than 40,000,000 gallons a year could be pumped. This is very similar to the calculation offered by Suburban in response to Staff Data Request No. 60, however, a variety of the inputs to the calculation are different (Suburban used $400,000 cost for a well, 10.9% for the PILOT fee instead of 11.9%, etc.).

[53] See Staff Exhibit JTG-53 for a copy of Staff Data Request No. 24.
[54] See Staff Exhibit JTG-54 for a copy of Staff Data Request No. 60.
[55] See Staff Exhibit JTG-55.

Q. Given the economics of pumping water versus purchasing it from BPU does Staff recommend that Suburban pursue a groundwater study to determine if additional groundwater is available for appropriation?

A. No. Staff does not have a recommendation during this proceeding. There are still many unknowns with regard to the possibility for available groundwater in the area. There are both risks and benefits associated with a decision to study the possibility of gaining additional groundwater resources. If additional groundwater were to be available, it would obviously benefit Suburban's customers if it could utilize that resource. However, the small size of Suburban's customer base should be considered before committing significant resources on a study that has no guarantee of success. Also, legal access to the site would have to be obtained, and Suburban has experienced difficulties in obtaining that access in the past. Lastly, the glacial drift aquifers in Suburban's territory have a history of exhibiting special characteristics and limitations so there's no guarantee that a study will result in identification of sustainable sources of groundwater. These are all important considerations for the Commission to consider when determining whether Suburban should undertake a study. Should the Commission wish to Order Suburban to undertake a study, the Commission may want to avail itself of a hydrological expert with experience in this area in order to gather more information with which to make a decision in a subsequent proceeding.

Availability of / Economics of Surface Water

(Availability, Economics)

Q. All of the discussion to this point has focused on the availability of groundwater as a source of supply for Suburban's customers. Is surface water a possible option for additional supply for Suburban?

A. Staff contacted Nathan Westrup, a Public Water Supply Manager with the Kansas Water Office as one resource to begin to answer that question. Staff was interested in whether Suburban was able to take advantage of a KWO program called the Water Marketing Program, authorized and enabled by the State Water Plan Storage Act, (K.S.A. 82a 1301 through 82a 13-1320), which enables municipal and industrial water users to contract with the KWO to purchase state-owned water in federal storage reservoirs (examples in northeast Kansas would be Perry, Clinton, Lake Milford, Hillsdale).

Staff learned that this is probably was not a viable option for a small utility such as Suburban. First, the KWO does not make arrangements for the water to be transported to the user, therefore a pipeline or other delivery device would have to be constructed, either to a reservoir (the closest would be Hillsdale Reservoir) or the Kansas River. If a pipeline could be constructed to the Kansas River, there would be major treatment expenditures required to treat that water, which would be very expensive for a small utility and would be unlikely to be more economical than purchasing water from a larger utility in the area that already had the capabilities to treat water.

Staff was able to find an estimate of the costs to construct a surface water treatment facility, which used data from the Rural Utilities Services from the year

2000, updated to the year 2007. This cost estimate placed the approximate cost of a 1 Million gallon per day surface water treatment facility at approximately $1,750,000.[56] When you add this to the estimated cost of $2,000,000 to build a 5 mile pipeline to the Kansas River, it is very unlikely that it would be economical for a small utility such as Suburban to pursue surface water collection and treatment as opposed to buying its water from a wholesale supplier in the area or pumping groundwater.

Q. Does that conclude your testimony?

A. Yes.

[56] See Staff Exhibit JTG-56.

Listing of Staff Exhibits

Exhibit JTG-1—Letter from Staff to Jim Flaherty describing intent of Rate Case Plan.

Exhibit JTG-2—Geologic Map of Leavenworth County.

Exhibit JTG-3 – Letter from Robert Vincent of Ground Water Associates Inc. DWR File No. 44,055.

Exhibit JTG-4 –Map of Suburban Wells and proposed sites 44,055, 44,056, 43,883.

Exhibit JTG-5—August 24, 195 Memorandum from Dale P. Mahan regarding decreased pumping rates.

Exhibit JTG-6—Email from Katherine Tietsort, DWR Water Commissioner, Regarding the Closing of Harper.

Exhibit JTG-7—Leavenworth County Observation Well Graph (Harper).

Exhibit JTG-8—Suburban Observation Well Graph (Harper).

Exhibit JTG-9—Static Water Level Table (Harper, Moran, others).

Exhibit JTG-10—Response to Staff Data Request No. 15 (Harper Well Production) and Response to Staff Data Request No. 32 (Static Water Level at Harper).

Exhibit JTG-11— Field Inspection Report of the Harper Well Facility, 1993.

Exhibit JTG-12—Response to Staff Data Request No. 13 (Moran Field Production 2000-2010).

Exhibit JTG-13—Response to Staff Data Request No. 30 (Follow up to DR # 13).

Exhibit JTG-14—Response to Staff Data Request No. 28 (Decrease in Water Table at Moran).

Exhibit JTG-15—January 26, 2000 Letter to DWR from Suburban expressing concern about RWD No. 7 (43,883).

Exhibit JTG-16—November 2, 2000 Memo from Brent A. Turney of DWR regarding approval of 43,883.

Exhibit JTG-17—December 7, 2000 DWR Order approving 43,883.

Exhibit JTG-18—June 25, 2009 Requiring RWD No. 7 to install another observation well (43,883).

Exhibit JTG-19—December 17, 2002 Letter from Suburban to DWR expressing concern about RWD No. 7 (43,883).

Exhibit JTG-20—(Same as Exhibit JTG-3).

Exhibit JTG-21—May 7, 2004 Letter from Suburban alleging impairment by RWD No. 7 of the Moran Field.

Exhibit JTG-22—Impairment Complaint Overview from DWR web site.

Exhibit JTG-23—Impairment Complaint Fact Sheet from DWR website.

Exhibit JTG-24—K.A.R.5-4-1 –Distribution of Water between users when a prior right is being impaired.

Exhibit JTG-25—March 15, 2010 Letter from Katherine Tietsort dismissing the Impairment Investigation.

Exhibit JTG-26—May 14, 2009 Presentation by John Munson of DWR (Impairment Investigation meeting).

Exhibit JTG-27—Response to Staff Data Request No. 51 (Continuation of Impairment Investigation)

Exhibit JTG-28—(Confidential)—Response to Staff Data Request No. 62 –

Exhibit JTG-29—(Confidential)—Response to Staff Data Request No. 63—

Exhibit JTG-30—May 22, 2009 Memorandum from Katherine Tietsort regarding illegal wells discovery.

Exhibit JTG-31—July 17, 2009 Order assessing civil penalty to Suburban for illegal wells and false reporting of water use.

Exhibit JTG-32—Response to Staff Data Request No. 14 and Amended Response to Staff Data Request 14 (DWR Files).

Exhibit JTG-33—

Exhibit JTG-34—June 18, 2009 Memo from Douglas Schemm, DWR regarding application No. 47,324.

Exhibit JTG-35—June 24, 2009 Letter from Cara Hendricks, on Behalf of Suburban for an 60-day extension.

Exhibit JTG-36—August 31, 2009 Letter from Suburban Water requesting a 90-day extension.

Exhibit JTG-37—December 3, 2009 Letter from Suburban requesting dismissal of Application No. 47,324.

Exhibit JTG-38—Response to Staff Data Request No. 42. (DWR Application No. 47,324)

Exhibit JTG-39—October 29, 2003 letter from Douglas E. bush to Suburban regarding Application 44,055 and 44,056.

Exhibit JTG-40—January 22, 2004 letter from Douglas E. Bush to Suburban regarding Application No. 44,055 and 44,056.

Exhibit JTG-41—February 25, 2004 letter from Joseph M. Breuer requesting dismissal of Applications 44,055 and 44,056.

Exhibit JTG-42—Febryary 27, 2004 Order by DWR dismissing Applications 44,055 and 44,056.

Exhibit JTG-43—March 11, 2004 letter from Joseph M. Breuer expressing surprise that Applications 44,055 and 44,056 were dismissed.

Exhibit JTG-44—Response to Staff Data Request No. 46 and No. 47 (Application Nos 44,055 and 44,056)

Exhibit JTG-45— Map of Suburban Water Company service territory, hand written notes of DWR Application locations.

Exhibit JTG-46—January 19, 2007 Letter From Douglas Schemm of DWR regarding 46,504.

Exhibit JTG-47—DWR Order dismissing Application No. 46,504.

Exhibit JTG-48—Response to Staff Data Request No. 53—(Qualified Vendors for Groundwater study)

Exhibit JTG-49—Response to Staff Data Request No. 55—(Intent of Groundwater Study)

Exhibit JTG-50—Response to Staff Data Request No. 56—(Location and Scope of Groundwater Study)

Exhibit JTG-51—Response to Staff Data Request No. 57—(Funding of Study)

Exhibit JTG-52—Response to Staff Data Request No. 19—(Cost of Purchased Water Calculation-Present)

Exhibit JTG-53—Response to Staff Data Request No. 24—(Cost of New Water Well)

Exhibit JTG-54—Response to Staff Data Request No. 60—(Amount of Pumped Water versus BPU Calculation)

Exhibit JTG-55—Staff's Calculation of Pumped Water Cost using Suburban's Estimates

Exhibit JTG-56—Surface Water Treatment Facility Estimated Cost

KANSAS
CORPORATION COMMISSION

November 23, 2010

James G. Flaherty
ANDERSON & BYRD, LLP
216 S. Hickory, P.O. Box 17
Ottawa, KS 66067

RE: Suburban Water, Inc. d/b/a Suburban Water Company

Dear Jim:

As we have discussed, the Commission Order in Docket No. 10-SUBW-602-TAR directed Staff to work with Suburban Water Company to develop an appropriate abbreviated rate case process that will provide the Commission with the information it needs to set just and reasonable rates and will lessen the financial burden associated with rate case expenses for Suburban and its customers. At your request, Staff, Suburban, and CURB met at the Commission offices on Friday, November 12, 2010 to discuss Suburban's abbreviated rate case plan.

At the meeting, Suburban presented a plan to file three annual, abbreviated rate cases pursuant to K.A.R. 82-1-231b. The first rate case (anticipated during late 2010), would rely on the cost of service the Commission approved in Docket No. 07-SUBW-1352-RTS, as adjusted for the following components:

1. The new cost of water from the Kansas City, Kansas Board of Public Utilities, (BPU), effective January 1, 2011;
2. The current retail rate being charged by Suburban;
3. The most recent sales volumes recorded by Suburban for the twelve months ending June 30, 2010; and
4. Rate case expenses—to be minimized to the fullest extent possible.

Suburban also plans to provide a copy of its most recent audited financial statements, and plans to request a 6% margin on its operating expenses, as utilized in the 1352 Docket. In its second rate case (anticipated to be filed late 2011), Suburban plans to file a new cost of service, including cost of water increases, any general cost increases, and any cost increases related to any automated meter reading equipment installed by Suburban. In its third and final abbreviated rate case (anticipated to be filed late 2012), Suburban plans on relying on the cost of service set during the second proceeding, as adjusted for the increased cost of water, and the cost of filing the rate case.

In the first rate case, Suburban would not request an increase in revenue requirements associated with any increase in expenses other than those specifically identified above. In addition, Suburban plans to present evidence in response to the Commission's water supply and pricing concerns, as expressed in the Order on Application which denied the Purchased Water

customers should be informed about Suburban's proposed rate plans. This could be accomplished through a variety of different methods. For instance, Suburban could send its customers a bill insert describing the pertinent elements of its rate plan; Suburban could hold a public meeting; the Commission could hold a public hearing; or some combination thereof. Staff believes that Suburban should seek the Commission's input regarding this process.

Lastly, the rate case audit schedule was discussed. Staff's sees a reasonable schedule as approximating the one set out below.

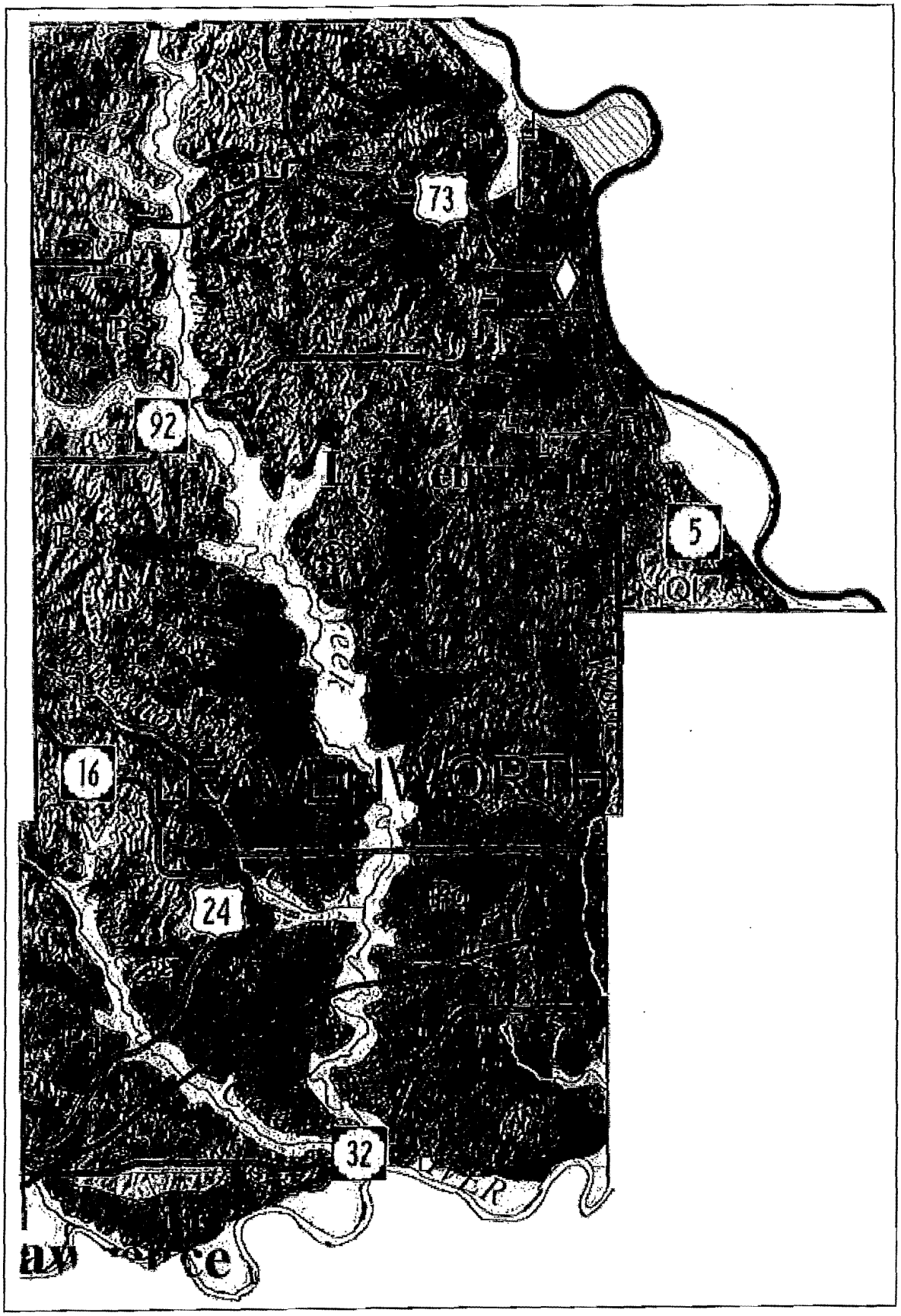
- Suburban's filing on December 13, 2010.
- Staff Report and Recommendation on March 3, 2011— (80 Days)
- Interim Order by April 2, 2011— (30 days)
- Interim Rates Comment Period ends July 1, 2011— (90 Days)
- Final Order due by July 31, 2011—(30-days)

In general, Staff supports Suburban's abbreviated rate case plans, and looks forward to working with Suburban to resolve the Commission's concerns and implement just and reasonable rates as soon as possible. Please let me know what Staff can do to assist in any way we can. Until then I remain

Yours truly,

Colleen R. Harrell
Attorney for Commission Staff

Cc: Michael Schmidt
Jeff McClanahan
Bill Baldry
Justin Grady



Cenozoic Era

Paleozoic Era

file on 44055 and 43883

Ground Water Associates, Inc.

610 N. MAIN, P.O. BOX 3834 • WICHITA, KANSAS 67201 • 316-262-3322

January 15, 2004

Douglas E. Bush, Environmental Scientist
Division of Water Resources
109 SW 9th Street, 2nd Floor
Topeka, Kansas 66612

Subject: Application File No. 44055
Suburban Water Company

Dear Mr. Bush,

This letter is written on behalf of Leavenworth County RWD No. 7 and specifically their Well No. 1 which is covered by file No. 43883. I am serving as the District's agent in this matter.

Most of the water production in this area comes from glacial deposits in sediment filled valleys. In this situation, the channel appears to run from the north-northwest to south-southeast. And although the sands and gravels are fairly productive, the valley itself is not very wide, and this limits water production from any one area.

The valley appears to be approximately 1500 to 1600 feet wide at the static water level, but the deeper portion of the channel appears to be no more than about 200 feet wide based on our surface observations and the limited test hole drilling conducted by the District. The pumping test that was run on Well No. 1 shows a transmissivity (T) in the 30,000 to 40,000 g/d/ft range, but when the valley wall is encountered, the well production is reduced significantly. Because of this factor the District reduced the size of their pump installed in Well No. 1 to a unit that will yield in the 200 to 250 gpm range. We have some concern that another pumping center (File No. 44055) directly to the northwest could cause an impairment problem for the District's well.

The center point of the four well battery (File No. 44055) is to be located at a point that is 1860 feet northwest of the District's well, and this means that one of the wells could be within 1560 feet. We recognize that these distances meet your requirements, but due to the limited size of the aquifer, the possibility exists that some well interference may occur. The District was required to install an observation well 769 feet to the northwest of their well, and this will provide some protection from the proposed new pumping center. However, if DWR approves the new application, we believe that Suburban Water Company should be required to install another observation well between their closest well and the District's observation well. In this manner, the problem solving (if one develops) will be facilitated.

Please contact us if we need to elaborate on any of the points covered in this letter.

Very truly yours,

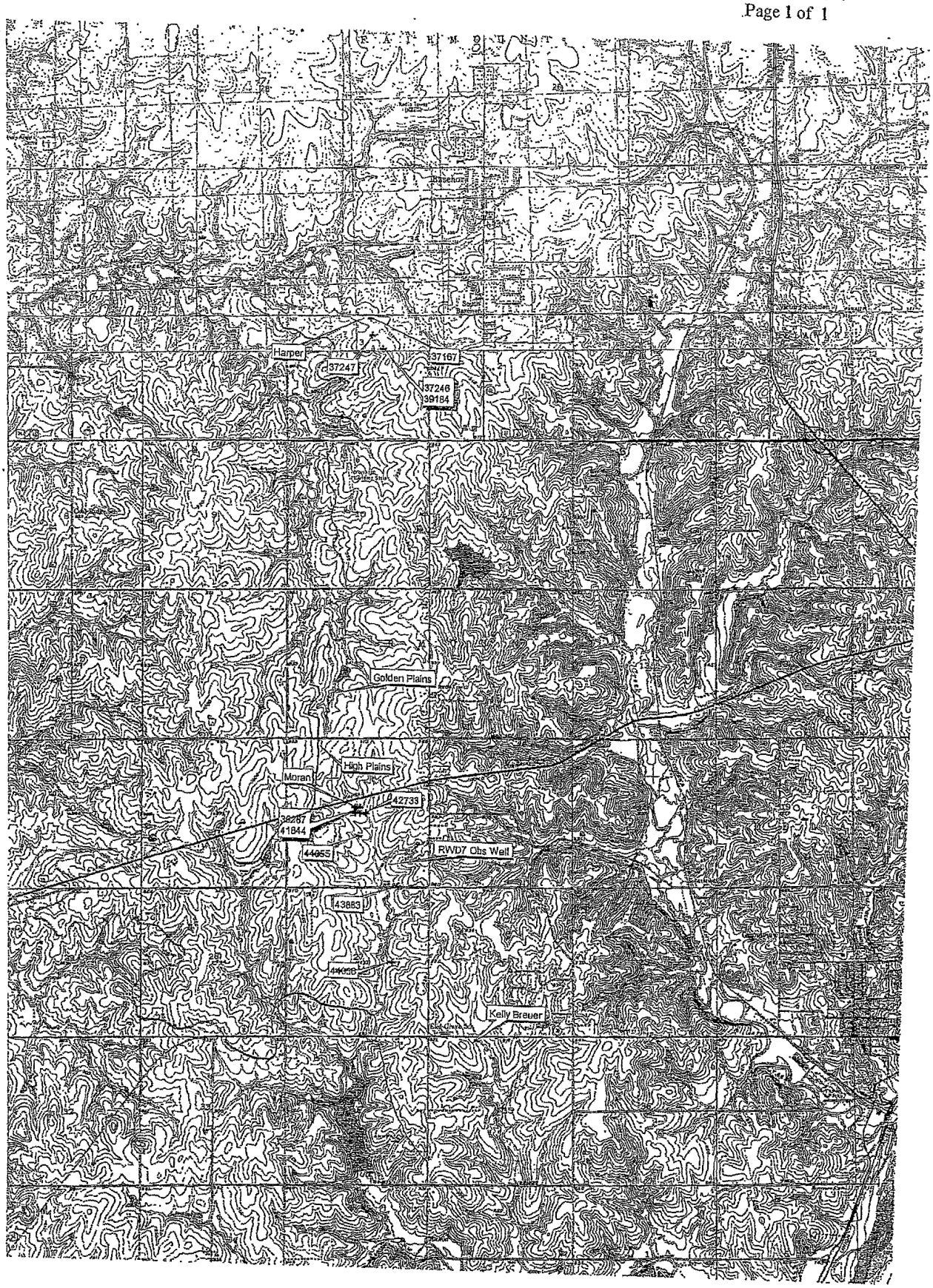
Robert L. Vincent

Robert L. Vincent, C.P.G., P.Hg.
Ground Water Associates, Inc.

pc: John Amrein, Chairman
Leavenworth County RWD No. 7

Chester A. Bender, P.E.
Ponzer-Youngquist, P.A.

RLV/av



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MEMORANDUM

TOPEKA FIELD OFFICE

TO: Files

REFERENCE: Appropriation of Water File Nos. 37,167, 37,246 and 37,247

DATE: August 24, 1995

FROM: Dale P. Mahan

The above referenced files each cover one well (total 3 wells) in the north (Harper) well field of Suburban Water Company in Leavenworth County. The south (Moran) well field (File No. 39,287) consists of a battery of three wells with a fourth well proposed to be included in the battery. File No. 39,287 is pending approval at this time.

Usage began from the north well field in 1984. This well field was the sole source for Suburban Water through 1989. In 1990 the south well field was put into service and both sources have been used since. Since the south well field went into service, production from the north well field has declined significantly. Certificates of Appropriation are being proposed for the above referenced files at this time.

One master meter accommodates all three wells in the north well field. Individual metes were not required, therefore the total from the well field is the only metered quantity available. Individual quantities have been reported for the wells for some years. However, these were estimated based on pumping time.

The time to perfect these appropriations expired December 31, 1989. 1989 is chosen as the year of record since it is the year the most water was diverted from the well field. Also, it can be determined the amounts to be certified were diverted from the wells individually based on tested rates and pumping time. It is noted the pumping rates of the wells have been physically reduced from their operating rate during the year of record. This was necessary due to a significant decline in the water table of the area because of overpumping the aquifer. This situation is improving since production began in the south well field. Mr. Raphael Bruer, President of Suburban Water Company has agreed to accept the diversion rates as determined during the field inspections conducted on June 1, 1993. He also has agreed to the quantity set forth in the tentative finding dated March 7, 1989 for the well under File No. 37,167.

Rates and Quantities

File No. 37,167

Approved - 50 GPM, 6.252 MGY
To Be Certified - 36 GPM, 2,665,800 GY
1989 hours at tested rate = 2083 x 60 x 36 = 4,449,280 Gallons

File No. 37,246

Approved - 35 GPM, 3 MGY
To Be Certified - 12 GPM, 3,000,000 GY
1989 hours at tested rate = 5522 x 60 x 12 = 3,975,840 Gallons

File No. 37,247

Approved - 35 GPM, 3 MGY
To Be Certified - 10 GPM, 3,000,000 GY
1989 hours at tested rate = 5522 x 60 x 10 = 3,313,200 Gallons

No Limitations on Rate or Quantity

DPM:plo

Ireland, Leslie

From: Tietsort, Katie
Sent: Friday, August 21, 2009 12:55 PM
To: Ireland, Leslie
Cc: Turney, Brent; Bunger, Brett
Subject: RE: Recommendation for Changes and Dismissals _ Suburban Water

Leslie,

The dismissals for File Nos. 37167, 37246, 37247, and 39184 will effectively close out all rights associated with the Harper well field. These wells had been recently abandoned from KDHE standpoint as public water supply wells and they were not pumped in 2008. The wells had gone down to a fairly small production and were located in a residential area, making it unlikely that the well field could be rehabilitated in a cost-effective manner. It is appropriate to close these out. I strongly suggest that we make it very clear in the cover letter with the documents in a paragraph that identifies that since they are now dismissed, all pumps and pumping equipment should be immediately removed from the wells and that the abandoned wells should be plugged per KDHE standards.

I agree with your recommendation that the remaining rights should have the requested change applications to add Leavenworth County RWD #6 approved, as they meet all applicable rules and regulations of the KWAA. I have to admit I am a bit baffled about the reference in your memo to KSA 82a-732 *Annual water use report required; penalty for violations*; all the documents we have here in the TFO indicate water use reports for 2008 were received on January 13, well within the allowed time. The Suburban Water Company did recently pay a civil penalty for an illegal diversion related to 2 wells and for falsifying water use reports, but not related to these files.

You mention that the City of Tonganoxie will continue to serve LV RWD #6 under LV-01 and 38,597 but that these rights aren't authorized to actually serve LV RWD 6. My understanding is that the Public Wholesale Water Supply District No. 6 (PWWSD 6) currently serves LV RWD 6, which is authorized. PWWSD No. 6 obtains water from the City of Bonner Springs and sells to LV RWD 6, LV RWD 9, and Tonganoxie. I'd like to be clear if you are aware of otherwise so that I can contact whomever is necessary to get everything properly covered.

This all looks good.
Thanks for your quick work; I know these customers appreciate it.

Katie

Katherine A. Tietsort
Water Commissioner
Topeka Field Office
Division of Water Resources
109 S. W. 9th Street, 1st Floor
Topeka, KS 66612-2216
(785) 368-8251
Fax (785) 296-4619
katie.tietsort@kda.ks.gov

"Please note that the Topeka Field Office will be moving to the Kansas Department of Agriculture Building 282 at Forbes Field later this year."

From: Ireland, Leslie
Sent: Friday, August 21, 2009 11:26 AM
To: Tietsort, Katie
Cc: Turney, Brent
Subject: Recommendation for Chagnes and Dismissals _ Suburban Water

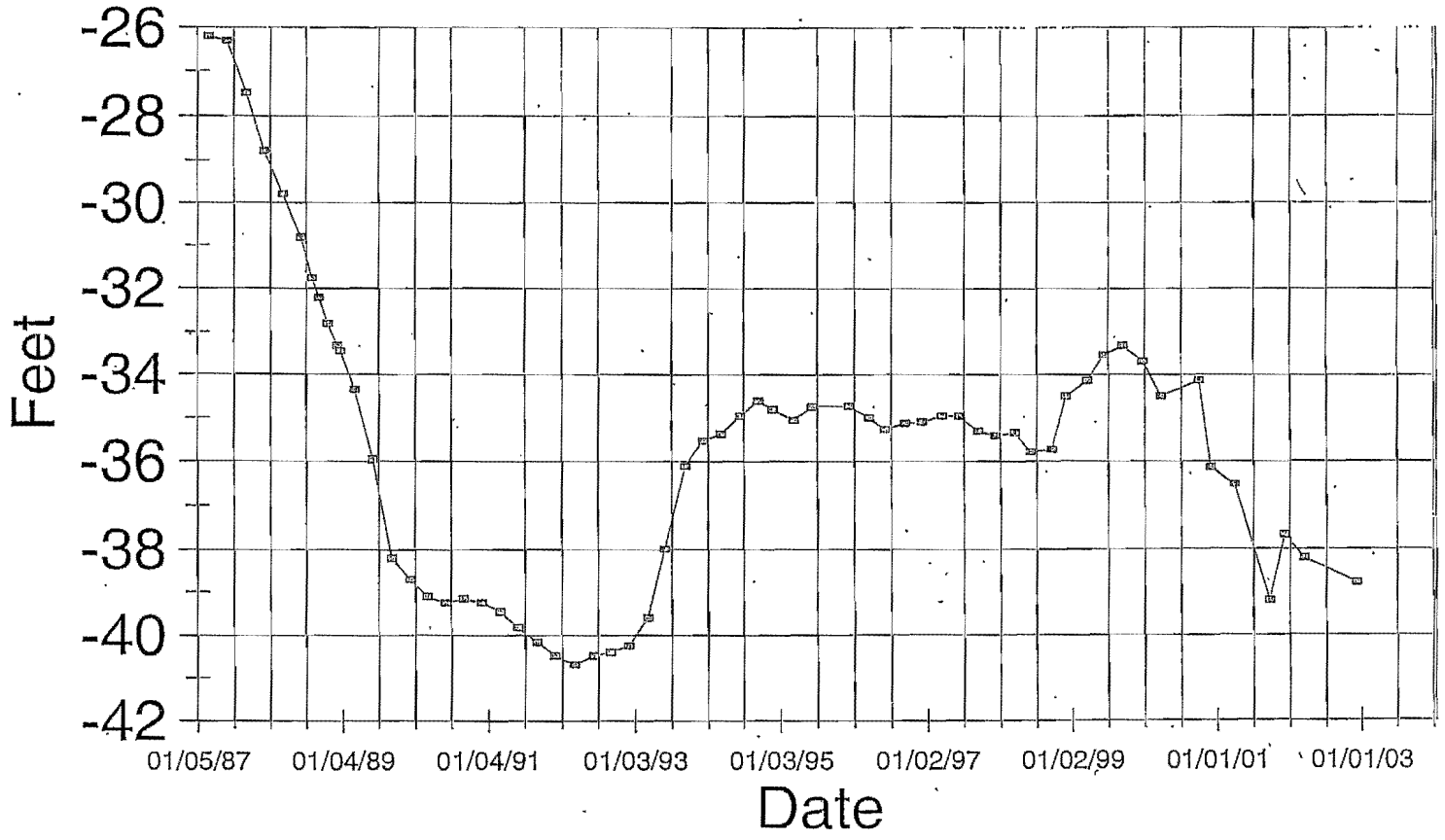
Katie,

Leavenworth County

Observation Well

Suburban Water Company

NW NW NE 3-11-22E



H:\Topeka Field Office\Water Level Measurements\Office Files\Observation Well.qpw

09-Dec-02

STATIC WATER LEVEL MASTER SHEET

TE	MONITORING WELL MORAN		MONITORING WELL HARPER	MONITORING WELL HIGH PLAINS		DUG WELL COPELAND		GOLDEN PLAINS DENNIS	
6/2/88	12-5-91	34.5	36.06	6-12-90	52.2	6-12-90	66.8		
7/3/89	1-20-92	34.9	39.6	6-14-91	53.10	6-4-91	68.5		
6/1/90			42.6						
6/4/91			43						
'/30/92		34.9	43.9		54.8	81' Deep	69.1	52' Deep	32.5
3/13/92		35.02	43.1		54.1		69.5		32.4
5/1/92		35	43.1		55.01		69.6		
8/8/92		35.06	43.07		55.04		69.9		32.8
12/1/92		36.01	43.05		55.11		70.5		33.1
6/9/93		34.11	41		55.1		70.5		32.1
8/19/93		34.7	39.05		55.05		69.1		32.04
2/8/94		34.6	38.1		54.6		69		31.1
7/6/94		34.1	37.11		54.6		69.11		
2/12/94		35.03	38		54.11		69.5		
7/15/95		36.11	37.8		55.1		70.4		
2/14/95		37.4	37.1		56.3		70.1		
6/12/96		38.9	38.4		57.4		71.11		
5/26/98		40.2	39		58.2		72.11		
7/15/99		39.3	36		57.5		72.1		
2/23/00		40.8	37.5		58.1				33.11
5/22/00		41.7	38		58.4				34
4/16/01		44.3	39.1		60.5				
6/24/02		44.1	42.01		60.7				
1/19/02		45.4			61.5				36.5

STATIC WATER LEVEL MASTER SHEET

						Taken by Water Resources
12/5/02	45.48		61.48		36.51	
DATE	MONITORING WELL MORAN	MONITORING WELL HARPER	MONITORING WELL HIGH PLAINS	Monitoring Well RWD #7	GOLDEN PLAINS DENNIS	Kelly / Breuer Well
1/7/03				26'		
1/31/03				26'.1		
2/13/03				26'.45		
2/26/03	46' 6"	42' 4"	61' 11"	26'10"	36' 10"	
6/11/03	48' 6 1/2"					
6/14/03		42' 7"	62' 10"	27' 7"	37' 5"	
7/23/03	50.63	42.95	63.12	28.42	37.59	**20.02**
8/4/03	51' 1"	43' 1 1/2"	63' 2 3/4"	28' 2 3/4"	37' 8"	
9/23/03	50' 7 3/8"	43' 3 3/4"	63' 7 1/2"	locked	37' 9 1/2"	
10/9/03	50' 9 7/16"	43' 4 3/8"	63' 9 7/16"	locked	37' 11 13/16"	
11/13/03	51' ----	43' 5"	64' 3/8"	State only	38' -----	
12/5/03	50' 1/2"	43' 6 1/2"	64' 2 5/8"	State only	38' 2 3/4"	
#7 Pumping						
1/2/04	50' 6"	43' 8"	64' 2 3/4"	State only	38" 2"	
>>>> 2/17/2004	51' 2 5/8"	43' 10 1/4"	64' 7 1/4"	State only	38' 6"	
3/2/04	51' 3 1/4"	43' 10 1/2"	64' 8"	State only	38' 7 3/8"	
4/5/04	51' 8 1/4"	43' 10 1/2"	64' 7 3/4"	State only	38' 7 3/8"	
5/7/04	52' 1 1/2"	44' 2 3/4"	64' 9"	State only	38' 8 1/2"	

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Kansas Corporation Commission
Information Request

Request No: **15**

Company Name	SUBURBAN WATER CO.	SUBW
Docket Number	11-SUBW-448-RTS	
Request Date	January 24, 2011	
Date Information Needed	February 2, 2011	

RE: Harper Well Field Production

Please Provide the Following:

Exhibit MB-3, attached to the Direct Testimony of Suburban Witness Mike Breuer, states that the Harper Well Field was abandoned in 2008 due to a decreased water table that reached a level below that of the harper wells.

1. What level are the three wells at the Harper Field drilled to?
2. What level was the water table when the field was abandoned?
3. Has Suburban determined the level of the water table at the Harper field site since the facility was abandoned? If so, what was the water table level at 2009, and 2010?
4. When was each of the wells at the field abandoned? All at once in 2008, or over time? What was the cause of each well abandonment?
5. When the well facility was abandoned, did Suburban consider drilling the wells deeper to tap into the lower water table? If so, why was this not pursued?
6. Does Suburban have plans to reopen the Harper Well Field facility at any time in the future either through deeper wells or if the water table increases at the site?

Submitted By Justin Grady

Submitted To Mike Breuer

See attached answer

If for some reason, the above information cannot be provided by the date requested, please provide a written explanation of those reasons.

Verification of Response

I have read the foregoing Information Request and answer(s) thereto and find answer(s) to be true, accurate, full and complete
and contain no material misrepresentations or omissions to the best of my knowledge and belief; and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: Gregory L Wilson

VERIFICATION OF RESPONSE

I have read the foregoing Information Request and answer(s) thereto and find the answer(s) to be true, accurate, full and complete, and contain no material misrepresentations or omissions to the best of my knowledge and belief; and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: _____

Date: February 4, 2011

Suburban Water Co.
Docket No. II-SUBW-448-RTS
KCC Information Request Answers

Request No. 15
RE: Harper Well Field Production

1 & 2

Harper Well	Depth (1985)	Static Level (1985) Depth Groundwater Encountered (feet)	Static Level (2010) Depth Groundwater Encountered (feet)
1	61	25	35
2	66	30	35
3	71	36	35

3. Yes, Suburban Water collected a static level reading on January 1st, 2009, which showed a static level of 40.8'. When the wells were plugged on April 29th, 2010 a static level reading was also taken which showed a level of 35'.

4. All of the Harper wells were shut down in January of 2008. Each of the wells were abandoned, because of the decreased water table. Suburban Water throughout the course of 2007 had replaced each of the pumps in the Harper wells, because the decreased water table caused the pumps to cavitate and burn up. With the decrease production capacity it was costing more in labor and materials to keep the wells operational than the water that was being produced was valued at.

5. Suburban Water did not consider drilling the wells deeper. Given the current status of the well field Suburban Water did not feel that there would be any water table available at a lower depth. The Harper wells were already drilled to the maximum depth that the water table would support.

6. No the wells have been plugged and are no longer in existence.

Kansas Corporation Commission
Information Request

Request No: 32

Company Name	SUBURBAN WATER CO.	SUBW
Docket Number	11-SUBW-448-RTS	
Request Date	February 8, 2011	
Date Information Needed	February 17, 2011	

RE: Follow up to DR 15

Please Provide the Following:

In response to Data Request No. 15, Suburban states that the static water level was determined to be 40.8 feet at the Harper well field on January 1, 2009. Does Suburban know what the water level was in January of 2008 when the wells were shut down? If so, please provide the readings.

Submitted By Justin Grady

Submitted To Mike Breuer

If for some reason, the above information cannot be provided by the date requested, please provide a written explanation of those reasons.

Verification of Response

I have read the foregoing Information Request and answer(s) thereto and find answer(s) to be true, accurate, full and complete
and contain no material misrepresentations or omissions to the best of my knowledge and belief; and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: _____

Date: 2/15/2011

Suburban Water Co.
Docket No. 11-SUBW-448-RTS
KCC Information Request Answers

Request No. 32
RE: Follow up to DR # 15

1. January 2008 – 43.7 feet
    a. March 20, 2008 – 42.1 feet
    b. June 10, 2008 – 42.3 feet
2. January 2009 - 40.8 feet
3. The capacity of the Harper well field had been reduced to approximately 25 gpm or 1,000,000 gallons per month.
4. Harper well field pumps were replaced multiple times at a cost approaching $1,000 per well.
5. Pumps had to operate at their lowest capacity to avoid cavitation
6. Water quality issues were introduced because of cavitation of the pumps
7. The wells were located in the middle of SWC service territory and could not be integrated into the overall distribution system without expenditures to make the water compatible with BPU water.
8. A combination of pump replacement, water quality integration costs and low production indicated purchasing water was more cost effective than continuing production of the Harper well field

DIVISION O. ATER RESOURCES— KANSAS STATE BOARD (GRICULTURE

FIELD INSPECTION REPORT

Field Office No. 1
G.M.D. No. –

☑ Full
☐ Partial
☐ Compliance Check

Test 1 of 1 diversion points. County Leavenworth

File No. 37246 Inspection Date 6-1-93 ~~Firm~~/Field Office Topeka

Current Landowner Suburban Water Company Phone No. (913) 724-1800

Address 1216 N. 155th St PO Box 147 Basehor, KS 66007

☐ Additional landowners and addresses identified in remarks section.

Water Use ( ) Domestic ( ) Industrial ( ) Irrigation (✓) Municipal ( ) Hydraulic Dredging
Classification: ( ) Recreation ( ) Stockwatering ( ) Water Power ( ) Artifical Recharge ( ) Contamination Remediation
Source: (✓) Groundwater ( ) Surface Water Basin/~~Stream~~ Stranger Creek

Authorized Point of Diversion: Lot 1 Sec. 3, T. 11, R. 22E, ID No. 02
Approximately 3280 ft. North and 1700 ft. West of SE corner of Sec. 3

Actual Point of Diversion: As authorized Sec.___, T.___, R.___
Approximately ___ ft. North and ___ ft. West of SE corner of Sec. ___
How were distances determined? measured in

"Approved" Quantity 9.21 (3 MGY) AF "Approved" Diversion Rate 35 g.p.m. (0.08 c.f.s.)

Priority Date 7-6-84 Approval Date 8-13-84 Perfection Date 12-31-89

Other applications covering land and/or point of diversion 37167; 37247; 39184; 39185; 39287. (5 WELL FIELD) (WELL 37246)
(include discussion of overlapping files in remarks section)

LAND TO BE INCLUDED ON CERTIFICATE:

S	T	R	NE¼ NE	NE¼ NW	NE¼ SW	NE¼ SE	NW¼ NE	NW¼ NW	NW¼ SW	NW¼ SE	SW¼ NE	SW¼ NW	SW¼ SW	SW¼ SE	SE¼ NE	SE¼ NW	SE¼ SW	SE¼ SE	TOTAL ACRES
	Within		the	boundaries			of		the		area		to	be	served		by		
	Suburban			Water			Company,				Leavenworth				County,			Kansas.	

LAND IRRIGATED—YEAR OF RECORD ______

S	T	R	NE¼ NE	NE¼ NW	NE¼ SW	NE¼ SE	NW¼ NE	NW¼ NW	NW¼ SW	NW¼ SE	SW¼ NE	SW¼ NW	SW¼ SW	SW¼ SE	SE¼ NE	SE¼ NW	SE¼ SW	SE¼ SE	TOTAL ACRES

TESTED DIVERSION RATES
Maximum G.P.M. 12 (c.f.s. 0.02) Normal G.P.M. 12 (c.f.s. 0.02)

FOR D.W.R. USE ONLY

Year of Record 1989 Extension of time needed: ☐ Yes ☑ No Attached? ☐ Yes ☐ No

AF Applied = ___ hrs. x ___ g.p.m. x $\frac{4.419}{24 \times 1000}$ = ___ AF

"Approved" land irrigated ___ acres, with ___ AF = ___ AF\acre

TOTAL PUMPED 5 WELLS (FILES 37167-37246-37247) 26,132,154 GAL.
9,941,077 GAL. EST PUMPED WELL UNDER #37246 YEAR OF RECORD.

Perfected Rate 12 g.p.m. (0.02 c.f.s.) Perfected Quantity 9.21 AF
3,009,000 GAL.

GENERAL INFORMATION ON IRRIGATION SYSTEM:

☐ **Center Pivot**

Manufacturer _____ Model _____ Serial No. _____

Drive: ☐ Water ☐ Electric Length of Pivot Arm _____ Acres Irr. _____

Design Pressure-Pivot _____ p.s.i. Operating Pressure-Pivot _____ p.s.i.

Is there an end gun? ☐ Yes ☐ No Is end gun operating during test? ☐ Yes ☐ No

End Gun Model _____ Rating _____ g.p.m.

☐ **Gravity Irrigation** NA

Items to be shown on sketch of system: 1) layout of pipe, 2) sizes of pipe, 3) type of pipe, 4) set which was tested, 5) test location and 6) hydrant location

Description _____

☐ **Other** Type _____

Manufacturer _____ Model _____ Serial No. _____

Unusual condition/other information

POWER UNIT INFORMATION:

Manufacturer Franklin Model — HP 1/2

Serial No. — Fuel electricity Rated RPM —

PUMP INFORMATION:

Manufacturer Grundfos Model SP6-10 No. Stages —

Serial No. — Size/Type submersible Rated RPM —

GEAR HEAD INFORMATION:

Manufacturer NA Model —

Serial No. — Drive — Ratio —

WELL INFORMATION:

Date Drilled 4-3-84 Original Depth 74 ft. Static Water Level When Drilled 29 ft.

Length of time well has ☐ operated ☐ rested prior to inspection — ☐ days ☐ hours

Is measurement tube required? ☐ Yes ☑ No Is measurement tube present? ☐ Yes ☑ No

Depth to water Could not obtain ft. below LSD.

ADDITIONAL REQUIREMENTS:

Is a flow meter required? ☐ Yes ☑ No Make of flow meter Rockwell (turbine)

Serial No. 1138777 Size 2" Flow meter conversion factor X100

Is the meter installed properly? ☑ Yes ☐ No

Distance front and back of meter: 1' front 18" back

Flow meter units: ☐ Acre-feet ☐ Acre-inches ☑ Gallons ☐ Other _____

Is check valve present? ☑ Yes ☐ No

Is low pressure drain present? ☐ Yes ☑ No Is vacuum breaker present? ☐ Yes ☑ No

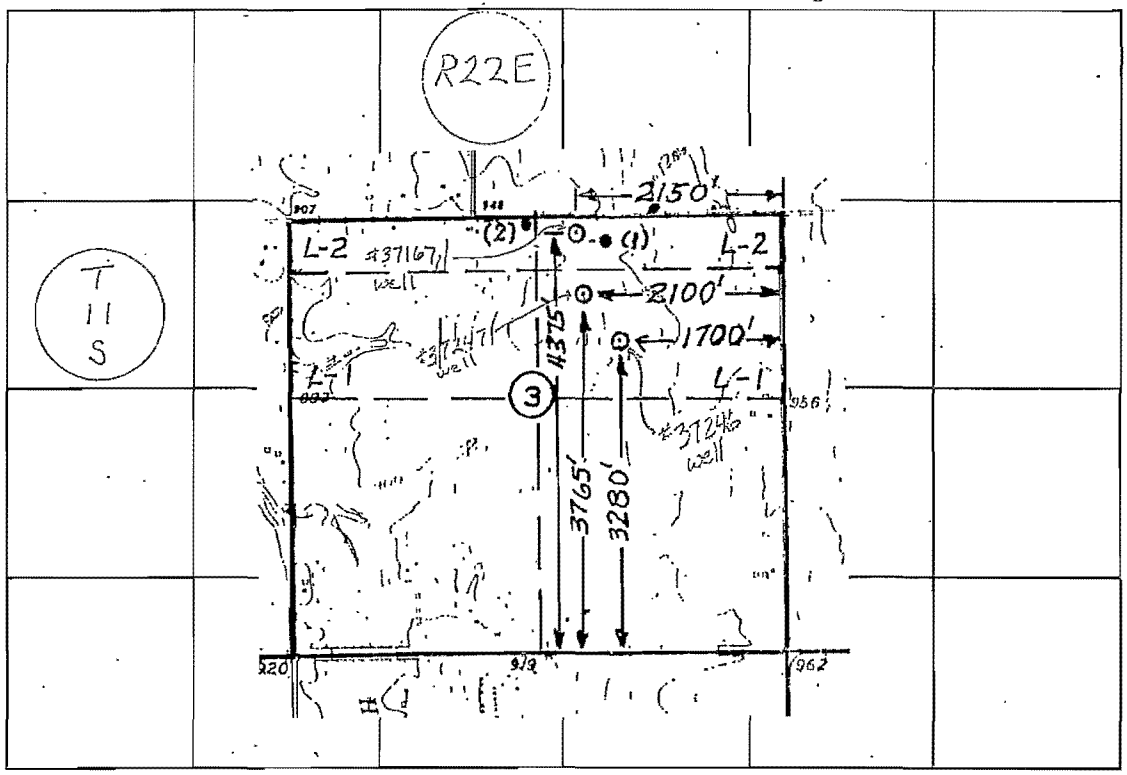
Is injection port present? ☑ Yes ☐ No 21" Is injection system being operated? ☑ Yes ☐ No

Was a Plant Health Chemigation Report completed? ☐ Yes ☑ No

File No. 37.246

SKETCH OF ACTUAL PLACE O SE, LOCATION OF DIVERSION WORKS ND DISTRIBUTION SYSTEM.
(Indicate distribution system layout at time of field test).

Docket No. 11-SUBW-448-RTS
Exhibit JTG-11
Page 3 of 5



Scale
1"= 2000 ft.

TEST OF DIVERSION RATE: Location of test Inside pumphouse
Pipe Diameter (I.D.) _____ inches

Test No. 1—Normal Conditions
R.P.M. POWER UNIT _____
R.P.M. PUMP UNIT _____
Pressure at Pump 62 psi

Test No. 2—Maximum Conditions
R.P.M. POWER UNIT _____
R.P.M. PUMP UNIT _____
Pressure at Pump _____ psi

☐ **Jacuzzi Meter Test** Meter Identification No. _____

Area Constant K = 2.45 x I.D.^{2} = _____ Q (gpm) = VK

	Velocity (fps)		Velocity (fps)	
1.				
2.				
3.				
4.				
5.				
6.				
7.				
8.				
9.				
10.				
Total				
Avg.				
G.P.M.				

RECEIVED
JAN 17 1996
DIVISION OF WATER RESOURCE
FIELD OFFICE

☐ **Propeller Meter Test** Manufacturer Rockwell Model — Serial No. 1138777
Meter Diameter 2 inches

Ending	14820860	gal.	All 3 wells on at 65 psi	Ending	14820880 gal.
Beginning	14820850	gal.	30 gallons in 35.37 sec. = 51 gpm + while during an emergency.	Beginning	14820870 gal.
Difference	10	gal.		Difference	10 gal.
Time	51	min.		Time	53.9 min.
Rate	12	gpm		Rate	11.1 gpm

☐ **Other Flow Meter** Use Supplemental Sheet (include meter identification, data and calculations).

MICROFILMED

TABULATION OF WATER USE DETERMINED AT THE TIME OF THIS REPORT:

Year	Hours Pumped (hr)	Reported Pumping Rate (gpm)	Water Used (~~AF~~) CAL.	Acres Irrigated
1984			74,105	54 connections
1985			0	110 "
1986 *	9,213,400 gal. pumped thru meter for all 3 wells		- 6,449,380 (est.)	160 "
1987	13,709,935 " "	" " " " "	- 3,000,000 (est.)	221 "
1988	20,251,040 sold by all 3 wells		- 10,795,562 (est.)	282 "
1989 *	26,132,154 gal. pumped thru meter for all 3 wells		- 9,941,077 (est.)	345 "
o 1990	8,828,300 " "	" " " " "	- ?	400 "
o 1991	8,288,300 " "	" " " " "	- ?	422 "
o 1992	5,467,650 " "	" " " " "	- ?	462 "
	this info obtained from Mr. Brewer during Field Inspection			
1993	39,770,000	Includes South well field		
o 1994	5,594,600			

o Indicates water pumped from North well field (File Nos. 37167; 37246 & 37247); a new well field was developed in 1990 and the majority of the water pumped from that field (#39287).

Indicate Year of Record with (*) Source of Information _____

Crops Irrigated: this year _____ year of record _____

FUEL RECORDS: (Complete only if water use information is not available)

☐ Electricity Supplier _____

Meter Manufacturer _____ Type _____ Serial No. _____

K _____ watt/rev r _____ revolutions t _____ seconds

Rate = $\frac{Kr \times 3.6}{t}$ = _____ kw/hr Hours = $\frac{\text{kw/hr}}{\text{rate}}$ = _____

☐ Other Fuels Type _____ Supplier _____

Rate = $\frac{\text{Volume (test)}}{\text{time}}$ = _____ kw/hr

How was the test volume determined? _____

REMARKS: This well is equipped with an hour meter but it is resettable and is not used as a totalizer but rather to monitor short term usage by the operator. This well has been the primary well used from this field for the past 1½ years during the drought.

Person present at test Raphael D. Brewer (Name) owner (relationship)

Water Use Correspondent Suburban Water Company (Name) 1216 N. 155th PO Box 147 (Address) Basehor KS 660. (phone number)

Conducted by Mahan & Askren Date 6-14-93

Approved by _____ (Signature) WC (Title) Date 8-21-95

File No. 37246

SURBAN WATER COMPANY WATER TABULATION

Year	37,167 Approved for 6.25 MGY 50 GPM Hours	37,167 Approved for 6.25 MGY 50 GPM Gallons	37,246 Approved for 3 MGY 35 GPM Hours	37,246 Approved for 3 MGY 35 GPM Gallons	37,247 Approved for 3 MGY 35 GPM Hours	37,247 Approved for 3 MGY 35 GPM Gallons	TOTAL Gallons	39,287 Gallons	GRAND TOTAL Gallons
1986	--	921,340	--	6,449,380	--	1,842,680	9,213,400	---	9,213,400
1987	2020	6,058,488	1670	3,000,000	1670	3,000,000	12,058,488	---	12,058,488
1988	--	2,025,104	--	10,935,562	--	7,290,374	20,251,040	---	20,251,040
1989	2083	6,250,000	5522	9,949,077	5522	9,941,077	26,140,154	---	26,140,154
1990			Not reported by well				8,828,300	22,496,200	31,324,500
1991			Not reported by well				8,288,800	24,590,900	32,879,700
1992							5,467,650	29,678,980	35,146,630

All South Wells

Kansas Corporation Commission
Information Request

Request No: **13**

Company Name	SUBURBAN WATER CO.	SUBW
Docket Number	11-SUBW-448-RTS	
Request Date	January 24, 2011	
Date Information Needed	February 2, 2011	

RE: Moran Well Field Production

Please Provide the Following:

Exhibit MB-2, attached to the Direct Testimony of Suburban Witness Mike Breuer, lists a total Moran Well Field production of 69,892,700 Gallons for the year 2000. Exhibit MB-3, also attached, lists a total Moral Well Field production of 60,659,179 Gallons for the year 2010. Please provide the following with regard to these figures.

1. To what does Suburban attribute this decline in production?
2. Please provide the yearly production figures for this well field from 2001-2009.
3. Has Suburban made any attempts to reclaim past production levels from this facility? If so, please provide the details of the efforts.
4. Does Suburban have any future plans to attempt to increase the production of this facility to year 2000 levels? If so, please provide the details of these plans.

Submitted By Justin Grady

Submitted To . Mike Breuer

1) The decrease in production at the Moran well field is due to a drop in the water table

2) See attached schedule

3) Suburban Water in Late 2010, replaced the well pumps in both well number 3 & 4, attempting to increase the production capacity. The wells did provide an increased in production for a short time period. However, the well field as a whole lost production. This indicates that the current production capacity of the Moran Well Field is all that the water table of the well field can support.

4) No, the well fields water table is not able to provide more production.

If for some reason, the above information cannot be provided by the date requested, please provide a written explanation of those reasons.

Verification of Response

I have read the foregoing Information Request and answer(s) thereto and find answer(s) to be true, accurate, full and complete
and contain no material misrepresentations or omissions to the best of my knowledge and belief; and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: Gregory L. Wilson

VERIFICATION OF RESPONSE

I have read the foregoing Information Request and answer(s) thereto and find the answer(s) to be true, accurate, full and complete, and contain no material misrepresentations or omissions to the best of my knowledge and belief; and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: _____

Date: February 4, 2011

Suburban Water Co.
Docket No. 11-SUBW-448-RTS
KCC Information Request Answers

Request No. 13
RE: Moran Well Field production

Moran Well Field Annual Production Schedule

Year	Production in (Gallons)
2000	69,892,700
2001	65,256,800
2002	80,751,200
2003	82,395,200
2004	64,318,000
2005	64,600,890
2006	58,805,100
2007	78,560,200
2008	61,477,100
2009	59,297,700
2010	60,659,179

Kansas Corporation Commission
Information Request

Request No: **30**

Company Name	SUBURBAN WATER CO.	SUBW
Docket Number	11-SUBW-448-RTS	
Request Date	February 8, 2011	
Date Information Needed	February 17, 2011	

RE: Moran Well Field--Follow up to DR 13

Please Provide the Following:

In response to Staff Data Request No. 13 Suburban Water provided the yearly Moran well field production levels from the year 2000 through 2010. Please provide the following with regard to this response.
In 2003 the Moran well field produced 82,395,200 gallons of water, and the static level of the water table appeared to be about 50 feet deep (Exhibit MB-4). In 2010, the Moran well field produced 60,659,179 gallons of water, and the static level of the Moran well field appeared to be just over 50 feet deep.
Given these two production levels and the static level of the water at each level, please provide a technical explanation of how the production level drop-off can be attributable to the water table depth.

Submitted By Justin Grady

Submitted To Mike Breuer

If for some reason, the above information cannot be provided by the date requested, please provide a written explanation of those reasons.

Verification of Response

I have read the foregoing Information Request and answer(s) thereto and find answer(s) to be true, accurate, full and complete
and contain no material misrepresentations or omissions to the best of my knowledge and belief; and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: _____

Date: 2/15/2011

Suburban Water Co.
Docket No. 11-SUBW-448-RTS
KCC Information Request Answers

Request No. 30
RE: Moran Well Field – Follow up to DR # 13

1. In 2003 there were 5 pumps and in 2010 there were 4 pumps
2. RWD # 7 drilled a new well approximately 640 feet from the Moran well field. That is 40 feet outside the restricted area. This well was drilled in December, 2002 and began production in 2003. See attached KGS water well record.
3. The "Cone of Depression" phenomena is also impacting the Moran field's production because of the close proximity of RWD # 7' new well.
4. Pumps must stop at least 5 feet above the bottom of the well to avoid cavitation of the pumps.
5. The well field production has decreased from 60 gpm to avoid cavitation of the remaining pumps.

Kansas Corporation Commission
Information Request

Request No: **28**

Company Name	SUBURBAN WATER CO.	SUBW
Docket Number	11-SUBW-448-RTS	
Request Date	February 8, 2011	
Date Information Needed	February 17, 2011	

RE: Decreased Water Table at the Moran Field

Please Provide the Following:

Please provide a technical explanation for how the water table at the Moran well field can affect production, if the depth of the water table remains above the level that the wells are drilled. (Reference Exhibit MB-4)

Submitted By Justin Grady

Submitted To Mike Breuer

See attached documents

If for some reason, the above information cannot be provided by the date requested, please provide a written explanation of those reasons.

Verification of Response

I have read the foregoing Information Request and answer(s) thereto and find answer(s) to be true, accurate, full and complete
and contain no material misrepresentations or omissions to the best of my knowledge and belief; and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: G Wilson

Date: 2/15/2011

Suburban Water Co.
Docket No. 11-SUBW-448-RTS
KCC Information Request Answers

Request No. 28
RE: Decreased Water Table at the Moran Field

1. See attached documents, Cone of depression, Static Level Moran Well Field

Docket No. 11-SUBW-448-RTS
Exhibit JTG-14
Page 3 of 7

Cone of depression

From Wikipedia, the free encyclopedia

A **cone of depression** occurs in an aquifer when groundwater is pumped from a well. In an unconfined (water table) aquifer, this is an actual depression of the water levels. In confined (artesian) aquifers, the cone of depression is a reduction in the pressure head surrounding the pumped well.

When a well is pumped, the water level in the well is lowered. By lowering this water level, a gradient occurs between the water in the surrounding aquifer and the water in the well. Because water flows from high to low water levels or pressure, this gradient produces a flow from the surrounding aquifer into the well.

As the water flows into the well, the water levels or pressure in the aquifer around the well decrease. The amount of this decline becomes less with distance from the well, resulting in a conical-shaped depression radiating away from the well. This, in appearance, is similar to the effect one sees when the plug is pulled from a bathtub. This conical-shaped feature is the cone of depression.

The size and shape (slope) of the cone of depression depends on many factors. The pumping rate in the well will affect the size of the cone. Also, the type of aquifer material, such as whether the aquifer is gravel, sand, silt, fractured rocks, karst, etc., also will affect how far the cone extends. The amount of water in storage and the thickness of the aquifer also will determine the size and shape of the cone of depression.

As a well is pumped, the cone of depression will extend out and will continue to expand in a radial fashion until a point of equilibrium occurs. This usually is when the amount of water released from storage equals the rate of pumping. This also can occur when recharge to the aquifer equals the amount of water being pumped.

We typically think of a cone of depression as being a circular feature surrounding the pumped well. However, aquifer characteristics can affect the shape of the cone of depression. For example, if there is a steep ground-water gradient in the area of pumpage, the cone will tend to be shorter in the upgradient direction and elongated in the downgradient direction. This is because the water is already flowing towards the well from the upgradient direction, so the cone of depression doesn't need to extend as far out to obtain water, whereas the water is flowing away from the well in the downgradient direction, so the cone of depression needs to reach further to obtain water.

The shape of the cone of depression also can be affected when the cone intersects a source of water, such as a lake or stream. In such cases, water from the lake or stream supplies water to the cone of depression and therefore the cone will not expand as far in this direction. Conversely, if the cone of depression contacts a barrier, such as massive bedrock ridge, a clay body, or the edge of the aquifer, the cone of depression will decline to greater depths in order to supply water to the well.

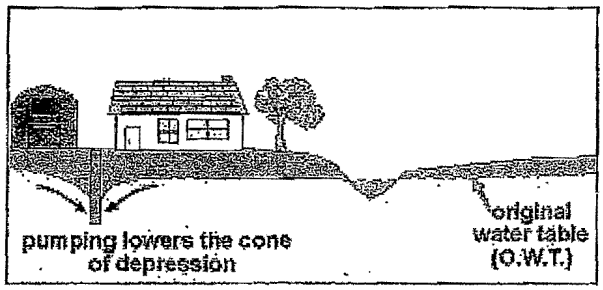
When two cones of depression intersect one another, they tend to have a combined affect on drawdown and result in water levels or pressures much lower than a single cone of depression would produce. This can be an important consideration when planning well placement and pumping rates. In the case of water supply wells, whether for domestic use or irrigation, wells typically are placed far enough apart in order to avoid intersecting cones of depression. This way, drawdown in the aquifer is minimized.

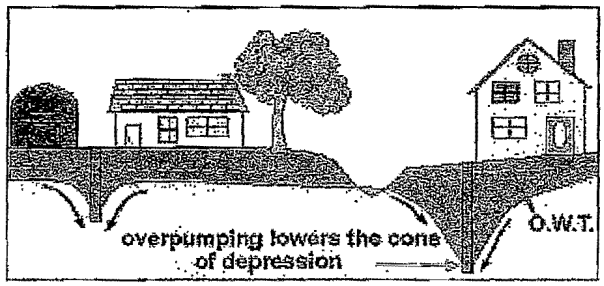
However, in the case of dewatering for mines and landfills where the goal is to lower water levels and pressures, wells often are placed close together in order to reduce head in the aquifer to the maximum amount.

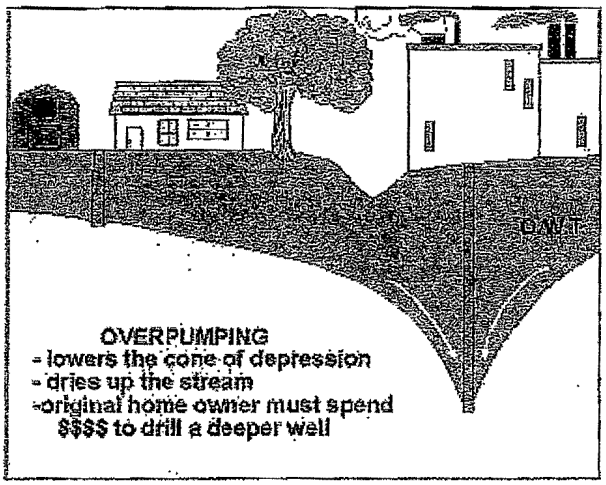
Water levels or pressures can be contoured similar to elevation on topographic maps. Contour maps often show "bulls-eyes" around pumped wells that represent the cones of depression. In huge municipal wells, these cones of depression often can extend many miles from the pumped well. For many domestic wells, the cones of depression often are too small to even show up on such maps. Again, this really depends on the rate of pumping and the aquifer material.

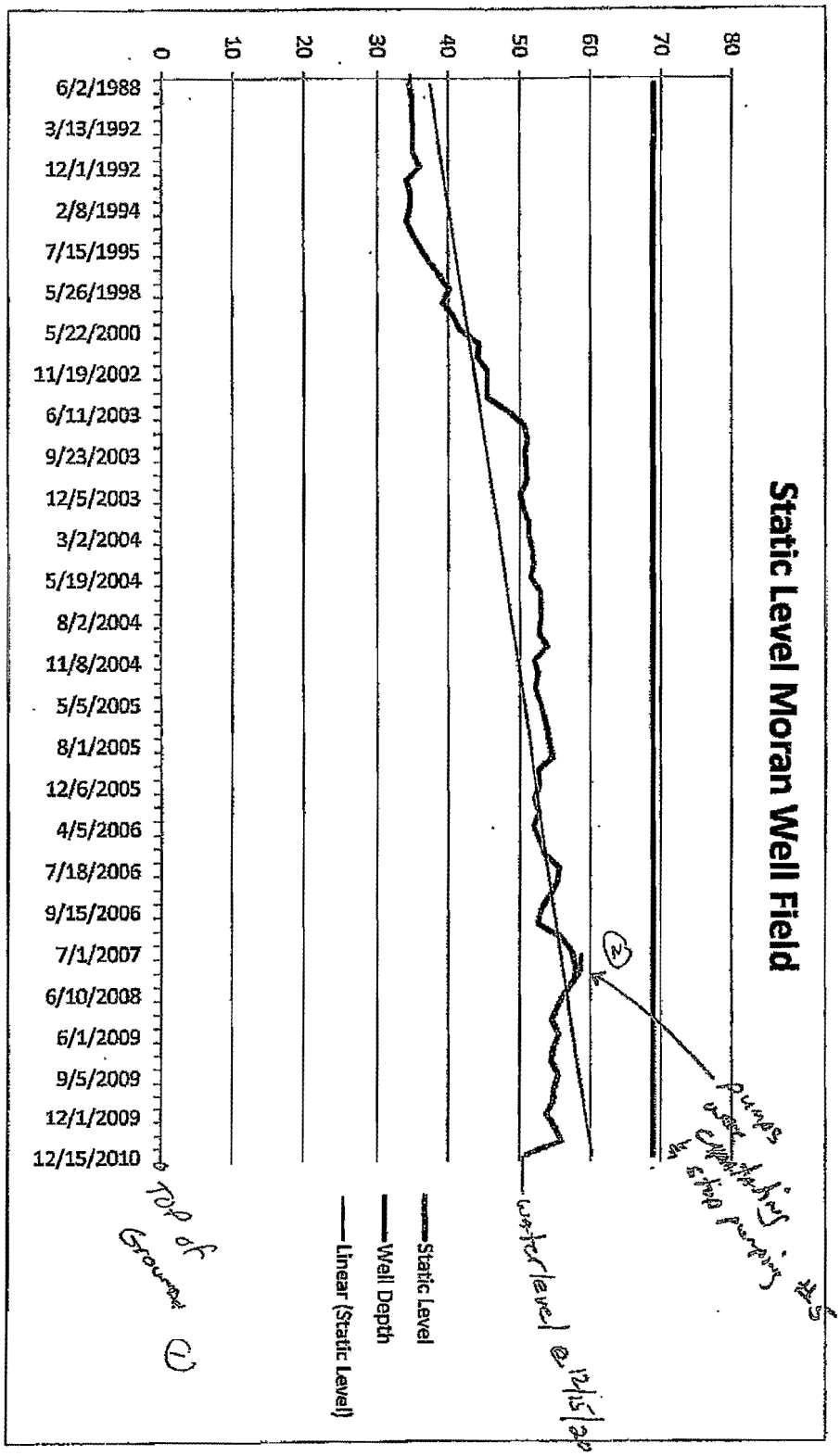
Cones of depression can be really useful when dealing with contaminant plumes in ground water. Often, a well can be placed near a contaminant plume and pumped at a sufficient rate to create a cone of depression. This cone of depression can act to capture the contaminant flow (essentially pulling it out of the aquifer). The pumped water can then be treated. The use of capture wells has been helpful in protecting water supply wells and for isolating contaminants near spills, landfills, and other sources.

References


pumping lowers the cone of depression
original water table (O.W.T.)


overpumping lowers the cone of depression
O.W.T.

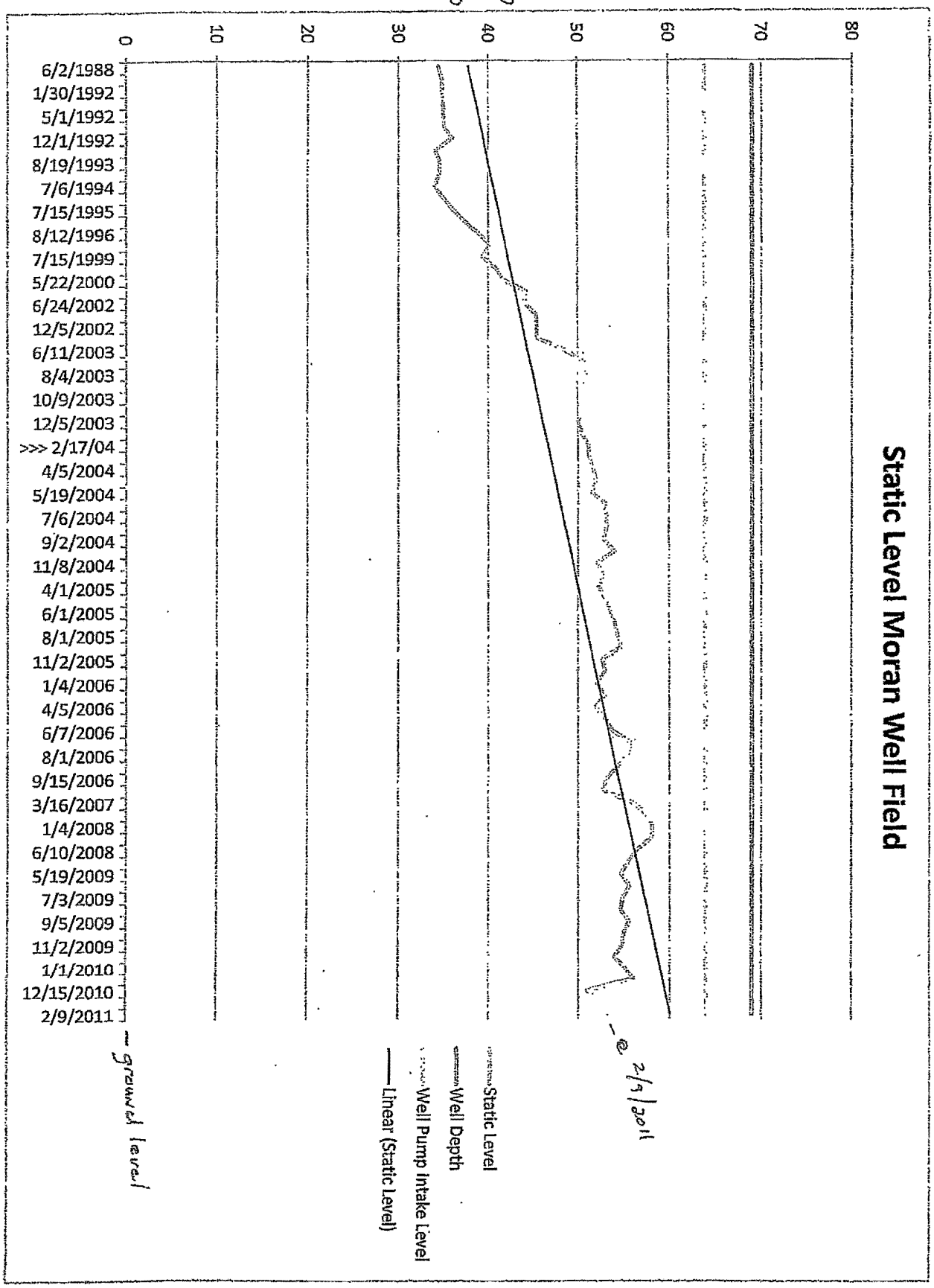

O.W.T.
OVERPUMPING
- lowers the cone of depression
- dries up the stream
-original home owner must spend $$$$ to drill a deeper well



(1) Feet below Ground

1) Need to flip the Graph

2) # 5 pump removed


Static Level Moran Well Field
feet below ground level
0
10
20
30
40
50
60
70
80
6/2/1988
1/30/1992
5/1/1992
12/1/1992
8/19/1993
7/6/1994
7/15/1995
8/12/1996
7/15/1999
5/22/2000
6/24/2002
12/5/2002
6/11/2003
8/4/2003
10/9/2003
12/5/2003
>>> 2/17/04
4/5/2004
5/19/2004
7/6/2004
9/2/2004
11/8/2004
4/1/2005
6/1/2005
8/1/2005
11/2/2005
1/4/2006
4/5/2006
6/7/2006
8/1/2006
9/15/2006
3/16/2007
1/4/2008
6/10/2008
5/19/2009
7/3/2009
9/5/2009
11/2/2009
1/1/2010
12/15/2010
2/9/2011
Static Level
Well Depth
Well Pump Intake Level
Linear (Static Level)
@ 2/9/2011
ground level

PERRY and TRENT, L.L.C.
ATTORNEYS AT LAW
144 N. NETTLETON
BONNER SPRINGS, KANSAS 66012

41,844

JOSEPH P. PERRY
DANNY C. TRENT

(913) 441-3411
FAX (913) 441-3656

January 26, 2000

Mr. David L. Pope
Chief Engineer
Division of Water Resources
Kansas State Board of Agriculture
109 SW 9th Street
Topeka, KS 66612-1280

RE: Application of Rural Water District #7,
Leavenworth County, Kansas.
Located in South ½ of Section 22, Township 11S,
Range 22E, Leavenworth County, Kansas.

Dear Sir:

This office represents Suburban Water, Inc., dba Suburban Water Company, a public utility operating a water supply system pursuant to a Certificate of Authority and Convenience issued by the State Corporation Commission in eastern portions of Leavenworth County, Kansas. Suburban derives the vast majority of its water supply for its 828 customers from ground water wells located in Section 22, Township 11S, Range 22E, in eastern Leavenworth County. Suburban is the holder of appropriation rights pursuant to Application file #41,844 issued to Suburban Water Company on the 29th day of September, 1995.

It has come to our attention that Rural Water District #7 has made application to the Division of Water Resources seeking Appropriation Rights pursuant to that application; it is further our understanding that Rural Water District #7 has drilled for a number of test wells along the southern perimeter of the requested area, within one half mile of Suburban's primary source of water.

I would first request that your office provide me a copy of Rural Water District #7's application and any accompanying documentation.

Suburban is greatly concerned with Rural Water District #7's application and its potential impairment of Suburban's senior water rights and its impact upon the subject aquifer which provides water to Suburban's customers. Suburban would therefore request a hearing to provide information and evidence to your office before any decision is made concerning Rural Water District #7's application, pursuant to K.A.R. 5-3-4a.

I would request that you forward any further correspondence with regard to Rural Water District #7's application and Suburban's request through this office. Thank you for your consideration.

Sincerely,

Joseph P. Perry
JPR/mm

c: Ray Breuer - Suburban Water, Inc.
Dale P. Mahan - Div. Of Resources
Gary Hanson - Attorney for Rural Water District #7

KANSAS DEPARTMENT OF AGRICULTURE
Division of Water Resources

MEMORANDUM

TO: Files **DATE:** November 2, 2000

FROM: Brent A Turney **RE:** Appropriation of Water
File No. 43,883

Rural Water District No. 7, Leavenworth County, has filed the above referenced application proposing to appropriate 320 acre-feet (104.27 million gallons) of groundwater at a rate not to exceed 400 gallons per minute for municipal use. The proposed appropriation is located within the Kansas River Drainage Basin. There are currently 368.27 acre-feet of groundwater appropriated within a two (2) mile radius of the Proposed point of diversion.

The referenced application will overlap in place of use with Application, File No. 43,952. The total quantity under both files will be limited to 195.51 million gallons (600 acre-feet) per calendar year.

The District's request for a total of 195.51 million gallons (600 acre-feet) was reviewed as to its reasonableness for the District's twenty (20) year projected needs. Based on projections submitted by the District the following are estimates of water needs in 20 years:

> using a historic growth rate of 5.15% the District should require a total of 817 acre-feet, using a forecasted growth based on an average number of water meters added each year, the District will require a total of 507 acre-feet. Using a high of 817 acre-feet and a low of 507 acre-feet, it appears that the requested 600 acre-feet of water is reasonable.

The requested rate of 400 gallons per minute also appears reasonable to deliver the requested quantity in a reasonable period of time.

A safe yield analysis has been prepared in accordance with K.A.R. 5-3-11 of the Rules and Regulations. Results revealed that there are 1,334.22 acre-feet of recharge due to rainfall in the 3,606 acre recharge area. With only 368.27 acre-feet appropriated under existing water rights, this leaves 965.95 acre-feet available for new appropriations. Based on these results, it appears that this application meets safe yield criteria.

The submitted water conservation plan was reviewed and found to be acceptable by Robert Lytle, Environmental Scientist, Division of Water Resources.

From the submitted test hole data the source of supply for the proposed well appears to be buried glacial deposits of the Kansasan age. The depth to static water level is 24 feet with a total saturated thickness of 63 feet.

The applicant has indicated that there are six (6) domestic wells located within one-half (½) mile of the proposed point of diversion. The owners of the domestic wells were notified by letter of the applicants intentions to appropriate water. Several responses were received, however, it does not appear that the proposed appropriation will cause direct impairment. A Theis calculation was conducted to determine what effects the pumping well will have on the nearest domestic well. Theis indicated that the drawdown produced at a point 1,200 feet from the pumping well would produce a drawdown of 3.3 feet. The calculation was run using the assumption that all of the water would be pumped in the shortest period of time, however, most municipal wells will spread the pumping out over the full 365 days in the year. Pumping in this manner should further reduce any drawdown effects at the nearby domestic wells.

Additionally, there are several municipal wells owned by Suburban Water Company, located approximately 2,950 feet from the proposed well. On January 27, 2000, we received a letter from the attorneys representing Suburban Water Company, which stated that they believed that the proposed appropriation has the potential to impair their clients senior water rights. The letter further requested that the Chief Engineer conduct a hearing on the application so that they may provide information and evidence to this office. In a letter of response dated February 3, 2000, the respondents were informed that it would be a decision of the Chief Engineer as to if a hearing would be held. Moreover, they were informed that if their client wished to provide information to the Chief Engineer regarding the Districts application, they may do so at any time prior to a final decision being made on the application. As of today's date no information to support the potential for impairment has been received from Suburban Water Company or it's attorneys. A Theis drawdown calculation was conducted to determine the effects the proposed appropriation may have on the nearby municipal wells. It was determined that the there would be approximately 1.1 feet of drawdown at the wells owned by Suburban Water Company. Suburban Water Company will be sent a copy of the approval document and will also be noted on the Certificate of Service. If objections are still evident at that time they will have an opportunity to appeal the approval through the KAPA process.

Because of the complaints from Suburban Water Company, the District has voluntarily installed an observation well between the proposed well and Suburban's wells. This observation well should provide information on the effects of groundwater pumping in the area. The existing observation well and quarterly measurements will be a condition of the permit.

MEMORANDUM
RE: FILE NO. 43,883
November 2, 2000
PAGE 3

In a telephone conversation on November 2, 2000, with Kent Askren, Acting Water Commissioner, Topeka Field Office, Mr. Askren indicated that he had no objections to the approval of the referenced application.

In accordance with K.A.R. 5-1-7, an approved water flow meter shall be installed on the diversion works. A water level measurement tube will also be required on the diversion works. If any chemical or foreign substance is injected into the water pumped under this permit, a check valve will be required.

Based on the above discussion, and that groundwater appears to be available for new appropriations, it is recommended that the referenced application be approved.

Brent A Turney
Environmental Scientist
Water Rights Section

THE STATE  OF KANSAS

KANSAS DEPARTMENT OF AGRICULTURE
Jamie Clover Adams, Secretary of Agriculture

DIVISION OF WATER RESOURCES
David L. Pope, Chief Engineer

APPROVAL OF APPLICATION
and
PERMIT TO PROCEED

(This Is Not a Certificate of Appropriation)

This document is a summary order by this agency regarding this matter. This order shall become final if a request for a hearing is not filed with the Chief Engineer within 15 days of the date of service of this order.

This is to certify that I have examined Application, File No. 43,883, of the applicant

Rural Water District No. 7, Leavenworth County
P.O. Box 257
Bonner Springs, Kansas 66012

for a permit to appropriate water for beneficial use, together with the maps, plans and other submitted data, and that the application is hereby approved and the applicant is hereby authorized, subject to vested rights and prior appropriations, to proceed with the construction of the proposed diversion works (except those dams and stream obstructions regulated by K.S.A. 82a-301 through 305a, as amended), and to proceed with all steps necessary for the application of the water to the approved and proposed beneficial use and otherwise perfect the proposed appropriation subject to the following terms, conditions and limitations:

1. That the priority date assigned to such application is September 22, 1999.

2. That the water sought to be appropriated shall be used for municipal purposes within the boundaries of Rural Water District No. 7, Leavenworth County.

3. That the authorized source from which the appropriation shall be made is groundwater from glacial deposits from the Kansan Stage, to be withdrawn by means of one (1) well located in the Southwest Quarter of the Southeast Quarter of the Southeast Quarter (SW¼ SE¼ SE¼) of Section 22, more particularly described as being near a point 65 feet North and 1,162 feet West of the Southeast corner of said section, in Township 11 South, Range 22 East, Leavenworth County, Kansas, located substantially as shown on the topographic map accompanying the application.

4. That the appropriation sought shall be limited to a maximum diversion rate not in excess of 400 gallons per minute (0.89 c.f.s.) and to a quantity not to exceed 104.27 million gallons (320 acre-feet) of water for any calendar year.

5. That installation of works for diversion of water shall be completed on or before December 31, 2001, or within any authorized extension thereof. The applicant shall notify the Chief Engineer and pay the statutorily required field inspection fee, which is currently $200.00 when construction of the works has been completed. Failure to timely submit the notice and the fee will result in revocation of the permit. Any request for an extension of time shall be submitted prior to the expiration of the deadline and shall be accompanied by the required statutory fee, which is currently $50.00.

6. That the proposed appropriation shall be perfected by the actual application of water to the proposed beneficial use on or before December 31, 2019, or any authorized extension thereof. Any request for an extension of time shall be submitted prior to the expiration of the deadline and shall be accompanied by the required statutory fee which is currently $50.00.

7. That the applicant shall not be deemed to have acquired a water appropriation for a quantity in excess of the amount approved herein nor in excess of the amount found by the Chief Engineer to have been actually used for the approved purpose during one calendar year subsequent to approval of the application and within the time specified for perfection or any authorized extension thereof.

8. That the use of water herein authorized shall not be made so as to impair any use under existing water rights nor prejudicially and unreasonably affect the public interest.

9. That the right of the appropriator shall relate to a specific quantity of water and such right must allow for a reasonable raising or lowering of the static water level and for the reasonable increase or decrease of the streamflow at the appropriator's point of diversion.

10. That this permit does not constitute authority under K.S.A. 82a-301 to 305a to construct any dam or other obstruction; nor does it grant any right-of-way, or authorize entry upon or injury to, public or private property.

11. That all diversion works constructed under the authority of this permit into which any type of chemical or other foreign substance will be injected into the water pumped from the diversion works shall be equipped with an in-line, automatic quick-closing, check valve capable of preventing pollution of the source of the water supply. The type of valve installed shall meet specifications adopted by the Chief Engineer and shall be maintained in an operating condition satisfactory to the Chief Engineer.

12. That an acceptable water flow meter shall be installed and maintained on the diversion works authorized by this permit in accordance with the Kansas Administrative Regulations 5-1-4 through 5-1-12 adopted by the Chief Engineer. This water flow meter shall be used to provide an accurate quantity of water diverted as required for the annual water use report (including the meter reading at the beginning and end of the report year).

13. That the applicant shall maintain accurate and complete records from which the quantity of water diverted during each calendar year may be readily determined and the applicant shall file an annual water use report with the Chief Engineer by March 1 following the end of each

WATER METER REQUIRED

calendar year. Failure to file the annual water use report by the due date shall cause the applicant to be subject to a civil penalty.

14. That no water user shall engage in nor allow the waste of any water diverted under the authority of this permit.

15. That failure without cause to comply with provisions of the permit and its terms, conditions and limitations will result in the forfeiture of the priority date, revocation of the permit and dismissal of the application.

16. That the right to appropriate water under authority of this permit is subject to any minimum desirable streamflow requirements identified and established pursuant to K.S.A. 82a-703c for the source of supply to which this water right applies.

17. That the proposed conservation plan submitted by the applicant shall be adopted and implemented on or before the date water is used under the authority of this permit, or in accordance with the time schedule set forth in the approved conservation plan, whichever comes later. Once implemented, the applicant shall continue to maintain the conservation plan in a manner satisfactory to the Chief Engineer. The Chief Engineer reserves the right to review the conservation plan at ten (10) year intervals to determine if it is consistent with current Kansas Water Office conservation guidelines. If it is materially different from current Kansas Water Office guidelines, then the Chief Engineer may order the permit owner to amend the conservation plan to make it consistent with current Kansas Water Office guidelines.

18. That the permit holder must submit a progress report to the office of the Chief Engineer by March 1, after the tenth year from the date of the approval of this application and permit to proceed. The progress report is to contain sufficient details to explain the extent of development (perfection) of the water right during the previous ten (10) years, the extent of population being served by the water right and how the water right, in association with any other water right(s) meets the demonstrated municipal use need.

19. That all wells with a diversion rate of 100 gallons per minute or more drilled under the authority of this permit shall have a tube or other device installed in a manner acceptable to, and in accordance with specifications adopted by, the Chief Engineer. This tube or device shall be suitable for making water level measurements and shall be maintained in a condition satisfactory to the Chief Engineer.

20. That the applicant shall install and maintain an observation well in the aquifer at the location authorized by the Chief Engineer. Such observation well shall be installed and equipped in accordance with the specifications and conditions approved by the Chief Engineer to allow the monitoring of the water level. Such observation well and the equipment required to fully equip the wells, shall be at the expense of the applicant.

21. That the observation well network shall consist of one (1) well located as follows:

one (1) well located in the Northeast Quarter of the Southwest Quarter of the Southeast Quarter (NW¼SW¼SE¼) of Section 22, more particularly described as being near a point 800 feet North and 1,550 feet West of the Southeast corner of said section, in Township 11 South, Range 22 East, Leavenworth County, Kansas.

22. That the applicant shall take water level measurements from the observation wells on or about January 1, April 1, July 1, and September 1 of each calendar year, and submit a written report to the office of the Chief Engineer no later than 30 days after this data is obtained.

23. That the expense of obtaining data required in paragraph No. 21 of this permit, and other responsibility for submitting reports thereof are to be borne by the applicant.

24. That the Chief Engineer specifically retains jurisdiction in this matter with authority to make such reasonable reductions in the approved rate of diversion and quantity authorized to be perfected, and such changes in other terms, conditions, and limitations set forth in this approval and permit to proceed as may be deemed to be in the public interest.

Dated at Topeka, Kansas, this 7th day of December, 2000.

DIVISION OF WATER RESOURCES ★ DAVID L. POPE ★ CHIEF ENGINEER ★ KANSAS DEPARTMENT of AGRICULTURE

David L. Pope, P.E.
Chief Engineer
Division of Water Resources
Kansas Department of Agriculture

State of Kansas)
) SS
County of Shawnee)

The foregoing instrument was acknowledged before me this 7th day of December, 2000, by David L. Pope, P.E., Chief Engineer, Division of Water Resources, Kansas Department of Agriculture.

DENISE J. ROLFS
Notary Public - State of Kansas
My Appt. Expires March 1, 2002

Notary Public

My appointment expires:

RECEIVED
JAN 04 2001

THE STATE OF KANSAS

KANSAS DEPARTMENT OF AGRICULTURE
Adrian J. Polansky, Secretary of Agriculture

DIVISION OF WATER RESOURCES
David W. Barfield, Chief Engineer

IN THE MATTER OF THE
PERMIT CONDITIONS UNDER
APPROPRIATION OF WATER, FILE NO. 43,883

After due consideration, the Chief Engineer, Division of Water Resources, Kansas Department of Agriculture (hereinafter referred to as the "Chief Engineer"), makes the following findings and order:

FINDINGS

1. That on December 7, 2000, the Chief Engineer approved Appropriation of Water, File No. 43,883, for permit to appropriate groundwater for municipal use, authorizing the applicant, subject to vested rights and prior appropriations, to proceed with the construction of the proposed diversion works and to proceed with all steps necessary for the application of the water to the approved and proposed beneficial use.

2. That per Paragraph No. 20 of the Approval of Application and Permit to Proceed for Appropriation of Water, File No. 43,883, the permit was issued with the condition that "the applicant shall install and maintain an observation well in the aquifer at the location authorized by the Chief Engineer. Such observation well shall be installed and equipped in accordance with specifications and conditions approved by the Chief Engineer to allow the monitoring of the water level. Such observation well and the equipment required to fully equip the wells, shall be at the expense of the applicant."

3. That per Paragraph No. 21 of the Approval of Application and Permit to Proceed for Appropriation of Water, File No. 43,883, the permit was issued with the condition that "the observation well network shall consist of one (1) well located as follows:
   One (1) well located in the Northeast Quarter of the Southwest Quarter of the Southeast Quarter (NE1/4 SW1/4 SE1/4) of Section 22, more particularly described as being near a point 800 feet North and 1550 feet West of the Southeast corner of said Section, in Township 11 South, Range 22 East, Leavenworth County, Kansas."

4. That per Paragraph No. 22 of the Approval of Application and Permit to Proceed for Appropriation of Water, File No. 43,883, the permit was issued with the condition that "the applicant shall take water level measurements from the observation well on or about January 1, April 1, July 1, and September 1 of each calendar year, and submit a written report to the office of the Chief Engineer no later than 30 days after this data is obtained."

5. That per Paragraph No. 23 of the Approval of Application and Permit to Proceed for Appropriation of Water, File No. 43,883, the permit was issued with the condition that "the expense of obtaining data required in paragraph No. 21 of this permit, and other responsibility for submitting reports thereof are to be borne by the applicant."

6. That the observation well required by Paragraph No. 20 at the location specified in Paragraph No. 21 has been reported as dry since 2004 in the data submitted per Paragraph No. 22.

7. That concerns about the safe yield of the aquifer to produce the quantity authorized to the production well under the Approval of Application and Permit to Proceed for Appropriation of Water, File No. 43,883, have not been resolved, therefore the Chief Engineer has determined that a replacement observation well must be installed to meet the requirements of Paragraph Nos. 20, 21, 22, and 23 of the Approval of Application and Permit to Proceed for Appropriation of Water, File No. 43,883.

8. That a suitable location for a new observation well to be specified in Paragraph No. 21 has been identified by the Chief Engineer as a network consisting of one (1) well located as follows:
   One (1) well located in the Southwest Quarter of the Southeast Quarter of the Southeast Quarter (SW1/4 SE1/4 SE1/4) of Section 22, more particularly described as being near a point 132 feet North and 1288 feet West of the Southeast corner of said Section, in Township 11 South, Range 22 East, Leavenworth County, Kansas."
   The replacement observation well must be in place by January 4, 2010 and the first data should be obtained by that date.

9. That the Paragraph Nos. 20, 22, and 23 will remain in effect with no revision necessary.

10. That these revised permit conditions are consistent with the intention of the original Approval of Application and Permit to Proceed issued by the Chief on December 7, 2000.

ORDER

NOW, THEREFORE, It is the decision and order of the Chief Engineer, Division of Water Resources, Kansas Department of Agriculture, that effective the date of this order, Appropriation of Water, File No. 43,833 is conditioned as follows:

20) That the applicant shall install and maintain an observation well in the aquifer at the location authorized by the Chief Engineer by January 4, 2010. Such observation well shall be installed and equipped in accordance with specifications and conditions approved by the Chief Engineer to allow the monitoring of the water level. Such observation well and the equipment required to fully equip the wells, shall be at the expense of the applicant.

21) That the observation well network shall consist of one (1) well located as follows:
   One (1) well located in the Southwest Quarter of the Southeast Quarter of the Southeast Quarter (SW1/4 SE1/4 SE1/4) of Section 22, more particularly described as being near a point 147 feet North and 1288 feet West of the Southeast corner of said Section, in Township 11 South, Range 22 East, Leavenworth County, Kansas.

22) That the applicant shall take water level measurements from the observation well on or about January 1, April 1, July 1, and September 1 of each calendar year, and submit a written report to the office of the Chief Engineer no later than 30 days after this data is obtained."

23) That the expense of obtaining data required in paragraph No. 21 of this permit, and other responsibility for submitting reports thereof are to be borne by the applicant."

In all other respects, the approval of Appropriation of Water, File No. 43,833, for permit to appropriate water for beneficial use, is as stated and set forth in the Approval of Application and Permit to Proceed dated December 7, 2000.

This is a final agency action. If you choose to appeal this decision or any finding or part thereof, you must do so by filing a petition for review in the manner prescribed by the Kansas Act for Judicial Review and Civil Enforcement of Agency Actions (KJRA K.S.A. 77-601 et seq.) within 30 days of service of this order. Your appeal must be made with the appropriate district court for the district of Kansas. The Chief Legal Counsel for the Kansas Department of Agriculture, 109 SW 9th Street, 4th Floor, Topeka, Kansas 66612, is the agency officer who will receive service of a petition for judicial review on behalf of the Kansas Department of Agriculture, Division of Water Resources. If you have questions or would like clarification concerning this order, you may contact the Chief Engineer.

Dated at Topeka, Kansas, this 25th day of June, 2009.

Lane P. Letourneau

Lane P. Letourneau, L.G.
Water Appropriation Program Manager

State of Kansas }
County of Shawnee } SS

The foregoing instrument was acknowledged before me this 25th day of June, 2009, by Lane P. Letourneau, L.G., Water Appropriation Program Manager, Division of Water Resources, Kansas Department of Agriculture.

AMANDA HUNSAKER
NOTARY PUBLIC
STATE OF KANSAS
MY COMMISSION EXPIRES
March 19, 2013

Amanda Hunsaker
Notary Public

CERTIFICATE OF SERVICE

On this 26th day of June, 2009, I hereby certify that the foregoing Findings and Order, File No. 43,833, dated June 25, 2009 was mailed postage prepaid, first class, US mail to the following:

LEAVENWORTH RWD 07
PO BOX 257
BONNER SPRINGS KS 66012

Amanda Hunsaker
Division of Water Resources

RECEIVED
JUN 30 2009

File No. 43883
& 39287, 41844
42733

DONALD L. PITTS
Attorney at Law
dpitts@lawyers.com

Telephone (913) 484-2697

Fax (913) 685-8797

December 17, 2002

Docket No. 11-SUBW-448-RTS
Exhibit JTG-19
Page 1 of 2

Ms. Iona Branscum
Topeka Field Office
Kansas Department of Agriculture
109 SW 9th Street, 1st Floor
Topeka, Kansas 66612-2216

Re: RWD#7 – Well development

Dear Iona:

Thank you for taking the time to visit last week concerning the active well development Rural Water District No. 7 (RWD #7). As expressed in our meeting, Suburban Water Company's (Suburban) has very grave concerns regarding possible impairment of it's water rights by the well currently being developed to the southeast of and in the same formation as Suburban's well field. Based on the data provided to you at our meeting, the water table in the source formation appears to be gradually declining and the levels of nitrate and nitrite in the source water are increasing. In addition the well being developed by RWD #7 is located closer than other monitoring wells which have shown significant declines in the water table over the past few years.

It is my understanding that a Permit to Proceed was issued to RWD #7 requiring one monitoring well between Suburban's well field and the new well being developed by RWD #7. We are concerned that drilling and construction of the well is proceeding forward without the benefit of the monitoring well to establish a baseline level. Also, we feel that one monitoring well is insufficient to properly monitor the effects of pumping by the RWD #7 well.

Suburban's well field is the sole production source of water for all of Suburban's customers. Any impairment of production from that well field can have seriously affect Suburban's ability to provide the service to its customers required under Suburban's franchise with the Kansas Corporation Commission (KCC). (I have copied Mr. Pat Renner of the KCC with this letter so that he is aware of these concerns.)

On behalf of my client; I respectfully ask that the Chief Engineer require RWD #7 to drill an additional monitoring well spaced one-half of the distance between the currently required monitoring well and the Suburban well field. This data is necessary to monitor the effect of the new well on the water table and identify a prospective impairment before critical impact. In conjunction with the above request we would also ask that RWD #7 not be allowed to pump from its new well until such time as both monitoring wells are in place and a measure of the existing

Angel Berry Business Park
Luxemburg Office Center - Suite 100
6800 107th Street
Overland Park, Kansas 66212

water table, nitrate and nitrite levels are taken to establish a baseline from which to measure the effect of pumping by the new well.

Thank you for your attention to this matter. I look forward to visiting with you further regarding our concerns.

Very truly yours,

Donald L. Pitts

Enclosure
cc: Mr. Michael Breuer
Mr. Pat Renner

file in 44055 and 43883

Ground Water Associates, Inc.

610 N. MAIN, P.O. BOX 3834 • WICHITA, KANSAS 67201 • 316-262-3322

January 15, 2004

Douglas E. Bush, Environmental Scientist
Division of Water Resources
109 SW 9th Street, 2nd Floor
Topeka, Kansas 66612

Subject: Application File No. 44055
Suburban Water Company

Dear Mr. Bush,

This letter is written on behalf of Leavenworth County RWD No. 7 and specifically their Well No. 1 which is covered by file No. 43883. I am serving as the District's agent in this matter.

Most of the water production in this area comes from glacial deposits in sediment filled valleys. In this situation, the channel appears to run from the north-northwest to south-southeast. And although the sands and gravels are fairly productive, the valley itself is not very wide, and this limits water production from any one area.

The valley appears to be approximately 1500 to 1600 feet wide at the static water level, but the deeper portion of the channel appears to be no more than about 200 feet wide based on our surface observations and the limited test hole drilling conducted by the District. The pumping test that was run on Well No. 1 shows a transmissivity (T) in the 30,000 to 40,000 g/d/ft range, but when the valley wall is encountered, the well production is reduced significantly. Because of this factor the District reduced the size of their pump installed in Well No. 1 to a unit that will yield in the 200 to 250 gpm range. We have some concern that another pumping center (File No. 44055) directly to the northwest could cause an impairment problem for the District's well.

The center point of the four well battery (File No. 44055) is to be located at a point that is 1860 feet northwest of the District's well, and this means that one of the wells could be within 1560 feet. We recognize that these distances meet your requirements, but due to the limited size of the aquifer, the possibility exists that some well interference may occur. The District was required to install an observation well 769 feet to the northwest of their well, and this will provide some protection from the proposed new pumping center. However, if DWR approves the new application, we believe that Suburban Water Company should be required to install another observation well between their closest well and the District's observation well. In this manner, the problem solving (if one develops) will be facilitated.

Please contact us if we need to elaborate on any of the points covered in this letter.

Very truly yours,

Robert L. Vincent

Robert L. Vincent, C.P.G., P.Hg.
Ground Water Associates, Inc.

pc: John Amrein, Chairman
Leavenworth County RWD No. 7

Chester A. Bender, P.E.
Ponzer-Youngquist, P.A.

RLV/av

File No. 39287, 41,844
42,733 & 43,883

SUBURBAN WATER, INC.

SUBWATERCO@SUBWATERCO.COM
1316 N. 155TH STREET, P.O. BOX 147
BASEHOR, KS 66007
TELEPHONE 913-724-1800 FAX 913-724-1505

Docket No. 11-SUBW-448-RTS
Exhibit JTG-21
Page 1 of 2

May 7, 2004

Iona Branscum
Water Commissioner
Kansas Department of Agriculture
Division of Water Resources
109 SW 9th Street, 1st Floor
Topeka, KS 66612-2216

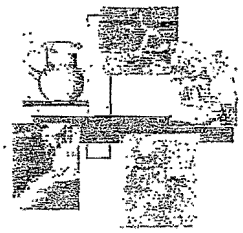
RE: Moran Wells #1 and #5

This letter as of this date is for the department's information regarding Leavenworth County Water District #7 and Moran Well Field.

Please be informed that on April 21, 2004, on Moran Well #1 we pulled a 7.5 hp pump which was producing 78 gpm at pressure and replaced it with a 5 hp unit producing 45 gpm at pressure. At this time this well was producing between 50 to 55 gpm.

Regarding Moran Well #5, on April 27, 2004 we pulled a 7.5 hp unit producing 78 gpm and replaced it with a 3 hp unit producing 30 gpm. This well was producing 50 to 54 gpm. The static level as of this date is 52' 1 ½" from top of casing.

This is exactly what I feared would happen when Leavenworth County District #7 began pumping. I do not understand why the District #7 Board decided to drill their well so close when they could have drilled an even better well a mile south. But if you hire an expert, this is what he advises.



SUBURBAN WATER, INC.
SUBWATERCO@SUBWATERCO.COM

Iona Branscum
Water Commissioner
Kansas Department of Agriculture
May 7, 2004

At the Jim Kelly residence, a dug well has always had approximately 4 to 5 feet of water in it and has had since we started pumping our wells in June 1988, approximately 16 years. But when District #7 starts pumping, it quickly breaks suction. The actions of District #7 are beginning to affect the pumping capabilities of Suburban Water Company and we ask that the department take a serious look at what District #7 is pumping take the necessary action to elevate the situation and if necessary take immediate action.

Please keep us advised and if necessary we would like to propose a meeting with the department.

Sincerely,

Raphael D. Breuer

Raphael D. Breuer
President

KANSAS DEPARTMENT OF AGRICULTURE

Docket No. 11-SUBW-448-RTS
Exhibit JTG-22
Page 1 of 2

Impairment Complaints

A founding principle of Kansas water law is first in time, first in right. That means water rights are assigned a priority date to establish who has first right to water. This allows the Division of Water Resources to protect a sometimes scarce water resource for those who established their rights first from than those who came along later.

In times of plenty, there may be enough water to satisfy all water rights. However, in times of water scarcity, those who have earlier, or more senior, water rights are entitled to satisfy those rights before those who have rights junior to them. The procedures for distributing water between users when a more senior right is being impaired are outlined in Kansas law (K.S.A. 82a-706b) and regulations (K.A.R. 5-4-1).

Fact Sheet - Investigating Impairment Complaints

Steps to an Impairment Complaint

First, if a water right holder believes that his or her water right is being impaired by water use related to a newer water right, he or she must file a written complaint with the chief engineer, or an authorized representative of the chief engineer. That usually is the water commissioner in charge of the field office that serves the area where the water rights are held by the complainant. Examples of typical impairment complaints are:

- surface water from a stream is not reaching a senior water right holder because of an upstream diversion by a junior water right;
- a well authorized by a senior water right is not able to pump a sufficient amount of water to satisfy that right because of significant impacts due to pumping at one or more nearby wells authorized by junior water rights.

Second, an investigation of the physical conditions involved is conducted by the chief engineer or his/her authorized representative. Sometimes physical conditions are easily ascertained, such as a junior, upstream water right preventing water from flowing downstream to a senior water right. At other times, particularly in cases involving wells, more extensive investigation may be needed. In these cases it may be necessary to:

- evaluate the condition of the complainant's well and pump system to determine if those are functioning properly and if the well is fully penetrating the aquifer;
- conduct pumping tests to determine aquifer properties;
- measure drawdown at the complainant's well and at nearby wells to determine the effects of their pumping.

Investigations often involve installation of equipment such as pressure transducers to measure water levels and data loggers to record water level measurements and pumping rates. It may be necessary to take measurements over one or more pumping season and to analyze the data to determine whether a right is being impaired.

Determining whether a right is being impaired is done on a case-by-case basis examining the physical conditions present and the water rights involved. Ultimately it comes down to whether the complainant with the senior water right can have that right satisfied by regulating junior water rights.

Third, a written investigation report is given to the complainant. The report indicates whether the investigation results substantiate the impairment claim. The complainant will be told if the investigation indicates that the impairment is not occurring, or if regulating junior rights will not provide any relief to the complainant.

Fourth, if the report indicates that regulating junior water rights will provide relief to the complainant, and if the complainant desires such regulation to occur, the complainant must make a written request to secure water to satisfy his or her prior right.

Fifth, the chief engineer, or his or her authorized representative, issues written legal notice and directive to other water users whose water use must be regulated so the complainant's prior rights may be satisfied. When the quantity of water needed by the complainant has been delivered to his or her point of diversion (surface water intake, well, dam, etc.), or when the complainant discontinues his or her water use, water right holders whose water use was curtailed are allowed to resume using water. Likewise, if the water source should increase, the chief engineer, or his or her authorized representative, may allow some or all of the regulated junior water rights to resume use if it will not impair the senior water right.

An alternative to regulating junior water rights is for the impaired water right holder and impairing water right holder(s) to work out a mutually acceptable arrangement, such as rotating water use or other acceptable measures. Facilitated mediation is available through the Kansas Water Office to assist individuals seeking to resolve water disputes and achieve mutually acceptable outcomes.

Page last updated August 21, 2009

109 SW 9th Ave Topeka, KS 66612 -PH: 785 296 3556

KANSAS DEPARTMENT OF AGRICULTURE

FACT SHEET

Kansas Department of Agriculture • 109 SW 9th Street • Topeka, KS 66612 • (785) 296-3556 • www.ksda.gov/dwr

April 2009

Investigating Impairment Complaints

Impairment Defined

Merriam-Webster's online dictionary provides a single definition for the word impairment. It is "to damage or make worse by or as if by diminishing in some material respect." It lists the word "injure" as a synonym.

The Kansas Water Appropriation Act and regulations do not formally define impairment, but variations of the words impair and impairment appear 15 times in the act and 53 times in the regulations. What's even more interesting is that the main statutory authority for the chief engineer to administer water rights to address impairment (K.S.A. 82a-706b) does not use the word impair or impairment at all. Instead, it phrases it in terms of unlawful diversion and preventing water from moving to a person having a prior right to its use.

Based on this statutory and regulatory context, some general conclusions can be drawn about the nature of impairment:

- Impairment usually refers to a condition caused when water diverted under one or more junior (newer) water rights reduces the quantity or quality of water available to one or more senior (older) water rights to an extent that the senior water right(s) cannot be satisfied.
- New water rights are prohibited from causing the following at an existing water right point of diversion: unreasonable raising or lowering of the static water level; unreasonable increase or decrease of streamflow; or unreasonable deterioration of water quality beyond a reasonable economic limit. "Unreasonable" and "reasonable" are not defined or quantified, and may vary under different circumstances.
- Changes to a water right's point of diversion, place of use, or use made of water are prohibited from impairing existing water rights, even if the changed water right is senior to the water right that would be impaired.

Impairment Complaint

The statutes and regulations outline a procedure for dealing with impairment:

1. Complainant files a written complaint.
2. Chief engineer investigates the complaint.
3. Chief engineer issues a report.
4. Complainant has the option to file a request to secure water.
5. If the request to secure water is filed and justified, chief engineer administers other water rights as necessary to provide water to the senior water right.
6. Chief engineer ceases administration when the impairment condition is no longer occurring.

Over the last year, the agency and stakeholders have considered ways to increase stakeholder participation in impairment claims, especially in the groundwater setting. Draft regulatory amendments have been prepared which would affect the following provisions:

- Opportunities for groundwater management districts to comment and help with impairment investigations within their districts.
- Requirements for complainants with nondomestic water rights to provide information showing that their pump system and well are adequate.
- Cost recovery up to a certain limit from nondomestic complainants whose impairment claims are determined to be unfounded.

As of April 2009, when this summary was written, these regulatory amendments were pending review by the Kansas attorney general's office.

Portrait of an Impairment Investigation

The previously mentioned regulatory amendments stemmed in large measure from an impairment claim in Stevens County that resulted from interference between irrigation wells owned by Matt Mills and Jim Gooch. (Doug Mills' wells were also found to be causing some interference, but because his water rights are senior to Mr. Gooch's second water right, and because Mr. Gooch's senior water right was exhausted prior to the point of administration, Doug Mills' water rights were not administered in 2008.)

During the summer of 2008, the chief engineer directed Matt Mills to cease pumping for about nine days in August due to significant reductions in Mr. Gooch's ability to satisfy his water right. This occurred after Matt Mills had already pumped 86.2% of his authorized quantity. By the end of the 2008 irrigation season, Matt Mills had pumped 90.4% (226 acre-feet) of his authorized quantity (250 AF). Mr. Gooch pumped 92.7% (419 AF) of his authorized quantity (452 AF) in 2008.

Some people expressed concern about this water right administration:

- It is a dispute between neighbors and should not involve the state.
- The state should not administer water rights based on rate reductions.

- Lots of other irrigators deal with rate reductions, either by adjusting their practices or revving up their engines.
- The motor of Mr. Gooch's pump system is not powerful enough.
- This impairment claim could have a cascading effect and spread throughout the region.
- The state should not curtail irrigation for a corn crop (Matt Mills' crop) to supply water to a field of forage grass (Mr. Gooch's crop).

The chief engineer's actions were based on factual data from the investigation:

- Pressure transducers and rate loggers installed in Mr. Gooch's production well, an observation well on his property and in Matt Mills' well showed that there was a significant and fairly immediate reduction in water availability at Mr. Gooch's well when Matt Mills exercised his water right.
- This reduction became acute in late summer, when Mr. Gooch's crops urgently needed water.
- Well logs showed that the two production wells share a relatively thin productive zone near the bottom of each well.
- The well logs also showed that the aquifer is less productive at Mr. Gooch's well than at Matt Mills' well.
- The Kansas Water Appropriation Act specifies that priority in time establishes the right to use water, not the type of crop irrigated.
- Jim Gooch's second water right, File No. 40,578 (priority date Feb. 3, 1992) is senior to Matt Mills' water right, File No. 44,593 (priority date May 26, 2001).
- Unlike many other wells in the Ogallala, these wells are screened in a confined zone and the reduction in water availability does not appear to result from regional lowering of the water table but rather from direct well-to-well interference.
- Mr. Gooch made reasonable adjustments to his pump system, including lowering the pump in the well and adjusting gear ratios, to improve his ability to capture the available supply.

Mr. Gooch again filed a request to secure water in 2009, in anticipation of shortages later in the irrigation season. The chief engineer and his staff carefully reviewed the additional available data from 2008 to determine how administration should occur in 2009.

While each water right obtained most of its water in 2008, records show that maximum pumping depths declined approximately 50 feet from 2007 to 2008 and approximately 100 feet since 2005. As a result, on April 22, 2009, the chief engineer made the following conclusions and orders for administration in 2009:

- There appeared to be adequate supply for Mr. Gooch and Matt Mills to each mostly satisfy their water rights.
- Conservation practices, including irrigation scheduling, would be required of both Mr. Gooch and Matt Mills to make the best use of the shared supply without water waste.
- In addition, to secure water for the senior water right, the chief engineer is limiting Matt Mills' water use to 80% of his authorized quantity in 2009.
- Mr. Gooch should examine whether his pump system, including the motor and gear assembly, could be further adjusted or upgraded to deliver more of the available supply
- Matt Mills should seek to avoid or minimize his impacts on Mr. Gooch's ability to satisfy his water right to avoid or minimize administration of his (Matt Mills') water right
- The chief engineer and his staff continue to monitor this site using pressure transducers and rate loggers with telemetry to post nearly real-time results on a website and through site visits as well.
- The real-time monitoring data shows water levels at their wells and pumping rates and times are available to Mr. Gooch and Matt Mills to inform their decisions on how much water to apply and when.
- Following the conclusion of the 2009 irrigation season, the Division of Water Resources will review the data to determine next year's administration; if pumping water levels continue to decline, further reductions in Mr. Mills' pumping may be required.

The Gooch-Mills site is but one of a number of ongoing impairment investigations throughout the state.

From 2006 to 2008, 28 impairment claims were filed with the Kansas Department of Agriculture's Division of Water Resources. Most were in north-central Kansas. Sixteen were groundwater claims and 12 were surface water claims. Of the 28 claims, 12 were determined to be impairment, 14 were determined to not be impairment, and two are pending further investigation. In all, there are about two dozen impairment claims in various stages of investigation throughout the state.

K.A.R. 5-4-1. Distribution of water between users when a prior right is being impaired.

In responding to a complaint that a prior water right is being impaired, the following procedure shall be followed:

(a) Complaint. The complaint shall be submitted in writing to the chief engineer or that person's authorized representative. The chief engineer shall take no action until the written complaint is submitted and, for non-domestic groundwater rights, the information specified in paragraph (b)(2) is provided.

(b) Investigation. The chief engineer shall investigate the physical conditions involved, according to the water rights involved in the complaint.

(1) If the water right is domestic, the chief engineer may require the complainant to provide a written report similar to that described in paragraph (b)(2).

(2) If the water right claimed to be impaired is not a domestic right and its source of water is groundwater, the complainant shall provide to the chief engineer a written report completed within 180 days preceding the date of the complaint. Within 30 days of the complainant's request, the chief engineer shall provide the complainant with data from the division of water resources that is relevant to preparation of the required report. The complainant's report shall meet the following requirements:

(A) Be prepared by a licensed well driller, a professional engineer, or a licensed geologist;

(B) describe the construction and the components of the well;

(C) provide data to show the extent to which the well has fully penetrated the productive portions of the aquifer with water of acceptable quality for the authorized use; and

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(D) provide testing and inspection data to show the extent to which the pump and power unit are in good working condition to make full use of the available aquifer.

(3) In assessing the complainant's written report, the chief engineer may use all relevant data, including historical data from water well completion records, Kansas geological survey bulletins, and other data in the water right files.

(4) If the area of complaint is located within the boundaries of a groundwater management district (GMD), the chief engineer shall notify the GMD of the complaint before initiating the investigation and shall give the board of directors of the GMD the opportunity to assist with the investigation.

(5) If the source of water is groundwater, the chief engineer may require hydrologic testing to determine hydrological characteristics as part of the investigation. The chief engineer shall provide notice to water right owners in a geographic area sufficient to conduct the hydrologic testing and to determine who could be affected by the actions made necessary by the results of the investigation. These water right owners shall be known as the potentially affected parties. As part of the investigation, the chief engineer may require access to points of diversion or observation wells and may require the installation of observation wells.

(6) Data acquired during the investigation shall be provided to the complainant and any other persons notified for review and comment at their request as the investigation proceeds.

(c) Report. The chief engineer shall issue a report stating the relevant findings of the investigation.

(1) If the complainant's water right is a domestic water right or has surface water as its source and the complainant claims impairment by the diversion of water pursuant to surface

rights, the chief engineer shall provide a copy of the report to the complainant and to the potentially affected parties. This report shall constitute the final report of the investigation.
(2) If the complainant's water right is not a domestic right and has groundwater as its source or if the complainant's water right has surface water as its source and claims impairment by the diversion of water pursuant to groundwater rights, a copy of the report shall be provided by the division of water resources to the complainant and to the potentially affected parties. The report shall be posted by the division of water resources on the department of agriculture's web site. This report shall constitute the initial report of the investigation.
(A) If the initial report shows impairment, the potentially affected parties shall have the opportunity to submit written comments on the initial report within 30 days of its posting on the department's web site or a longer period if granted by the chief engineer. The chief engineer shall consider the written comments of the potentially affected parties.
(B) If the area of complaint is located within the boundaries of a GMD, the chief engineer shall provide a copy of the initial report to the GMD and shall consider any written comments submitted by the GMD board within 30 days of the posting of the initial report on the department's web site or a longer period if granted by the chief engineer.
(C) Nothing in this regulation shall prevent the chief engineer from regulating water uses that the chief engineer has determined are directly impairing senior water rights during the comment period or, if applicable, before obtaining written comments by the GMD board during the comment period.
(3) After reviewing comments on the initial report from potentially affected parties and, if applicable, from the GMD board, the chief engineer shall issue a final report, which shall be
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provided to the complainant, the potentially affected parties, and the GMD board if applicable and shall be posted on the department of agriculture's web site.
(4) The chief engineer may require conservation plans authorized by K.S.A. 82a-733, and amendments thereto, based on the initial and final reports.
(5) If the chief engineer's final report determines impairment and the source of water is a regional aquifer, the final report shall determine whether the impairment is substantially caused by a regional overall lowering of the water table. If the impairment is determined to be substantially caused by a regional overall lowering of the water table, no further action shall be taken under this regulation, and the procedure specified in K.A.R. 5-4-1a shall be followed.
(d) Request to secure water. If the complainant desires the chief engineer to regulate water rights that the final report has found to be impairing the complainant's water right, the complainant shall submit a written request to secure water to satisfy the complainant's prior right. The request to secure water shall be submitted on a prescribed form furnished by the division of water resources. The complainant shall specify the minimum reasonable rate needed to satisfy the water right and shall also provide information substantiating that need. The chief engineer shall determine how to regulate the impairing rights. Each request to secure water to satisfy irrigation-use water rights shall expire at the end of the calendar year in which the request was submitted.
(e) Notice of order.
(1) The chief engineer shall give a written notice and directive to those water right holders whose use of water must be curtailed to secure water to satisfy the complainant's prior rights.
(2) If the area of complaint is located within the boundaries of a GMD and if the final

report determines that the impairment is substantially due to direct interference, the chief engineer shall allow the GMD board to recommend how to regulate the impairing water rights to satisfy the impaired right.
(3) The chief engineer may consider regulating the impairing rights the next year and rotating water use among rights.
(4) All water delivered to the user's point of diversion for that individual's use at the specified rate or less shall be applied to the authorized beneficial use and shall count against the quantity of water specified unless the user notifies the chief engineer or authorized representative that diversion and use will be discontinued for a period of time for good reason.
(5) When the quantity of water needed has been delivered to the user's point of diversion or when the user discontinues that individual's use of water, those persons who have been directed to regulate their use shall be notified that they may resume the diversion and use of water.
(6) If the available water supply in the source increases, the chief engineer may allow some or all of the regulated users to resume use, depending on the supply. (Authorized by and implementing K.S.A. 82a-706a; modified, L. 1978, ch. 460, May 1, 1978; amended Oct. 29, 2010.)

K.A.R. 5-4-1a. Distribution of water between users when a prior right is being impaired due to a regional lowering of the water table. (a) When a complaint is received that 76
a prior right to the use of water is being impaired, the procedure specified in K.A.R. 5-4-1 shall be followed until the determination is made that the impairment is caused substantially by a regional lowering of the water table.
(b)(1) If the area of complaint is located within the boundaries of a groundwater management district (GMD), the GMD board shall recommend the steps necessary to satisfy senior water rights. Recommendations may include following the GMD management program, amending the GMD management program, or pursuing any other means to satisfy senior water rights. The GMD board shall submit its recommendations to the chief engineer within six months of the determination that the impairment is caused substantially by a regional lowering of the water table or within a longer time if approved by the chief engineer.
(2) The GMD board shall publish notice of its recommendations once in a newspaper of general circulation in the county where the impairment is occurring.
(3) The chief engineer shall determine the appropriate course of action to satisfy senior water rights. To that end, the chief engineer shall consider the GMD's timely recommendations and may conduct a study similar to that described in paragraph (c)(1).
(4) The chief engineer shall publish notice of the course of action once in a newspaper of general circulation in the county where the impairment is occurring.
(c)(1) If the area of complaint is located outside the boundaries of a GMD and determined to be caused by a regional lowering of the water table, the chief engineer shall conduct a study to determine the appropriate course of action. The study shall include a determination of the effectiveness and economic impact of administering one or more water rights in accordance with K.A.R. 5-4-1, the effectiveness and economic impact of the types of corrective controls listed under K.S.A. 82a-1038 and amendments thereto, and any other means to satisfy senior water rights while preserving the economic vitality of the region.
(2) The chief engineer shall determine the appropriate course of action, based on the study described in paragraph (c)(1).

(3) The chief engineer shall publish notice of the course of action once in a newspaper of general circulation in the county where the impairment is occurring. (Authorized by and implementing K.S.A. 82a-706a; effective Oct. 29, 2010.)

KANSAS
DEPARTMENT OF AGRICULTURE

Mark Parkinson, Governor
Joshua Svaty, Secretary

www.ksda.gov/dwr

March 15, 2010

SUBURBAN WATER COMPANY
1216 N 155TH STREET
PO BOX 147
BASEHOR KS 66007

Re: Impairment Concern
File Nos. 39,287; 41,844;
42,733 & 43,883

Dear Ladies and Gentlemen:

On May 7, 2004, Suburban Water Company sent a letter to the Division of Water Resources alleging interaction between the Suburban Water Company wells authorized under File Nos. 39,287, 41,844, and 42,733 (Moran well field) and the well authorized under File No. 43,883 of Leavenworth County Rural Water District No. 7.

The Division had been conducting an investigation into this matter and most recently held a meeting at Division headquarters on May 14, 2009, which included outlining the Division's plan to install water level transducers and other equipment in these wells. On May 19, 2009, staff from the Division visited the area and found that Suburban Water Company was illegally operating a battery of two (2) unauthorized wells.

As we discussed, because the unauthorized wells are physically located between the Moran wells and observation well under File Nos. 39,287, 41,844, and 42,733, and the well and observation well authorized under File No. 43,883, the Division determined that data collected from the observation wells, the production wells, including any and all pumping or aquifer tests to date was invalid. Since there is no way to determine that any alleged interaction did or not occur as a result of your illegal pumpage from the unauthorized wells during this time period, the Division suspended the investigation.

This letter is to formally document that the Division has now terminated this investigation due to the aforementioned circumstances.

Please note that this action does not restrict or in any way preclude the Suburban Water Company from filing any compliant in the future pursuant to K.A.R. 5-4-1 if you believe your prior right to the use of water is being impaired by junior users.

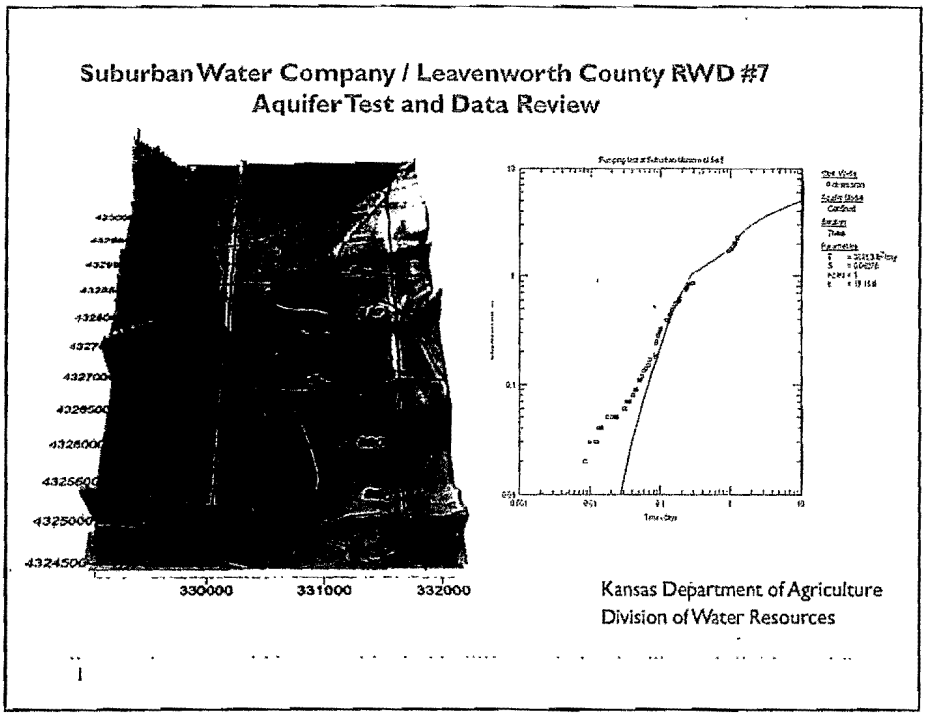
If you have any questions about this matter, you may contact me at (785) 862-6300.

Sincerely,

Katherine A. Tietsort

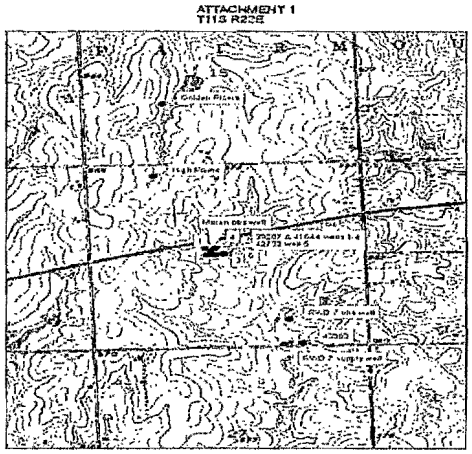
Katherine A. Tietsort
Water Commissioner
Topeka Field Office

KAT
pc: David Barfield, Chief Engineer
Christopher Beightel, Water Management Services Program Manager
Lane P. Letourneau, Water Appropriation Program Manager



1. The picture, viewing from south to north, shows a limited valley of groundwater supply along a gradient from north to south.
2. The red dots show the Suburban wells in the Moran well field with and observation well located at the center of the supply wells and shows the location of the RWD 7 north supply well and the RWD 7 observation well and other sites used to draw the picture.
3. The Suburban wells are about ½ mile from the RWD 7 supply well and the RWD 7 observation well is about 800 feet from the RWD supply well.

Map showing PWS wells



2

1. We want to see if there is well interference between the Suburban wells at the Moran well field and the RWD 7 north supply well.
2. Pumping tests are needed at the Suburban Moran well field and at the RWD 7 north supply well.
3. Observation wells are needed near the Suburban supply wells and near the RWD supply well. Pumping tests at observation wells near supply wells provide data for analysis in the vicinity of the pumping wells and depends upon the aquifer characteristics.
4. Pumping test results are used to compute water level changes at another observation well located between the Suburban supply wells and the RWD supply well.
5. An observation well is located in the Suburban Moran well field for a pumping test there, but it was found that the RWD 7 observation well is not useable for a pumping test nor is it useable to observe water level changes between Suburban and RWD wells.

Suburban Water Company / Leavenworth County RWD #7 Meeting
May 14, 1PM
Division of Water Resources Headquarters 109 SW 9th Street, 2nd Floor, Topeka

Agenda:

1) Introductions

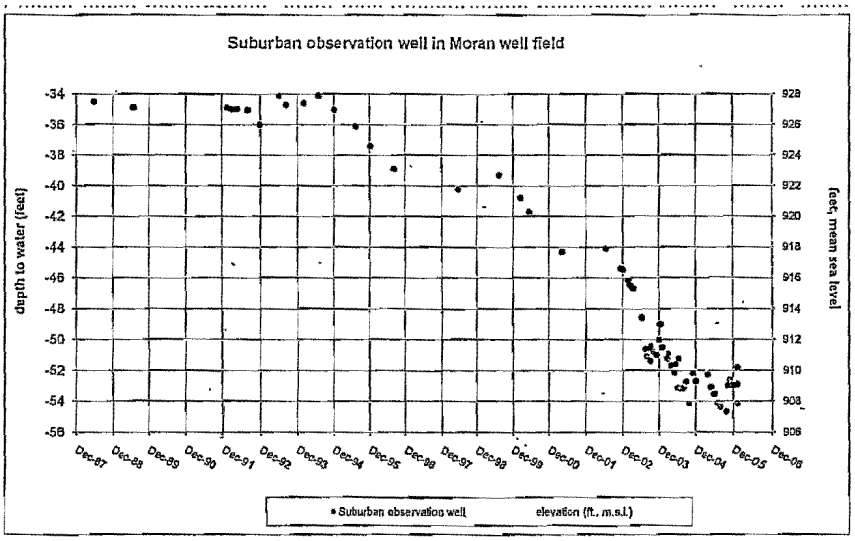
2) Background- May 7, 2004 investigation request

3) Data from pumping test conducted

4) DWR recommendations

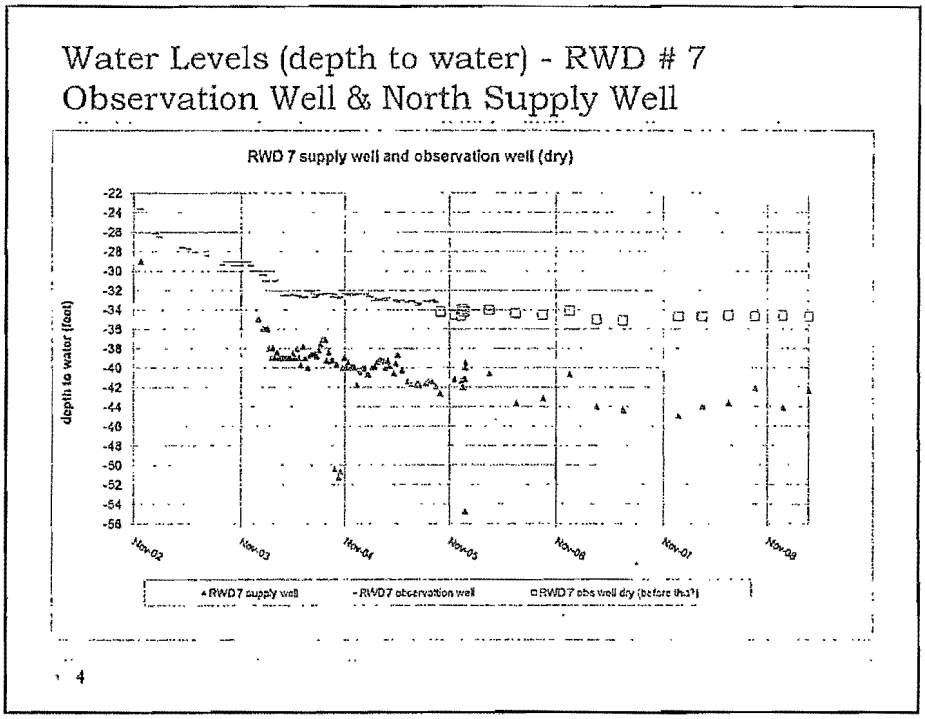
5) Discussion

Water Levels (depth to water and elevation) – Suburban observation well in Moran well field



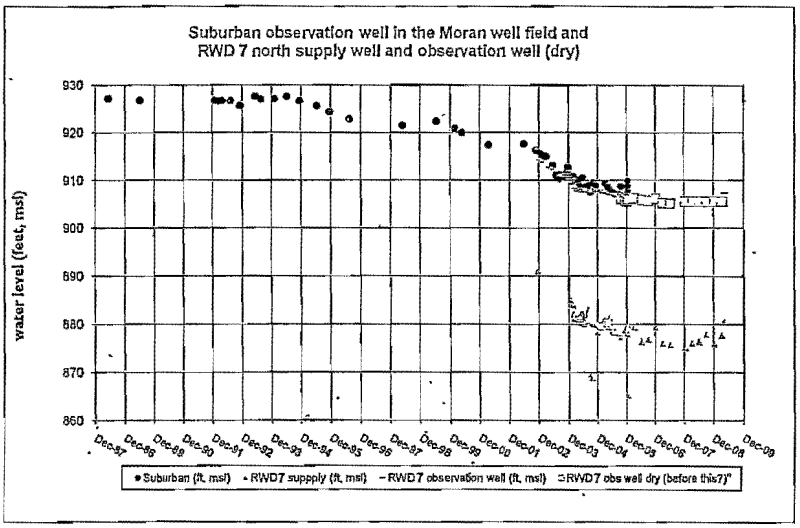
3

1. This graph shows the depth to water and water level elevation at the Suburban observation well located in the Moran well field near the pumping center of the Suburban supply wells. I have data from 1988 to January of 2006.
2. The supply wells are about 70 feet deep and the depth to water has changed from about 34 feet to water to 54 to 55 feet to water.



1. This graph shows the depth to water at the RWD 7 north supply well and at their observation well.
2. The first readings of about 24 feet to water and 29 feet to water are when the wells were drilled in December of 2002.
3. The RWD 7 supply well is about 75 feet deep, but the observation well is only about 35 feet deep.
4. Water level change occurred in 2003 at the RWD 7 observation well while only Suburban wells were pumping.
5. When RWD 7 began pumping in 2004 the decline rate may have been greater (steeper decline) but then became level or the observation well became essentially dry.
6. The deeper depths to water at the RWD 7 supply well of about 51 feet to water and 55 feet to water are pumping levels and other measurements at the supply well are with the well turned off.

Water Levels (elevation, ft., m.s.l.) – Suburban, RWD # 7 supply well and observation well



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1. This graph shows all water levels at the Suburban observation well at the Moran well field and the RWD 7 supply well and observation well relative to elevation instead of depth to water.
2. The water level at the RWD 7 observation well was about the same as the water level at the Suburban observation well, but the RWD 7 observation well became essentially dry.
3. The RWD 7 observation well was not drilled deep enough in the same portion of the aquifer as the RWD 7 supply well.
4. An observation well needs to be drilled deeper in the same portion of the aquifer as the RWD 7 supply well so a pumping test to determine aquifer characteristics near the RWD 7 can be conducted.
5. An observation about 100 feet from the RWD 7 supply well at the same depth as the supply well would not be too far away to conduct a timely aquifer test.
6. Another observation well located between the Suburban Moran well field and the RWD 7 supply well, possibly at the furthest point from the Suburban wells and closest point to the RWD 7 supply well but located on Suburban property, could then be monitored to observe drawdown effects from Suburban wells and possibly from RWD 7.

Summary of what is needed, what has been done, and what has not been done

WHAT IS NEEDED

- Pumping tests are needed near both the RWD 7 north supply well and the Suburban supply wells to determine aquifer characteristics near the RWD 7 and Suburban supply wells.
- An observation well located between the Suburban supply wells and the RWD 7 supply well needs to be monitored for at least one full year during normal use of the Suburban and RWD 7 supply wells.
- An observation well near the Suburban supply wells needs continued monitoring.
- An observation well near the RWD 7 supply well needs to be monitored.
- Monitoring of pumping rates and times at the RWD 7 supply well and at the Suburban wells in the Moran well field are needed.

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WHAT HAS BEEN DONE

- A pumping test has been conducted at the Suburban Moran well field to determine aquifer characteristics near the Suburban supply wells.
- A recovery test was conducted at the RWD 7 north supply well but an observation well was not available to conduct a pumping test to determine aquifer characteristics near the RWD 7 supply well.

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WHAT HAS NOT BEEN DONE

- No pumping test has been conducted at RWD 7 north supply well due to the lack of an observation well.
- Monitoring of an observation well located between the Suburban supply wells and the RWD 7 supply well has not taken place due to the lack of an observation well.

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Conclusions

- Pumping test results can be used to compute drawdown from pumping the Suburban wells at some distance between the Suburban wells and the RWD 7 supply well.
- An observation well needs to be completed on the Suburban property at the farthest location from the Suburban supply wells and closest location to the RWD 7 supply well and drilled deep enough in the aquifer from which both supply wells pump.
- The recovery test at RWD 7 suggests the aquifer transmissivity is about the same as at the Moran well field but the storativity at RWD 7 supply well is not known.
- To continue the investigation an observation well needs to be constructed between the Suburban wells and the RWD 7 supply well and an observation well needs to be constructed approximately 100 feet from the RWD 7 supply well.

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1. The transmissivity of an aquifer can be viewed as a type of movement of water within an aquifer.
2. The storativity of an aquifer can be viewed as a type of release of water from aquifer storage.
3. These aquifer properties determined by aquifer pumping tests can be used to compute drawdown (or water level change) at a location of known distance from pumping wells at known pumping rates and pumping times.
4. You as public water suppliers maintain records of daily pumping volumes so pumping rates and times are available.

Recommendations

- Additional observation wells and data collection
  - DWR would put transducers in three observation wells
- Another aquifer test is necessary
  - DWR would conduct a pumping test at RWD #7 at a new observation well approximately 100 feet from the supply well
  - DWR would monitor water levels at a new Suburban observation well for drawdown due to RWD #7 pumping
  - Monitoring of both new observation wells and the present one the Suburban Moran well field would be needed for at least one full year
  - It may be necessary to have Suburban off for 1 to 2 days while RWD #7 pumps for 1 to 2 days to monitor possible drawdown at the new Suburban observation well

Kansas Corporation Commission
Information Request

Request No: 51

Company Name	SUBURBAN WATER CO.	SUBW
Docket Number	11-SUBW-448-RTS	
Request Date	February 21, 2011	
Date Information Needed	March 1, 2011	

RE: Moran Well Nos. 6 and 7

Please Provide the Following:

Suburban Water filed an application with the Water Resources Division of the Department of Agriculture requesting an investigation as to whether a well of Rural Water District No. 7 was impairing the Moran field well nos. 1 - 4. The Water Resources Division dismissed the application due to unpermitted pumping from the Moran wells 6 and 7.

1. In reference to Suburban's response to Staff Data Request No. 30, question 3 of 5; please explain why Suburban Water has not requested that the investigation be re-opened.

2. Is Suburban Water planning on requesting that the Water Resources Division re-open the investigation.

Submitted By Bill Baldry

Submitted To Mike Breuer

If for some reason, the above information cannot be provided by the date requested, please provide a written explanation of those reasons.

Verification of Response

I have read the foregoing Information Request and answer(s) thereto and find answer(s) to be true, accurate, full and complete
and contain no material misrepresentations or omissions to the best of my knowledge and belief; and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: _____

Date: 3/1/11

Suburban Water Co.
Docket No. 11-SUBW-448-RTS
KCC Information Request Answers

Request No. 51
RE: Moran Well Nos. 6 and 7

1. SWC has not requested to re-open the complaint made about RWD#7's well impacting SWC's Moran well field because a letter from DWR, dated March 15, 2010, determined that data collected from the observation wells, the production wells, including any and all pumping or aquifer tests to date was invalid.
2. SWC is currently in discussions with RWD#7 about possible water supply options that would be beneficial to SWC. RWD#7 has wells located next to the Kansas River that may be able to provide SWC with a second source of groundwater. These discussions would be jeopardized if SWC pursued impairment concerns with the DWR.

Staff Exhibits

JTG28 and JTG29

Are Confidential

KANSAS DEPARTMENT OF AGRICULTURE
Division of Water Resources
Topeka Field Office

MEMORANDUM

TO: Files

DATE: May 22, 2009

FROM: Katherine A. Tietsort KAT

RE: Suburban Water Company
Illegal Diversion Investigation

In a meeting at DWR HQ on May 14, 2009, related to the impairment investigation of Suburban Water Company and Leavenworth County Rural Water District No. 7, it was identified that Ray Breuer of Suburban had caused to be installed two (2) new wells in an area identified as being South of the Moran well field in Section 22, Township 11 South, Range 22 East. In that meeting it was identified that the wells had pumps installed and I asked Ray if they were pumping- he indicated that they were not. I explained to Ray that these wells, even if they aren't being pumped constitute a threat to divert and that he cannot pump the wells without an approved permit.

John Munson, of DWR Technical Services Unit, made arrangements, based on determinations made at the above-referenced meeting, to install transducers at two locations, identify the precise location where the RWD #7 new observation well should be located, and identify good locations for additional Suburban observation wells. When John contacted Suburban about the visit, Ray indicated that he wanted to be present when John identified the observation well sites and discouraged John from performing that work on the anticipated date of May 19, 2009. In further discussions with DWR, John decided to install the transducer at the new Suburban observation well, but to wait for Ray to identify additional observation well sites, per Ray's request. On May 19, 2009, John Munson visited the well field of Suburban Water Company to install two (2) transducers; one in the observation well for the Moran well field and one to be installed in a well or observation well identified by wells logs from the WWC-5 database to be located in the Southwest Quarter of Section 22, Township 11 South, Range 22 East. I confirmed that this land was owner by the Breuer family per Kansas Surveyor Records prior to John's field work. When John visited the Southwest Quarter of Section 22, Township 11 South, Range 22 East, he observed one (1) observation well, and two (2) production wells, both production wells were equipped and pumping. John documented the wells by gps and by photographs. (Photographs attachment A).

On May 20, 2009, when I received the information from John Munson that there were two (2) production wells, equipped and pumping on the property I identified as being owned by the Breuer's, I called Suburban Water Company and reached Mike Breuer, I asked for Ray and Mike indicated Ray was not in. I informed Mike that Division staff had identified two (2) wells not covered by any permit (illegal wells) equipped and pumping on Tuesday, which Mike affirmed, and I instructed Mike that these wells must be shut down immediately and that no pumping could continue. I instructed Mike that the wells must be shut down that day and that I would inspect the wells the following day (Thursday May 21) at midday to ensure they were not pumping and to seal the wells. Mike indicated he would shut the wells down immediately.

On May 21, 2009, I went to the site to inspect with Jessica Ahlquist. As we neared the site, we called Suburban to identify who would be opening the gate. I talked with Ray and he wanted us to go to lunch with him because it was noon. I declined and told him that I specified I would visit at noon. He asked that we come to the office because he had information to share with me that

he said would "make a difference." I told him that I wanted to inspect the wells and we would walk in if necessary and he said that could cause problems because the entrance is literally between the buildings of a working horse ranch. As a note, this is the case. Because he was adamant I agreed to meet him first, however, we drove by the well area from the south and east and observed that neither vehicles nor people were down in the pasture where the wells were at.

At Suburban, we met with Mike Breuer and Ray Breuer. Ray was confrontational and indicated that the state left him no choice but to put these wells in because according to him DWR did not act on the impairment request in a timely manner. He showed me the letter from 2002 he wrote protesting the application of RWD #7 and claiming impairment as evidence. I told him that as he was aware, we indicated in the response, no impairment can occur before a well is even drilled as the RWD #7 was not drilled at that point. I asked him why in the nearly 5 years since I have been W.C. I have not received a single visit, telephone call, letter, or other communication from him if he was this concerned with the pace in which the investigation was progressing. He had no answer and identified that he "found this aquifer" and that it was really "his" aquifer and that he brought it (water) to the people. I went over the provisions of the KWAA. He said he knew all that. While this discussion was going on, Mike Breuer was telling me that his Father wouldn't listen and that he thinks he owns the aquifer. I asked Ray if he understood the seriousness of this issue:

- The wells do not appear to be permitted; there are no records in the DWR indicated a permit exists at this location. There exist serious issues besides not being able to pump the wells for illegal diversions including civil penalties and other penalties.
- The wells may not be completed to KDHE standards; therefore a public safety issue could exist.
- If the wells are completed to KDHE standards, then the well driller may have falsified the drilling logs and there may be implications to the well driller
- This may have jeopardized the impairment investigation to the point where we can no longer continue the investigation
- They may have not been paying the appropriate water protection fees required by KSA 82a-954 OR they may have falsified annual water use reports required by KSA 82a-732
- The application of a permit to cover these wells will result in them having to hire a licensed professional, approved by DWR, to perform an extensive geohydrologic study to show that safe yield is available and that impairment won't result in order to permit these wells; this study would essentially have to negate their claim of impairment to get these wells permitted wither by new applications or by changes.

Ray stated that if "we went by that, the whole well field is illegal and that DWR permitted Harper field (old well field) totally after the fact so we could just do that again." He appeared unconcerned with the gravity of this situation and went on to blame, Strader as a poor well driller, RWD #7 for coming in and taking water from his well field and others. Eventually Mike and I agreed that the discussion was focusing on how ewe got to this point and instead we needed to focus on where to go from here.

I provided a copy of the certified letter mailed that day and a copy of a blank application and forms. We discussed the option of filing a permit or plugging the wells. Ray indicated he needed to know whether or not the Division would suspend the impairment investigation or not before he could decide what to do by the June 4 deadline. I told him I would get an answer. We talked about how applications could be filed and the forms. He indicated he may ask to retain the wells as observation wells.

Mike was out of the room on the telephone and I asked Ray about the water use records and if they DWR water use reports would agree with the numbers supplied to Dept. of Revenue for the water use fee. He told me they probably wouldn't.

KANSAS
DEPARTMENT OF AGRICULTURE

Mark Parkinson, Governor
Adrian J. Polansky, Secretary

www.ksda.gov/dwr

July 17, 2009

SUBURBAN WATER INC
RAPHAEL (RAY) D. BREUER
PO Box 147 1216 N 155TH ST
BASEHOR KS 66007

RE: Unauthorized points of diversion
Suburban Water, Inc. wells 6 and 7

Dear Sir:

Enclosed is a **Civil Penalty Order** issued to Suburban Water, Inc. by the Chief Engineer of the Division of Water Resources. This order assesses a civil penalty in the amount of **$7,000.00**, based on findings that diversion of water has occurred from unauthorized points of diversion and sold as public water supply. Such a use of water from non-permitted wells is a violation of the Kansas Water Appropriation Act and the rules and regulations of the State of Kansas. Furthermore, water from those unauthorized points of diversion have been incorrectly reported under Appropriation of Water, File No. 42,733, on the 2006-2008 annual water use reports required by law. Such a report is considered a falsification of those reports.

This Civil Penalty Order requires your immediate attention. Please read it very carefully, as it sets forth deadlines you must meet in order to preserve your legal rights. This is the only notice you will receive prior to the penalty becoming due and payable.

If you do not wish to contest the finding of this violation, you must pay the civil penalty within **thirty (30) days** after the date shown on the Certificate of Service attached to the Civil Penalty Order. You may add three (3) days to this date to account for service by mail. Payment of the civil penalty, in the amount of **$7,000.00**, must be made by check or money order and can be mailed or delivered to:

Kansas Department of Agriculture
Legal Section
109 SW 9th Street, 4th Floor
Topeka, Kansas 66612

If you would like a hearing so that you can contest the findings of the order or present other information to be considered by the Chief Engineer or if you wish to petition for a review of the order by the Secretary of Agriculture, you must file your request or petition for review within **fifteen (15) days** after the date shown on the Certificate of Service attached to the Civil Penalty Order. Three (3) days may be added to account for service by mail. Your request or petition should be filed with the Legal Section at the address shown above.

You must pay the civil penalty unless you file a request for a hearing or a petition for review within the time allowed. Failure to pay the civil penalty may result in further enforcement action, including the assessment of additional civil penalties, or suspension of all diversions of water in Kansas by the subject company. Future violations shall likewise result in further enforcement action, including the assessment of greater civil penalties, or suspension of the use of water pursuant to the provisions of K.S.A. 82a-737 and any other appropriate enforcement action, including requesting that criminal proceedings be brought pursuant to K.S.A. 82a-728.

If you have any questions, please contact this office or the Topeka Field Office of the Division of Water Resources.

Sincerely,

Lane P. Letourneau

Lane P. Letourneau, L.G.
Program Manager
Division of Water Resources
Kansas Department of Agriculture

DWB: LPL:WRE
Enc
pc: Water Commissioner, Topeka Field Office
Brett Berry, Staff Attorney, Kansas Dept. Of Agriculture

THE STATE OF KANSAS

KANSAS DEPARTMENT OF AGRICULTURE
Adrian J. Polansky, Secretary of Agriculture

DIVISION OF WATER RESOURCES
David W. Barfield, Chief Engineer

ORDER ASSESSING CIVIL PENALTIES FOR VIOLATIONS OF THE KANSAS WATER APPROPRIATION ACT

David W. Barfield, Chief Engineer of the Division of Water Resources, Kansas Department of Agriculture (agency), hereby issues this order assessing civil penalties for violations of the Kansas Water Appropriation Act, K.S.A. 82a-701, et seq., and the rules and regulations promulgated thereunder. Pursuant to authority granted by the act, the Chief Engineer makes the following findings of fact and conclusions of law.

FINDINGS OF FACT

1. Suburban Water, Inc. (Suburban) is a Kansas domestic for-profit corporation which is active and in good standing as of the date of this order. Suburban's registered agent is Raphael D. Breuer; 1216 N 155th St; Basehor, Kansas 66007.

2. Suburban owns or controls land located in the Southwest Quarter of the Northeast Quarter of the Southeast Quarter of Section 22, Township 11 South, Range 22 East, Leavenworth County, Kansas.

3. During a May 14, 2009, meeting between agency staff including Katie Tietsort, Water Commissioner for the Topeka Field Office, and representatives of Suburban and Leavenworth County Rural Water District No. 7 regarding an ongoing impairment investigation, Katie Tietsort learned that Suburban had two wells located on the above described land with pumps installed without permits or prior approval of the Chief Engineer.

4. Suburban was previously notified by a December 10, 1980, letter from the agency that diversion of water not for domestic use is required to be permitted under the Kansas Water Appropriation Act.

5. During a May 19, 2009, site visit, John Munson of the agency's Technical Services Unit, observed and photographed the two unauthorized wells in operation, and recorded their location by use of "GPS." He described the two unauthorized wells as a battery with a geographic center located in the Southwest Quarter of the Northwest Quarter of the Southeast Quarter (SW¼ NW¼ SE¼) of Section 22, more particularly described as being near a point 1,817 feet North and 2,262 feet West of the Southeast corner of said section, in Township 11 South, Range 22 East, Leavenworth County, Kansas.

6. On May 20, 2009, Mike Breuer, an employee or agent of Suburban, was instructed by Katie Tietsort to cease operating the two unauthorized wells immediately.

7. On May 21, 2009, Katie Tietsort and Jessica Ahlquist met with Ray and Mike Breuer, who acknowledged that the wells were being operated and that they were unpermitted. Ray Breuer further indicated familiarity with the Kansas Water Appropriation Act including the requirement for prior approval of the Chief Engineer before diverting water by referencing the agency's permitting his unauthorized Harper well field after water use commenced. He indicated that since the agency fixed it, why shouldn't the agency fix the two unauthorized wells by authorizing them after commencement of water use.

8. Also on May 21, 2009, Katie Tietsort and Jessica Ahlquist documented both the electrical and water meter readings for each of the two unauthorized wells. They then sealed the electrical shut-offs in the off position so that the wells were not operable without breaking the tape seal on the electrical switches.

9. According to record of the agency, on February 11, 2000, Suburban filed an application with the agency for a permit for beneficial use of water from a battery of wells at or very near the location of the two unauthorized wells. The application, assigned number 44,055 by the agency. It was dismissed by the agency on February 27, 2004, for failure to return the application to the agency.

10. The Water Well Completion records, which locate the unauthorized wells approximately 400-500 feet west of John Munson's "GPS" locations, are maintained by the Kansas Department of Health and Environment and the Kansas Geological Survey and indicate the unauthorized wells were constructed as test wells in April, 2006, by Strader Drilling Co. Inc.

11. During agency field investigations, Mike Breuer indicated that the water use reported by Suburban on its annual Water Use Reports would match the quantity of water reported to the Kansas Department of Revenue for the purposes of the water use protection fee. Mike Breuer explained that the records would match because the water line from the unauthorized wells was connected into the line for well number five of the Moran Well Field and that Suburban reported the quantity diverted from the unauthorized wells under well number five.

12. Annual water use reports submitted by Suburban to the agency indicate a significant quantity of water use under well number five of the Moran Well Field during 2006, 2007 and 2008.

CONCLUSIONS OF LAW

The Chief Engineer concludes that Suburban is in violation of the Kansas Water Appropriation Act, K.S.A. 82a-701 et seq., and is therefore subject to civil penalties as follows:

1. Pursuant to K.S.A. 82a-706, the Chief Engineer is granted broad authority to enforce and administer the laws of this state pertaining to the beneficial use of water.

2. Pursuant to K.S.A. 82a-706a, "the Chief Engineer shall adopt, amend, promulgate, and enforce such reasonable rules, regulations, and standards necessary for the discharge of his or her duties and for the achievement of the purposes of this act pertaining to the control, conservation, regulation, allotment, and distribution of the water resources of the state."

3. Pursuant to K.S.A. 82a-705, "no person shall have the power or authority to acquire an appropriation right to the use of water for other than domestic use without first obtaining the approval of the Chief Engineer, and no water rights of any kind may be acquired hereafter solely by adverse use, adverse possession, or by estoppel."

4. Pursuant to K.A.R. 5-1-1 (o)(3), Suburban's use of water from the two unauthorized wells is municipal in nature, and does not meet the definition of domestic uses pursuant to K.S.A. 82a-701(c).

5. K.S.A. 82a-708a et seq., prescribes the application process for permitting the use of water which did not occur prior to beneficial use of the two unauthorized wells operated by Suburban.

6. Pursuant to K.S.A. 82a-728(a), it is "...unlawful for any person to appropriate or threaten to appropriate water from any source without first applying for and obtaining a permit to appropriate water in accordance with the provisions of chapter 7 of article 82a of the Kansas Statutes Annotated and acts amendatory thereof or supplemental thereto..."

7. Suburban, by virtue of diverting water for beneficial use by means of the two unauthorized wells, has unlawfully made an appropriation of water without first applying for and obtaining a permit to appropriate water in violation of K.S.A. 82a-728(a).

8. Suburban, by virtue of having two unauthorized wells which are equipped and functional has unlawfully threatened to divert water without first applying for and obtaining a permit as required in violation of K.S.A. 82a-728(a).

9. Pursuant to K.S.A. 82a-732, the owner of a water right shall file an annual water use report which completely and accurately sets forth such water use information as requested by the Chief Engineer.

10. Reporting water use from the two unauthorized wells as use from the Moran Well Field out of service well number five (an authorized point of diversion under Water Right, File No. 42,733) on the water use report for Water Right, File No. 42,733 is a violation of the K.S.A. 82a-732 requirement to file a complete and accurate water use report.

11. Pursuant to K.S.A. 82a-737, in addition to any other penalty provided by law, any person who violates the provisions of the Kansas water appropriation act, K.S.A. 82a-701, et seq., or any rule and regulation adopted thereunder, may incur a civil penalty of not less than $100 nor more than $1,000 per violation. In the case of a continuing violation, each day such violation continues may be deemed a separate violation.

12. Pursuant to K.A.R. 5-14-10(c)(2)(A), the threat to divert water without authorization from the Chief Engineer shall result in a civil penalty of $100.

13. Pursuant to K.A.R. 5-14-10(d)(2)(A), the diversion of water from an unauthorized point of diversion is a Category 2 offense, which shall result in a civil penalty of $500.

14. Pursuant to K.A.R. 5-14-10(e)(2)(D), falsifying water use or other data required by the Chief Engineer is a Category 3 offense, which shall result in a civil penalty of $1,000.

15. Pursuant to K.A.R. 5-14-10(f), civil penalties specified in paragraph (c)(1) may be increased if the Chief Engineer finds that aggravating circumstances exist including prior violations and intentional noncompliance or gross negligence.

16. Penalties accessed under this order based upon Suburban's threat to divert water should be increased from $100 each as provided under K.A.R. 5-14-10(c)(2)(A) to $500 each for intentional noncompliance or gross negligence pursuant to K.A.R. 5-14-10(f). Intentional noncompliance or gross negligence is demonstrated by Suburban's previous unauthorized diversions of water associated with unpermitted use of water from the Harper well field; the discussion between agency staff and representatives of Suburban on May 21, 2009; and the prior specific notice to Suburban in an agency letter dated June 11, 1980, that unpermitted appropriations of water are violations of the Kansas Water Appropriation Act.

17. Suburban completed and equipped two unauthorized wells in 2006 and either made unauthorized diversions of water, or threatened to divert water in each of four years, 2006, 2007, 2008 and 2009, all done with prior violations, intentional noncompliance or gross negligence and for which a civil penalty of $500 for each well per year should be imposed for a total civil penalty of $4,000.

18. Suburban falsified water use or other data required by the Chief Engineer on the water use reports of Water Right, File No. 42,733 in each of three years, 2006, 2007 and 2008, for which a civil penalty of $1,000 for each water use report should be imposed for a total civil penalty of $3,000.

ORDER

IT IS, THEREFORE, CONSIDERED AND ORDERED that Suburban is in violation of the Kansas Water Appropriation Act, specifically K.S.A. 82a-728(a) by appropriating or threatening to appropriate water from any source without first applying for and obtaining a permit to appropriate water; and K.S.A. 82a-732 by failing to completely and accurately set forth water use information in the 2006–2008 annual water use reports for Water Right, File No. 42,733.

IT IS FURTHER CONSIDERED AND ORDERED that penalties assessed under this order based upon Suburban's threat to divert water shall be increased from $100 to $500 each due to intentional noncompliance or gross negligence pursuant to K.A.R. 5-14-10(f).

IT IS FURTHER CONSIDERED AND ORDERED that Suburban is hereby assessed a $4,000 civil penalty for appropriating or threatening to appropriate water without first applying for and obtaining a permit, and a $3,000 civil penalty for falsifying water use or other data required by the Chief Engineer on annual water use reports, for a total civil penalty of $7,000 as authorized by K.S.A. 82a-737 and K.A.R. 5-14-10.

IT IS FURTHER CONSIDERED AND ORDERED that the total civil penalty in the amount of $7,000, against Suburban, shall be paid, in full, to the Kansas Department of Agriculture within thirty (30) days after the effective date of this order assessing civil penalties. Payment of the civil penalties shall be made by certified check or money order made payable to the Kansas Department of Agriculture, and shall be mailed or delivered to:

Kansas Department of Agriculture
Legal Division
109 SW 9th Street, 4th Floor
Topeka, Kansas 66612
(785) 296-4623

The failure to pay the civil penalties, after the effective date of this order, as set forth above will result in further enforcement action, including the assessment of additional civil penalties, modification of the water right, and/or suspension of the use of water under this water right for an extended period pursuant to the provisions of K.S.A. 82a-737 and any other appropriate enforcement action, including criminal proceedings pursuant to K.S.A. 82a-728(b).

FINAL ORDER, DATE EFFECTIVE

This order shall become effective and shall become a final agency action, as defined by K.S.A. 77-607(b), without further notice to the parties, within thirty (30) days after the date shown on the Certificate of Service attached to this order, unless a petition for administrative review has been filed within the deadline(s) set forth below.

REQUEST FOR HEARING

If you choose, you may file a written request for a hearing regarding this order pursuant to K.A.R. 5-14-3(f). Such request must be filed within **15 days** after the date shown on the Certificate of Service attached to this Order and must identify the facts or issues in dispute. Filing a request for hearing will give the parties an opportunity to submit additional facts for consideration, contest any findings made by the Chief Engineer, or present other information for consideration by the Chief Engineer.

A timely-filed request for hearing will stay the deadline for filing a petition for administrative review by the Secretary of Agriculture pending the Chief Engineer's decision on the request for hearing.

If a request for hearing is granted, the Chief Engineer will issue an order subsequent to the hearing which will supersede this order. The superseding order will be subject to review by the Secretary of Agriculture, pursuant to K.S.A. 82a-737(f) and K.S.A. 82a-1901. If the Chief Engineer denies a request for hearing, any person aggrieved by this Order may file a petition for administrative review of this Order by the Secretary of Agriculture as set forth below.

PETITION FOR ADMINISTRATIVE REVIEW

Any person aggrieved by this Order may petition for administrative review by the Secretary of Agriculture, pursuant to K.S.A. 2008 Supp. 82a-737(f), K.S.A. 2008 Supp. 82a-1901(a). The Secretary of Agriculture will consider any petition for review that is filed within **15 days** after the date shown on the Certificate of Service attached to this order or within **15 days** after the date shown on the Certificate of Service attached to the Chief Engineer's denial of a timely-filed request for hearing, whichever is later. Any petition for administrative review must state the basis for a review of this order.

Any request for a hearing on or petition for administrative review of this Order shall be in writing and shall be submitted to the attention of: Chief Legal Counsel, Kansas Department of

Agriculture, 109 SW 9th Street, 4th Floor, Topeka, Kansas 66612, Fax: (785) 368-6668.

Issued on this 17th day of July, 2009, at Topeka, Shawnee County, Kansas.

DIVISION OF WATER RESOURCES
DAVID W. BARFIELD
CHIEF ENGINEER
KANSAS DEPARTMENT of AGRICULTURE

David W. Barfield, P.E.
Chief Engineer
Division of Water Resources
Kansas Department of Agriculture

CERTIFICATE OF SERVICE

On this 17th day of July, 2009, I hereby certify that the attached ORDER ASSESSING CIVIL PENALTIES FOR VIOLATIONS OF THE KANSAS WATER APPROPRIATION ACT was mailed on the above date, postage prepaid, first class US mail, to the following:

Suburban Water, Inc.
Raphael D. Breuer, Registered Agent
1216 N 155th St
Basehor, Kansas 66007

Amanda Hummelker
DWR Staff

SUPPLEMENTAL CERTIFICATE OF SERVICE

On this 10th day of August, 2009, I hereby certify that the attached **ORDER ASSESSING CIVIL PENALTIES FOR VIOLATIONS OF THE KANSAS WATER APPROPRIATION ACT** was mailed on the above date, postage prepaid, first class US mail, certified return receipt requested, addressed to the following:

Suburban Water, Inc.
Raphael D. Breuer, Registered Agent
1216 N 155th St
Basehor, Kansas 66007

Suburban Water, Inc.
1216 N 155th St
PO Box 147
Basehor, Kansas 66007

Amanda Lumsden
DWR Staff

Kansas Corporation Commission
Information Request

Request No: 14

Company Name	SUBURBAN WATER CO.	SUBW
Docket Number	11-SUBW-448-RTS	
Request Date	January 27, 2011	
Date Information Needed	February 7, 2011	

RE: Water Rights Acquisition

Please Provide the Following:

On Pg. 6, Line 19 of Mike Breuer's testimony he states that Suburban "is concerned with its ability to obtain water rights in the area near it's distribution system because of the existing water rights owned by the property owners." Additionally, Mike Breuer states on Page 16, Line 11 that "it may be difficult to obtain new water rights in this area given the current water rights to the ground water that is in close proximity to SWC's distribution system." Please provide the following with
regard to these statements:

1. Please elaborate on these statements. How does Suburban define the terms "near" and "close proximity" with respect to its distribution system?

2. Has Suburban attempted to obtain water rights for any well projects other than the well attempted in 2006? If so what was the result? Please provide the file number for each water right application.

3. Please provide copies of any correspondence between Suburban Water Company and any entity with respect to the acquisition of water rights from 2000 through 2010.

Submitted By Justin Grady

Submitted To Mike Breuer

See attached answer

If for some reason, the above information cannot be provided by the date requested, please provide a written explanation of those reasons.

Verification of Response

I have read the foregoing Information Request and answer(s) thereto and find answer(s) to be true, accurate, full and complete
and contain no material misrepresentations or omissions to the best of my knowledge and belief; and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: _____

Date: 2/4/11

Suburban Water Co.
Docket No. 11-SUBW-448-RTS
KCC Information Request Answers

Request No. 14
RE: Water Rights Acquisition

1. In June 2006, SWC completed the construction of new water well and filed an application with the Division of Water Resources (DWRL file number 46,504). This was the first of several wells that were planned at this new site. The first and only well drilled had an estimated yield of 75 gpm. However, SWC's application was denied by DWR because it impaired other water rights in the area. All of the wells located in the new well field were residential and not used for public water supply.
2. No
3. See attached application and correspondence

    a. application for permit - File#46,504.pdf

    b. Dismissal of Application 021507 - File#46,504.pdf

    c. Water Well Record June 16, 2006.pdf

LAW OFFICES OF

ANDERSON & BYRD

A Limited Liability Partnership

JOHN L. RICHESON
JAMES G. FLAHERTY
R. SCOTT RYBURN
KEITH A. BROCK

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(785) 242-1279, *Facsimile*
www.andersonbyrd.com

ROBERT A. ANDERSON
(1920-1994)
RICHARD C. BYRD
(1920-2008)

February 24, 2011

Sent by Electronic Mail

Ms. Colleen Harrell
Litigation Counsel
Kansas Corporation Commission
1500 S. W. Arrowhead Road
Topeka, Kansas 66604

Re: Suburban Water Co.
Docket No. 11-SUBW-448-RTS

Dear Ms. Harrell:

Attached is an amended response to KCC Information Request No. 14. Part two of the original response was amended to include a list of Division of Water Resources ("DWR") applications filed by Suburban Water and the dates those applications were filed between 2000-2010. It is our understanding Staff has obtained copies of those files directly from the DWR, and therefore, Suburban Water has not duplicated those files in its amended response.

If you have any questions or comments, let me know.

Sincerely,

James G. Flaherty
jflaherty@andersonbyrd.com

JGF:tr
Enclosure
cc: Justin Grady
Bill Baldry
Sonya Cushinberry

Kansas Corporation Commission
Information Request

Request No: 14

Company Name	SUBURBAN WATER CO.	SUBW
Docket Number	11-SUBW-448-RTS	
Request Date	January 27, 2011	
Date Information Needed	February 7, 2011	

RE: Water Rights Acquisition

Please Provide the Following:

On Pg. 6, Line 19 of Mike Breuer's testimony he states that Suburban "is concerned with its ability to obtain water rights in the area near it's distribution system because of the existing water rights owned by the property owners." Additionally, Mike Breuer states on Page 16, Line 11 that "it may be difficult to obtain new water rights in this area given the current water rights to the ground water that is in close proximity to SWC's distribution system." Please provide the following with
regard to these statements:

1. Please elaborate on these statements. How does Suburban define the terms "near" and "close proximity" with respect to its distribution system?

2. Has Suburban attempted to obtain water rights for any well projects other than the well attempted in 2006? If so what was the result? Please provide the file number for each water right application.

3. Please provide copies of any correspondence between Suburban Water Company and any entity with respect to the acquisition of water rights from 2000 through 2010.

Submitted By Justin Grady

Submitted To Mike Breuer

If for some reason, the above information cannot be provided by the date requested, please provide a written explanation of those reasons.

Verification of Response

I have read the foregoing Information Request and answer(s) thereto and find answer(s) to be true, accurate, full and complete
and contain no material misrepresentations or omissions to the best of my knowledge and belief; and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: _____

Date: 2/25/11

Suburban Water Co.
Docket No. 11-SUBW-448-RTS
KCC Information Request Answers

Request No. 14
RE: Water Rights Acquisition – Revised Answer

1. In June 2006, SWC completed the construction of new water well and filed an application with the Division of Water Resources (DWR), file number 46,504. This was the first of several wells that were planned at this new site. The first and only well drilled had an estimated yield of 75 gpm. However, SWC's application was denied by DWR because it impaired other water rights in the area. All of the wells located in the new well field were residential and not used for public water supply.
2. No
3. See attached application and correspondence

Revised Answer:

DWR file number 44,055	dated February 11, 2000
DWR file number 44,056	dated February 11, 2000
DWR file number 46,427	dated March 10th, 2006
DWR file number 46,504	dated June 16th, 2006
DWR file number 47,324	dated June 4th, 2009

Kansas Corporation Commission
Information Request

Request No: 41

Company Name SUBURBAN WATER CO. SUBW

Docket Number 11-SUBW-448-RTS

Request Date February 15, 2011

Date Information Needed February 24, 2011

RE: Division of Water Resources File No. 47,324

Please Provide the Following:

A review of the records at the Division of Water Resources, Topeka Field Office, reveals that Application file #47,324 was filed in June of 2009 requesting water appropriate rights for two wells south of the Moran field referred to in the records as Moran #6 and Moran #7. Please provide the following with regard to these wells.

1. Why was this water appropriations file number not provided in response to Staff Data Request No. 14?
2. The records indicate that production from these unpermitted wells was recorded a production for Moran well #5 during the years 2006, 2007, 2008 and 2009. Was the production from these wells (Moran #6 and #7) included in the Moran well production table data provided in response to Staff Data Request No. 13? If so, please separate out the water included in this table that was produced by the wells at Moran 6 and 7 during this time frame that was provided in response to Staff DR No. 13.

Submitted By Justin Grady

Submitted To Mike Breuer

If for some reason, the above information cannot be provided by the date requested, please provide a written explanation of those reasons.

Verification of Response

I have read the foregoing Information Request and answer(s) thereto and find answer(s) to be true, accurate, full and complete
and contain no material misrepresentations or omissions to the best of my knowledge and belief; and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: JWL

Date: 2/21/2011

Suburban Water Co.
Docket No. 11-SUBW-448-RTS
KCCInformation Request Answers

Request No. 41
RE: Division of Water Resources File # 47,324

1. SWC did not provide its file on application file #47,324, to its consultant to provide to the Staff in response to Staff Data Request No. 14 because SWC was embarrassed about the outcome of that application filed with the Division of Water Resources in that SWC was found to have produced unpermitted water and was required to pay a fine for producing the unpermitted water. SWC will file an amended response to Staff Data Request No. 14 to include the information relating to that application.

2. The unpermitted water production from the Moran #6 and #7 wells was included in the Moran well production. SWC believed that it should have been allowed to produce water from those wells because production came from the water field that was originally discovered by SWC and SWC disagreed with the Division of Water Resources' decision not to allow SWC to produce those wells. The unpermitted water production from the Moran #6 and #7 wells was assigned to the Moran #5 well as if that water had been produced from the #5 well.

3. The attached monthly Moran well report shows the following gallons pumped. The 2006 gallons is an estimate based on two separate reports.

a.	Moran	#5	#6	#7
b.	2006	1,701,773	3,165,871(?)	5,587,090 (?)
c.	2007	0	8,397,200	17,751,900
d.	2008	0	7,335300	0
e.	2009	0	1,321,300	0

SUBURBAN WATER COMPANY

2006	YEARLY TOTALS	
TOTAL CUST.	80	
MASTER METER		
HARPER	8,251,900	
MORAN	58,805,100	52%
GALLONS PUMPED	67,057,000	0.4842
BPU USAGE	62,948,688	
TOTAL PUMPED/BOUGHT	130,005,688	
DIST. #10 USAGE	4,157,980	
TOTAL SOLD	109,084,599	
UNMETERED USUAGE	3,150,000	
HYDRANT WATER SALES	350,125	
TOTAL CONSUMED	113,636,904	
DAILY AVERAGE		
DIFFERENCE	16,368,784	
GALLONS/CUST.	6,818	

Sec 8, Sch 6, p1of1 had 50,052,139 vs Sec 8, Sch 8, p 1of 1 had 58,805,100

Line No.	Month	Water Pumped Moran	Water Pumped Harper	Total Water Pumped	Water Purchased BPU "gallons"	Water Purchased BPU "CCF"	Cost of BPU Water
1	Nov-04	4,278,036	564,964	4,843,000	2,448,204	327,300	$4,251.25
2	Dec-04	3,867,352	545,648	4,413,000	2,545,444	340,300	$4,413.75
3	Sub-Total	8,145,388	1,110,612	9,256,000	4,993,648	667,600	$8,665.00
4	Jan-05	4,243,487	535,013	4,778,500	1,777,248	237,600	$3,130.00
5	Feb-05	4,056,380	532,120	4,588,500	2,238,764	299,300	$3,901.25
6	Mar-05	3,629,216	539,784	4,169,000	2,312,068	309,100	$4,023.75
7	Apr-05	4,194,366	529,634	4,724,000	2,791,536	373,200	$4,825.00
8	May-05	5,906,847	517,653	6,424,500	4,312,220	576,500	$7,366.25
9	Jun-05	6,348,146	519,654	6,867,800	4,480,520	599,000	$7,647.50
10	Jul-05	8,214,954	529,536	8,744,490	5,712,476	763,700	$9,706.25
11	Aug-05	6,647,857	521,543	7,169,400	4,585,988	613,100	$7,825.75
12	Sep-05	4,100,955	531,545	4,632,500	0		
13	Oct-05	3,711,672	531,328	4,243,000	3,579,180	478,500	$6,141.25
14	Nov-05	4,232,874	531,126	4,764,000	3,003,968	401,600	$5,180.00
15	Dec-05	4,273,936	532,564	4,806,500	3,380,960	452,000	$5,812.50
16	Sub-Total	59,560,690	6,351,500	65,912,190	38,174,928	1,332,100	$17,133.75
17	Jan-06	5,028,180	747,820	5,776,000	2,471,392	330,400	$4,290.00
18	Feb-06	4,135,600	682,400	4,818,000	3,136,364	419,300	$5,401.25
19	Mar-06	5,203,790	663,210	5,867,000	3,180,496	425,200	$5,475.00
20	Apr-06	4,687,860	686,140	5,374,000	4,173,092	557,900	$7,133.75
21	May-06	3,616,790	653,210	4,270,000	6,156,788	823,100	$10,448.75
22	Jun-06	4,774,790	645,210	5,420,000	6,143,324	821,300	$10,426.25
23	Jul-06	5,629,490	673,510	6,303,000	12,825,208	1,714,600	$21,592.50
24	Aug-06	4,526,000	793,000	5,319,000	6,400,636	855,700	$10,856.25
25	Sep-06	5,146,500	684,500	5,831,000	6,248,044	835,300	$10,601.25
26	Oct-06	5,185,500	721,500	5,907,000	4,479,024	598,800	$7,645.00
27	Nov-06	5,768,000	632,000	6,400,000	4,250,136	568,200	$7,262.50
28	Dec-06	5,102,600	669,400	5,772,000	3,484,184	465,800	$6,098.95
29	Sub-Total	58,805,100	8,251,900	67,057,000	62,948,688	8,415,600	$107,231.45
30	Jan-07	6,180,000	77,510	6,257,510	1,551,352	207,400	$2,804.35
31	Feb-07	6,582,500	60,600	6,643,100	219,164	29,300	$533.58
32	Mar-07	6,639,150	0	6,639,150	0		
33	Sub-Total	19,401,650	138,110	19,539,760	1,770,516	236,700	$3,337.93

Suburban Water Company
Moran and Harper Well Field Analysis
For the Years 2001, 2002, 2003, 2004, 2005, 2006

Moran Well Field

Line No.	Pump No.	Gallons 2001	Gallons 2002	Gallons 2003	Gallons 2004	Gallons 2005	Gallons 2006	Averages	Percentage Change	Gallons Jan - Mar 2007
1	1	39,469,800	34,913,700	33,753,700	22,608,500	19,758,500	15,215,850	27,620,008	-30.0%	3,097,000
2	2	14,513,900	17,526,500	14,401,900	13,256,000	22,558,700	24,225,235	17,747,039	22.3%	1,640,500
3	3	14,277,700	9,954,700	15,559,700	25,797,000	13,645,000	7,207,508	14,390,268	0.8%	1,361,000
4	4	2,324,500	4,280,600	10,613,100	1,535,000	4,106,000	1,701,773	4,093,496	76.1%	1,064,000
5	5	1,965,100	4,075,700	9,396,400	1,427,000	2,104,000	1,701,773	3,444,996	25.3%	-
6	6									4,257,000
7	7									7,512,700
8	Totals	72,551,000	70,751,200	83,724,800	64,623,500	62,072,200	50,052,139	67,295,807	-7.2%	19,132,200

Line No.	Harper Well Field									
	Pump No.	Gallons 2001	Gallons 2002	Gallons 2003	Gallons 2004	Gallons 2005	Gallons 2006	Averages	Percentage Change	Gallons Jan - Mar 2007
10	1		11,099,000	7,211,700	5,037,000	6,353,500	8,251,900	7,590,620	-25.7%	1,043,200
11	Total Pumped	72,551,000	81,850,200	90,936,500	69,660,500	68,425,700	58,304,039	73,835,388	-28.8%	20,175,400
12	KCKBPU Purchases		15,354,196	24,968,988	27,108,268	41,437,704	62,948,688	54,363,569	319.0%	2,666,864
13	Total Purchased & Pumped	72,551,000	97,204,396	115,905,488	96,768,768	109,863,404	121,252,727	108,198,957	24.7%	22,844,264
14	Water Sales									
15	Residential		79,820,357	86,201,630	73,601,712	94,839,584	109,084,599	88,709,576	8.0%	20,470,956
16	Wholesale		5,602,690	6,337,400	2,886,830	3,719,850	4,157,980	4,540,950	13.1%	21,120
17	Unmetered		1,926,400	14,567,430	4,100,000					1,500,000
18	Total		87,349,447	107,106,460	80,588,542	98,559,434	113,242,579	93,250,526	22.6%	21,992,076
19	Water Losses		9,854,949	8,799,028	16,180,226	11,303,970	8,010,148	14,948,430	-10.7%	852,188
20			10.1%	7.6%	16.7%	10.3%	6.6%	13.8%		3.7%

Only enter data into cell marked in blue — 2007

Monthly Well Meter Readings

— MASTER METER

	Moran 1	Moran 2	Moran 3	Moran 4	Moran 5	Moran 6	Moran 7	Harper	Total
12/30/2006	835070	364260	602480	158080	DOWN	22241	53421	257294	
1/30/2007	851720	372780	609390	162100	DOWN	30507	59035	265045	5,773,100
2/28/2007	866040	382665	616090	168720	DOWN	42571	75127	271105	7,174,100
3/30/2007	876163	400070	623835	178217	DOWN	50788	93616	271105	6,647,600
4/30/2007	887700	417475	631490	177715	DOWN	59288	112104	271105	6,808,300
5/30/2007	892905	437285	647680	180230	DOWN	67721	125250	271105	6,529,900
6/30/2007	900556	458124	667885	193230	DOWN	76512	143275	281254	9,366,000
7/30/2007	907850	468930	688090	206230	DOWN	83658	161300	292025	9,225,700
8/30/2007	915525	477560	708215	216210	DOWN	90765	178310	298310	7,680,200
9/30/2007	921645	493780	728502	217620	DOWN	98830	196965	298460	7,089,700
10/30/2007	926900	509040	738945	217970	DOWN	98830	215885	298450	5,022,800
11/30/2007	931800	523385	752745	226625	DOWN	99030	230940	298450	5,695,500
12/30/2007	938014	540395	770290	235302	DOWN	106213	230940	298450	5,662,900

	10,294,400	17,613,500	16,781,000	7,722,200		8,397,200	17,751,900	4,115,600
	13.10%	22.42%	21.36%	9.83%		10.69%	22.60%	

		Percentage
Total Gallons Pumped Moran	78,560,200	95.02%
Total Gallons Pumped Harper	4,115,600	4.98%

0.3328543

Total Water Pumped	**82,675,800**

2007 MUNICIPAL WATER USE REPORT (PUBLIC WATER SUPPLY)

PART B: MONTHLY WATER USE SUMMARY

SUBURBAN WATER COMPANY

NOTE: REPORT WATER PUMPED, PURCHASED, AND SOLD FOR THE MONTH OF ACTUAL USE. REPORT ALL AMOUNTS IN UNITS OF 1000 GALLONS.

10677 24951 1 / MUN

Column 1: The amount of water diverted, by month, from all points of diversion (wells or intakes). If possible, raw water meters should be read at the same time of the month as customer meters. The total amount in this column should equal the total of the amounts reported in PART A.

Column 2: The amount of water purchased, by month, from all other public water supply systems or the Kansas Water Office. Please provide further detail in PART E.

Column 3: The amount of water sold, by month, to all other public water supply systems. Please provide further detail in PART E.

Column 4: The amount of water sold, by month, to all industrial, pasture, stockwater, feedlot, and bulk water service connections. For rural water districts, include the amount of water sold to farmsteads using at least 200,000 gallons of water per year. Also include metered power plant usage, even if this water is supplied free.

Column 5: The amount of water sold, by month, to your residential, commercial and institutional customers (include hospitals, schools and prisons).

Column 6: The amount of water used, by month, that is metered at individual service connections and supplied free, such as for public service, treatment processes, and connections receiving free water. Please record metered power plant usage with industrial water use in Column 4.

Column 7: The amount of unaccounted for water, by month. The gallons reported in this column are found by adding the numbers in Columns 1 and 2 and subtracting the numbers in Columns 3, 4, 5, and 6. If you do not sell water to your customers, this column simply represents the total amount of water that you diverted or purchased.

Month	Column 1 Raw Water Diverted Under Your Rights (1000 Gallons)	Column 2 Water Purchased From All Sources (1000 Gallons)	Column 3 Water Sold to Other Public Water Suppliers (1000 Gallons)	Column 4 Water Sold to Your Industrial, Stock, and Bulk Customers (1000 Gallons)	Column 5 Water Sold to Your Residential and Commercial Customers (1000 Gallons)	Column 6 Metered Water Provided Free (1000 Gallons)	Column 7 Unaccounted For Water (See Above Explanation) (1000 Gallons)
Jan.	5733	1551	0	0	7182	118	25
Feb.	7174	219	6	0	6686	107	594
Mar.	6648	898	29	0	6570	104	845
Apr.	6808	3646	5	0	7419	123	2906
May	6520	4039	6	0	9162	111	1280
June	9366	1785	7	0	9847	133	1164
July	9226	5573	7	0	12603	532	2060
Aug.	7680	7382	732	0	12896	209	1279
Sept.	7090	6307	242	0	12981	146	29
Oct.	5023	3794	543	0	7914	107	253
Nov.	5696	4100	1349	0	7424	125	896
Dec.	5663	4722	1613	0	7284	109	1379
Total	82667	44037	4538	0	101919	1543	12328

PART C: POPULATION, SERVICE CONNECTIONS, AND WATER RATES

1. Population served: 3627 Estimate the number of persons served directly by your distribution system (Columns 5, 6, and 7).

2. Number of ACTIVE water service connections as of December 31:

a. 1433 Residential c. X Industrial e. X Other (specify) X

b. 18 Commercial/Institutional d. X Pasture/Stockwater/Feedlot f. 1451 Total ACTIVE Service Connections

3. If you are a city, how many of the active residential water service connections shown in 2a. are located outside of your city limits. _____

4. Date of last water rate change (Month and Year), 03/05 If rates changed during 2007, please attach a copy of new rate structures that apply to residential users.

Only enter data into cell marked in blue

Meters indicated by red text are no longer in service

2008 Monthly Well Meter Readings

Month		Moran 1	Moran 2	Moran 3	Moran 4	Moran 5	Moran 6	Moran 7	Harper	Total
Dec	12/30/2007	938014	540395	770290	235302	0	106213	230940	298450	
Jan	1/30/2008	944280	556735	788285	244480	0	113575	230940	298450	5,724,100
Feb	2/28/2008	949710	571390	804950	253010	0	119950	230940	298450	5,155,500
Mar	3/30/2008	955825	587950	815630	262105	0	127140	230940	298450	4,964,000
April	4/30/2008	963080	596020	837835	265110	0	134610	230940	298450	4,800,500
May	5/30/2008	966460	609640	851355	274550	0	140740	230940	298450	4,609,000
June	6/30/2008	975330	629430	869805	281035	0	145620	230940	298450	5,827,500
July	7/30/2008	983930	649550	886250	282155	0	159695	230940	298450	6,056,000
Aug	8/30/2008	991705	667045	894435	289240	0	166630	230940	298450	4,747,500
Sept	9/30/2008	415	685545	254104	294600	0	172035	230940	298450	5,707,800
Oct	10/30/2008	7270	695425	266480	295160	0	178350	230940	298450	3,598,600
Nov	11/30/2008	15330	702015	271540	295180	0	179158	230940	298450	3,053,800
Dec	12/30/2008	24350	734385	311060	298190	0	179566	230940	298450	7,232,800

Total		8,633,500	19,399,000	20,020,500	6,068,800		7,335,300	0	0
Percentage		14.04%	31.55%	32.57%	9.90%		11.93%	0.00%	

		Percentage
Total Gallons Pumped Moran	61,477,100	100.00%
Total Gallons Pumped Harper	0	0.00%

Total Water Pumped	**61,477,100**

2008 MUNICIPAL WATER USE REPORT (PUBLIC WATER SUPPLY)

PART B: MONTHLY WATER USE SUMMARY

NOTE: REPORT WATER PUMPED, PURCHASED, AND SOLD FOR THE MONTH OF ACTUAL USE. REPORT ALL AMOUNTS IN UNITS OF **1000 GALLONS.**

Column 1: The amount of water diverted, by month, from all points of diversion (wells or intakes). If possible, raw water meters should be read at the same time of the month as customer meters. The total amount in this column should equal the total of the amounts reported in PART A.

Column 2: The amount of water purchased, by month, from all other public water supply systems or the Kansas Water Office. Please provide further detail in PART E.

Column 3: The amount of water sold by month, to all other public water supply systems. Please provide further detail in PART E.

Column 4: The amount of water sold by month to all industrial, pasture, stockwater, feedlot, and bulk water service connections. For rural water districts, include the amount of water sold to farmsteads using at least 200,000 gallons of water per year. Also include metered power plant usage, even if this water is supplied free.

Column 5: The amount of water sold by month, to your residential, commercial and institutional customers (include hospitals, schools and prisons).

Column 6: The amount of water used, by month, that is metered at individual service connections and supplied free, such as for public service, treatment processes, and connections receiving free water. Please record metered power plant usage with industrial water use in Column 4.

Column 7: The amount of unaccounted for water, by month. The gallons reported in this column are found by adding the numbers in Columns 1 and 2 and subtracting the numbers in Columns 3, 4, 5, and 6. If you do not sell water to your customers, this column simply represents the total amount of water that you diverted or purchased.

Month	Column 1 Raw Water Diverted Under Your Rights (1000 Gallons)	Column 2 Water Purchased From All Sources (1000 Gallons)	Column 3 Water Sold to Other Public Water Suppliers (1000 Gallons)	Column 4 Water Sold to Your Industrial, Stock and Bulk Customers (1000 Gallons)	Column 5 Water Sold to Your Residential and Commercial Customers (1000 Gallons)	Column 6 Metered Water Provided Free (1000 Gallons)	Column 7 Unaccounted For Water (See Above Explanation) (1000 Gallons)
Jan	5724	5925	1928	0	7650	121	1951
Feb	5156	4796	1596	0	6814	112	1430
Mar	4964	4620	1487	0	6996	109	991
Apr	4801	4893	1588	0	7222	119	764
May	4609	7235	1347	0	9435	111	951
June	5828	8298	1751	0	9618	114	2643
July	6056	8872	1948	0	11904	151	926
Aug	4748	8847	2167	0	11030	130	367
Sept	5708	6149	1762	0	9655	67	373
Oct	3599	5435	506	0	7840	60	628
Nov	3054	4112	193	0	6925	22	25
Dec.	7233 est	5042 est	79	0	7938	71	4187
Total	61477 est	74224 est	16351	0	103028	1186	15136

PART C: POPULATION, SERVICE CONNECTIONS, AND WATER RATES

SUBURBAN WATER COMPANY

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1 Population served: _____ Estimate the number of persons served directly by your distribution system (Columns 5, 6, and 7).

2 Number of **ACTIVE** water service connections as of December 31.

a. 1449 Residential c. X Industrial e. X Other (specify) X

b. 18 Commercial/Institutional d. X Pasture/Stockwater/Feedlot f. 1509 Total ACTIVE Service Connections

3 If you are a city, how many of the active residential water service connections shown in 2a are located outside of your city limits: N/A

4 Date of last water rate change (Month and Year): 02/07 If rates changed during 2008, please attach a copy of new rate structures that apply to residential users.

Only enter data into cell marked in blue

Meters indicated by red text are no longer in service

2009 Monthly Well Meter Readings

Month		Moran 1	Moran 2	Moran 3	Moran 4	Moran 5	Moran 6	Moran 7	Harper	Total
Dec	12/30/2008	24350	784385	311080	296190	0	179566	230940	298450	
Jan	1/30/2009	35235	757350	328394	296190	0	179566	230940	298450	4,418,400
Feb	2/28/2009	40920	776370	339480	296190	0	179566	230940	298450	4,279,100
Mar	3/30/2009	49320	797145	339545	296190	0	16210	320450	298450	4,245,000
April	4/30/2009	57880	819385	345923	62545	0	0	320450	298450	4,237,550
May	5/30/2009	65595	836755	353790	145355	0	3	320450	298450	4,229,300
June	6/30/2009	73300	857975	368180	239185	0	3	320450	298450	5,264,800
July	7/30/2009	81950	881770	380025	344960	0	3	320450	298450	5,491,750
Aug	8/30/2009	90525	906445	394650	449735	0	3	320450	298450	5,835,250
Sept	9/30/2009	97425	926435	414530	533620	0	3	320450	298450	5,515,850
Oct	10/30/2009	104175	940435	432030	617505	0	3	320450	298450	4,663,850
Nov	11/30/2009	108270	957580	449520	667315	0	3	320450	298450	3,971,100
Dec	12/30/2009	116036	983820	470460	792440	0	3	320450	298450	7,145,750
	4095	7765	26240	24940	125125					
Total		9,168,500	24,943,500	15,940,000	7,924,400		1,321,300	0	0	
Percentage		15.46%	42.06%	26.88%	13.36%		2.23%	0.00%		

		Percentage
Total Gallons Pumped Moran	59,297,700	100.00%
Total Gallons Pumped BPU	0	0.00%
Total Water Pumped		59,297,700

Only enter data into cell marked in blue

BPU

BPU KT11750058

Reading & Usage Based on Data Collected By Suburban Water during normal reading cycle

Previous Read Date	Present Read Date	Previous Reading	Present Reading	Usage CFF	Usage Gallons	Water Charges	lieu of taxes	Adjustments	Ending Balance
12/5/2008	1/8/2009	392580	401067	8,487	6,348,276	$11,422.25	$1,130.80		$12,553.05
1/8/2009	2/6/2009	401067	408561	7,494	5,605,512	$10,104.54	$1,000.35		$11,104.89
2/6/2009	3/6/2009	408561	415053	6,492	4,856,016	$8,774.88	$868.71		$9,643.59
3/6/2009	4/6/2009	415053	421901	6,848	5,122,304	$9,247.30	$915.48		$10,162.78
4/6/2009	5/6/2009	421901	428966	7,065	5,284,620	$9,535.26	$943.99		$10,479.25
5/6/2009	6/5/2009	428966	438001	9,035	6,758,180	$12,149.45	$1,202.80		$13,352.25
6/5/2009	7/8/2009	438001	448586	10,585	7,917,580	$14,206.30	$1,406.42		$15,612.72
7/8/2009	8/7/2009	448586	459200	10,614	7,939,272	$14,245.76	$1,410.23		$15,655.01

Moran Well #6 (KDHE #Well 11)

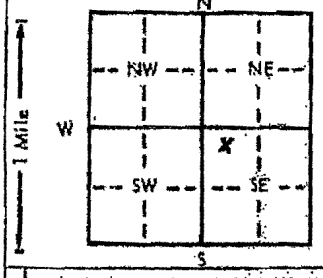
WATER WELL RECORD Form WWC-5 KSA 82a-1212

1 LOCATION OF WATER WELL:	Fraction	Section Number	Township Number	Range Number
County: Leavenworth	SW ¼ NW ¼ SE ¼	22	T 11 S	R 22 E

Distance and direction from nearest town or city street address of well if located within city?
1/8 miles S. Kansas Turnpike, 1/2 miles W. 158th ST. in SW City of Bucher

2 WATER WELL OWNER: Suburban Water Inc.
RR#, St. Address, Box # : 1216 N. 155th Street
City, State, ZIP Code : Basehor, KS 66007
Board of Agriculture, Division of Water Resources Application Number File No. 47,324

3 LOCATE WELL'S LOCATION WITH AN "X" IN SECTION BOX:



4 DEPTH OF COMPLETED WELL 59 TBC ft. ELEVATION: 935 land surface
Depth(s) Groundwater Encountered 1. 33 ft. 2. ft. 3. ft.
WELL'S STATIC WATER LEVEL 33 ft. below land surface measured on mo/day/yr 4/20/10
Pump test data: Well water was ft. after hours pumping gpm
Est. Yield gpm: Well water was ft. after hours pumping gpm
Bore Hole Diameter in. to ft., and in. to ft.
WELL WATER TO BE USED AS: (5) Public water supply 8 Air conditioning 11 Injection well
1 Domestic 3 Feedlot 6 Oil field water supply 9 Dewatering 12 Other (Specify below)
2 Irrigation 4 Industrial 7 Lawn and garden only 10 Monitoring well
Was a chemical/bacteriological sample submitted to Department? Yes No If yes, mo/day/yr sample was submitted Water Well Disinfected? Yes No

5 TYPE OF BLANK CASING USED: 5 Wrought iron 8 Concrete tile CASING JOINTS: (Glued) Clamped
1 Steel 3 RMP (SR) 6 Asbestos-Cement 9 Other (specify below) Welded
2 (PVC) 4 ABS 7 Fiberglass Threaded
Blank casing diameter 6 in. to ft. Dia in. to ft., Dia in. to ft.
Casing height above land surface in., weight lbs./ft. Wall thickness or gauge No.

TYPE OF SCREEN OR PERFORATION MATERIAL: 7 PVC 10 Asbestos-cement
1 Steel 3 Stainless steel 5 Fiberglass 8 RMP (SR) 11 Other (specify)
2 Brass 4 Galvanized steel 6 Concrete tile 9 ABS 12 None used (open hole)

SCREEN OR PERFORATION OPENINGS ARE: 5 Gauzed wrapped 8 Saw cut 11 None (open hole)
1 Continuous slot 3 Mill slot 6 Wire wrapped 9 Drilled holes
2 Louvered shutter 4 Key punched 7 Torch cut 10 Other (specify)

SCREEN-PERFORATED INTERVALS: From ft. to ft., From ft. to ft.
From ft. to ft., From ft. to ft.
GRAVEL PACK INTERVALS: From ft. to ft., From ft. to ft.
From ft. to ft., From ft. to ft.

6 GROUT MATERIAL: 1 Neat cement 2 Cement grout 3 Bentonite 4 Other
Grout Intervals: From ft. to ft., From ft. to ft., From ft. to ft.

What is the nearest source of possible contamination:
1 Septic tank 4 Lateral lines 7 Pit privy 10 Livestock pens 14 Abandoned water well
2 Sewer lines 5 Cess pool 8 Sewage lagoon 11 Fuel storage 15 Oil well/Gas well
3 Watertight sewer lines 6 Seepage pit 9 Feedyard 12 Fertilizer storage 16 Other (specify below)
13 Insecticide storage
Direction from well? How many feet?

FROM	TO	LITHOLOGIC LOG	FROM	TO	PLUGGING INTERVALS
6' *	25'	cement grout			
25'	31'	bentonite			
31'	59'	pea gravel			

* from Top Of Casing

7 CONTRACTOR'S OR LANDOWNER'S CERTIFICATION: This water well was (1) constructed, (2) reconstructed, or (3) (plugged) under my jurisdiction and was completed on (mo/day/year) April 20, 2010 and this record is true to the best of my knowledge and belief. Kansas Water Well Contractor's License No. KS 595 This Water Well Record was completed on (mo/day/yr) April 20, 2010 under the business name of Suburban Water, Inc. by (signature)

INSTRUCTIONS: Use typewriter or ball point pen. PLEASE PRESS FIRMLY and PRINT clearly. Please fill in blanks, underline or circle the correct answers. Send top three copies to Kansas Department of Health and Environment, Bureau of Water, Topeka, Kansas 66620-0001. Telephone: 913-296-5545. Send one to WATER WELL OWNER, and retain one for your records.

OFFICE USE ONLY T R E/W SEC. ¼ ¼ ¼

Moran Well #7 (KDHE WELL #12)

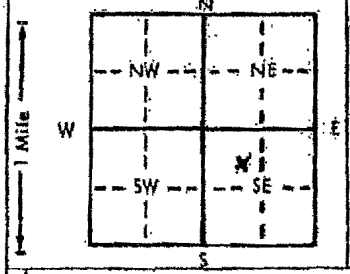
WATER WELL RECORD Form WWC-5 KSA 82a-1212

1 LOCATION OF WATER WELL: County: Leavenworth | Fraction: SW ¼ NW ¼ SE ¼ | Section Number: 22 | Township Number: T 11 S | Range Number: R 22 E/W

Distance and direction from nearest town or city street address of well if located within city?
1/8 mile S. Kansas Turnpike, 1/2 mile W. 158th Street in SW City of Basehor

2 WATER WELL OWNER: Suburban Water, Inc.
RR#, St. Address, Box # : 1216 N. 155th Street
City, State, ZIP Code : Basehor, KS 66007
Board of Agriculture, Division of Water Resources Application Number: 47,324

3 LOCATE WELL'S LOCATION WITH AN "X" IN SECTION BOX:



4 DEPTH OF COMPLETED WELL: 63 TOC ft. ELEVATION: 935 land surface
Depth(s) Groundwater Encountered 1: 35 ft. 2: ft. 3: ft.
WELL'S STATIC WATER LEVEL: 35 ft. below land surface measured on mo/day/yr 04/20/10
Pump test data: Well water was ft. after hours pumping gpm
Est. Yield gpm: Well water was ft. after hours pumping gpm
Bore Hole Diameter in. to ft. and in. to ft.
WELL WATER TO BE USED AS: (5) Public water supply 8 Air conditioning 11 Injection well
1 Domestic 3 Feedlot 6 Oil field water supply 9 Dewatering 12 Other (Specify below)
2 Irrigation 4 Industrial 7 Lawn and garden only 10 Monitoring well
Was a chemical/bacteriological sample submitted to Department? Yes No If yes, mo/day/yr sample was submitted Water Well Disinfected? Yes No

5 TYPE OF BLANK CASING USED: 5 Wrought iron 8 Concrete tile CASING JOINTS: (Glued) Clamped
1 Steel 3 RMP (SR) 6 Asbestos-Cement 9 Other (specify below) Welded
2 (PVC) 4 ABS 7 Fiberglass Threaded
Blank casing diameter 6 in. to ft., Dia in. to ft., Dia in. to ft.
Casing height above land surface in., weight lbs./ft. Wall thickness or gauge No.

TYPE OF SCREEN OR PERFORATION MATERIAL: 7 PVC 10 Asbestos-cement
1 Steel 3 Stainless steel 5 Fiberglass 8 RMP (SR) 11 Other (specify)
2 Brass 4 Galvanized steel 6 Concrete tile 9 ABS 12 None used (open hole)

SCREEN OR PERFORATION OPENINGS ARE: 5 Gauzed wrapped 8 Saw cut 11 None (open hole)
1 Continuous slot 3 Mill slot 6 Wire wrapped 9 Drilled holes
2 Louvered shutter 4 Key punched 7 Torch cut 10 Other (specify)

SCREEN-PERFORATED INTERVALS: From ft. to ft., From ft. to ft.
From ft. to ft., From ft. to ft.
GRAVEL PACK INTERVALS: From ft. to ft., From ft. to ft.
From ft. to ft., From ft. to ft.

6 GROUT MATERIAL: 1 Neat cement 2 Cement grout 3 Bentonite 4 Other
Grout Intervals: From ft. to ft., From ft. to ft., From ft. to ft.

What is the nearest source of possible contamination:
1 Septic tank 4 Lateral lines 7 Pit privy 10 Livestock pens 14 Abandoned water well
2 Sewer lines 5 Cess pool 8 Sewage lagoon 11 Fuel storage 15 Oil well/Gas well
3 Watertight sewer lines 6 Seepage pit 9 Feedyard 12 Fertilizer storage 16 Other (specify below)
13 Insecticide storage
Direction from well? How many feet?

FROM	TO	LITHOLOGIC LOG	FROM	TO	PLUGGING INTERVALS
5'*	25'	cement grout			
25'	31'	bentonite			
31'	63'	pea gravel			

* from TOP OF CASING

7 CONTRACTOR'S OR LANDOWNER'S CERTIFICATION: This water well was (1) constructed, (2) reconstructed, or (3) plugged under my jurisdiction and was completed on (mo/day/year) April 20, 2010 and this record is true to the best of my knowledge and belief. Kansas Water Well Contractor's License No. KS 595. This Water Well Record was completed on (mo/day/yr) April 20, 2010 under the business name of Suburban Water, Inc. by (signature)

INSTRUCTIONS: Use typewriter or ball point pen. PLEASE PRESS FIRMLY and PRINT clearly. Please fill in blanks, underline or circle the correct answers. Send top three copies to Kansas Department of Health and Environment, Bureau of Water, Topeka, Kansas 66620-0001 Telephone: 913-296-5545. Send one to WATER WELL OWNER and retain one for your records.

KANSAS
DEPARTMENT OF AGRICULTURE

Mark Parkinson, Governor
Adrian J. Polansky, Secretary

www.ksda.gov/dwr

June 18, 2009

SUBURBAN WATER INC
1216 N 155TH STREET
BASEHOR KS 66007-0147

Re: Application
File No. 47,324

Dear Sir or Madam:

We have conducted an initial review of your application, proposing the appropriation of 26.3 million gallons (80.7 acre-feet) of groundwater to be pumped at a rate of 190 gallons per minute (95 gallons from each well of a two well battery) for municipal use. The geographic center of the proposed well battery is located in the Southeast Quarter of Section 22, Township 11 South, Range 22 East in Leavenworth County. The application is being returned to you so that additional information can be provided to this office.

It appears that the source of water for your wells would be glacial drift deposits, which according to K.A.R. 5-4-4, requires a minimum well spacing of 1,320 feet from all other senior authorized non-domestic wells in the same aquifer. Well spacing distance for a battery of wells shall be measured from the geographic center of the points of diversion comprising the battery. As you were previously informed, based on the location of the geographic center for your proposed well battery, it does not meet minimum well spacing requirements to your well battery authorized under Appropriation of Water, File Nos. 39,287 and 41,844, nor the well authorized under Appropriation of Water, File No. 42,733. In order to support a reduced well spacing, you must submit an engineering report or similar type of hydrologic analysis to show that well spacing can be decreased without impairing existing water rights or prejudicially and unreasonably affecting the public interest. The burden shall be on the applicant to make such a showing to the satisfaction of the chief engineer.

In addition, the Division of Water Resources does not have adequate hydrologic information regarding the aquifer in this local area; therefore we are unable to determine what potential impact the proposed appropriation of ground water would have on existing water rights. There are multiple domestic well owners and municipal water rights within one-half mile of the proposed point of diversion. In conjunction with the information requested above, your detailed hydrologic report must show that this localized aquifer can support further appropriation of water without impairing any senior water right. The report must include the estimated extent of the aquifer, site specific hydrologic data (e.g. long term pump tests) estimating the maximum drawdown expected, and evaluating the potential impact on nearby wells. In addition, the data submitted must include a map depicting the saturated thickness of the aquifer in the immediate area. All report preparation and analysis must be completed by an engineering or scientific firm acceptable to the DWR.

You must utilize an accepted ground water modeling program to accurately evaluate the potential long-term impact to senior water rights. Modeling results should include locations of proposed observation wells and specific "trigger" levels or other conditions under which your proposed battery of wells could be operated without impairing existing water rights. Of course, DWR would review any data you submit to determine if we are in agreement with your modeling results.

Based on the above information, it will be recommended to the Chief Engineer that Application, File No. 47,324, be denied and dismissed due to the failure to meet minimum well spacing criteria, required by K.A.R. 5-4-4. We are advising you of this recommendation in order to allow you an opportunity to submit additional information to show why our evaluation should be reconsidered. **You have a period of 15 days (until July 6, 2009 to either (1) submit additional information to our office or (2) request additional time beyond the 15 days to submit additional information.** If you wish to request additional time, you must do so **in writing**, before the 15 day period expires. Such a request should state what steps are being taken to obtain the information and the amount of time you will need to supply the information to our office.

If you do not request more time within the 15 day period, or if your request is not granted, the above-referenced application will be submitted to the Chief Engineer for final decision based on the recommendation stated above. Any relevant credible information submitted within the time allowed will be given due consideration, prior to final action on the application. According to the law, default in the refiling of the completed application and attachments as outlined above, within the time allowed, shall constitute forfeiture of priority date and dismissal of the application.

If you have any questions, please contact me at (785) 296-3495. If you wish to discuss a specific file, please have the file number ready so that I may help you more efficiently.

Sincerely,

Doug Schemm

Douglas Schemm
Environmental Scientist
Permits Unit

Enclosures

pc: Topeka Field Office
Cathy Tucker-Vogel, KDHE Bureau of Water
Taylor Design Group, PA

Taylor Design Group, P.A.
Surveyors • Engineers

June 24, 2009

Douglas Schemm
Kansas Department of Agriculture
Division of Water Resources
109 SW 9th Street, 2nd Floor
Topeka, KS 66612-1283

Re: Request for Time Extension
Application File No. 47,324

Dear Mr. Schemm:

On behalf of Suburban Water, Inc., we are requesting additional time to be able to research and obtain the additional information required for Application File No. 47,324. This application consists of a battery of two wells located in the Southeast Quarter of Section 22, Township 11 South, Range 22 East, in Leavenworth County.

Suburban Water, Inc. has commissioned our office to gather and submit the necessary information to the Division of Water Resources in order to complete a thorough review of the file application, as per your letter dated June 18, 2009. At this time, we are requesting a 60 day extension of time in order to complete research for the additional information required.

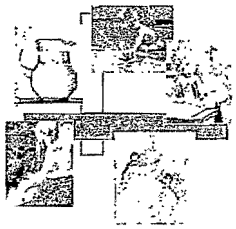
If there are any questions or if additional information is needed at this time, please contact our office.

Sincerely,

Cara C. Hendricks

Cara C. Hendricks, P.E.
Project Manager

pc: Mike Breuer, Suburban Water, Inc.



SUBURBAN WATER, INC.
info@suburbanwaterinc.com
1216 N. 155TH STREET, P.O. BOX 147
BASEHOR, KS 66007
TELEPHONE 913.724.1800 FAX 913.724.1505

August 31, 2009

Doug Schemm
Environmental Scientist – Permits Unit
Division of Water Resources
Kansas Department of Agriculture
109 SW 9th Street, Second Floor
Topeka, KS 66612-1283

RE: Request for Time Extension
File No. 47,324 - Moran Wells Nos. 6 & 7

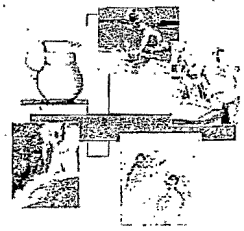
This letter is follow-up to your August 7, 2009 letter (copy enclosed) to us. We are requesting an extension in time of 90 days for us to complete the work for the referenced file number. We are in the process of negotiating a contract with Aquaterra to perform a study of the subject aquifer and the referenced two wells. In addition, there has been a change in personnel at the consulting firm that we have been using to assist us in this work.

Sincerely,

Raphael D. Breuer
President

enc.

ec: Katie Tietsort w/enc



SUBURBAN WATER, INC.
info@suburbanwaterinc.com
1216 N. 155TH STREET, P.O. BOX 147
BASEHOR, KS 66007
TELEPHONE 913.724.1800 FAX 913.724.1505

December 3, 2009

Doug Schemm
Environmental Scientist – Permits Unit
Division of Water Resources
Kansas Department of Agriculture
109 SW 9th Street, Second Floor
Topeka, KS 66612-1283

RE: Application File No. 47,324
Moran Wells Nos. 6 & 7

Thank you for your reminder letter of November 18, 2009. Suburban Water has decided to abandon the referenced wells and requests that Application File No. 47,324 be dismissed. We understand that this action will forfeit the priority date for this application.

The pumping units were removed from each of the wells on November 6, 2009. As soon as the weather permits this spring, we will have each of the wells plugged pursuant to the applicable KDHE regulations.

Sincerely,

Raphael D. Breuer
President

RECEIVED
DEC 11 2009
KANSAS CORP. COMM.

SCANNED

WATER RESOURCES
RECEIVED
DEC 04 2009
KS DEPT OF AGRICULTURE

ec: Katie Tietsort
pc: Cathy Tucker-Vogel, KDHE

E:\KansasDivisionOfWaterResources\MoranWells\Wells6&7\letterSchemmAbandon120309

Kansas Corporation Commission
Information Request

Request No: 42

Company Name	SUBURBAN WATER CO.	SUBW
Docket Number	11-SUBW-448-RTS	
Request Date	February 15, 2011	
Date Information Needed	February 24, 2011	

RE: Division of Water Resources File No. 47,324

Please Provide the Following:

On August 31, 2009, the Suburban Water Company requested by letter a 90-day extension of time from the Division of Water Resources (File # 47,324) to provide the necessary engineering and hydrologic data proving that the Moran #6 and #7 wells didn't impair the existing water rights in the area. The letter stated that Suburban was negotiating with Aquaterra to perform a study of the subject aquifer and the referenced two wells. Please provide the following with regard to this letter.

1. Please provide all correspondence between Aquaterra and Suburban Water Company relating to the Moran #6 and Moran #7 wells, the aquifer that these wells tap into, application # 47,324, etc.
2. Was Aquaterra ever contracted to provide the study that Suburban refers to in this letter? If not, please provide an explanation as to why this study was not performed. If so, please provide a copy of the report generated as a result of the study.
3. If Aquaterra was not contracted to provide the service, was there another consulting or engineering firm contracted to provide the service, such as the Taylor Design Group? If so, please provide all correspondence between Suburban Water Company and the consulting/engineering firm contracted to perform the study.

Submitted By Justin Grady

Submitted To Mike Breuer

If for some reason, the above information cannot be provided by the date requested, please provide a written explanation of those reasons.

Verification of Response

I have read the foregoing Information Request and answer(s) thereto and find answer(s) to be true, accurate, full and complete
and contain no material misrepresentations or omissions to the best of my knowledge and belief, and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: _____

Date: 2/24/11

Suburban Water Co.
Docket No. 11-SUBW-448-RTS
KCC Information Request Answers

Request No. 42
RE: Division of Water Resources File # 47,324

1. Please see attached files
2. See attached correspondence between Bruse Hall, SWC in-house engineer, Aquarterra and the Taylor Design Group sent from Aquaterra's John Rockhold to Cara Hendricks, Taylor Design Group, indicating the project's scope and cost estimates ranging from $23,500 to $62,500. SWC did not have the funds to undertake this study.
3. Cara Hendricks was contacted to assist SWC with the DWR. Cara Hendricks contacted Aquarterra on behalf of SWC. See attached correspondence and emails.

From: Cara Hendricks [carahendricks@taylordesigngroup.net]
Sent: Tuesday, June 02, 2009 2:41 PM
To: 'Bruce Hall'
Subject: RE: Copy of Application for DWR
Thank you. I'll keep you updated.

Cara C. Hendricks, P.E.
Taylor Design Group, P.A.
Phone: 785-242-8845

From: Bruce Hall [mailto:bruce@suburbanwaterinc.com]
Sent: Tuesday, June 02, 2009 2:36 PM
To: 'Cara Hendricks'
Subject: RE: Copy of Application for DWR

Mike and I have reviewed the attached application and have no comments. Please submit the application to the DWR. Thank you.

Attached is a signed authorization for the additional services that we discussed during our telephone conversation on this date.

From: Cara Hendricks [mailto:carahendricks@taylordesigngroup.net]
Sent: Tuesday, June 02, 2009 10:45 AM
To: 'Bruce Hall'
Subject: Copy of Application for DWR

Here is a copy of the application (with attachments) that I was going to submit to DWR. Please let me know if you have any questions.

Thanks.

Cara C. Hendricks, P.E.
Taylor Design Group, P.A.
Phone: 785-242-8845

From: Bruce Hall [mailto:bruce@suburbanwaterinc.com]
Sent: Tuesday, June 02, 2009 10:04 AM
To: 'Cara Hendricks'
Subject: Signed Engineering Services Proposal

Today the original signed document is being transmitted to you, 1220 E. Logan, Ottawa, via the US Mail.

We would like to see an electronic copy of the application today before your submittal to the DWR. Thank you.

From: Cara Hendricks [mailto:carahendricks@taylordesigngroup.net]
Sent: Friday, May 29, 2009 11:46 AM
To: 'Mike Breuer'
Cc: 'Bruce Hall'

From: Bruce Hall [bruce@suburbanwaterinc.com]
Sent: Tuesday, September 22, 2009 3:03 PM
To: Mike Breuer
Cc: Trish Peterson ; Travis Miles
Subject: Cara Hendricks formerly with Taylor Design Group

At 2:37 PM on 092209, I telephoned the Taylor Design Group (1.785.242.8845) to speak with the person that would be following-up on our contract with them. I spoke with Todd Burrows (sp?) and he said that they were getting out of the civil engineering business and would be sending us a letter very soon terminating our contract with them. Todd indicated that enclosed with that letter will be copies of all of the documents that they have related to the work that they have done to date.

In response to my inquiry, Todd indicated that Cara had been working with John Rockhold (sp?) with Aquaterra in Overland Park (913.681.0030) for a possible hydrologic study of the Moran Wells #6 & 7 for submittal to the Kansas Department of Water Resources for permits to operate these wells. Todd indicated that his contact at Aquarerra is Floyd Cotter.

Todd indicated that Cara went to work for BJ Consultants in Lawrence.

From: Schemm, Doug [Doug.Schemm@KDA.KS.GOV]
Sent: Thursday, July 16, 2009 3:43 PM
To: carahendricks@taylordesigngroup.net
Subject: Suburban Water

Cara,

It was a pleasure to meet with you last week regarding Suburban Water , File No. 47,324. You had requested a specific contact regarding potential questions related to proposed groundwater modeling efforts for this project. You should contact Chris Beightel, who leads the Technical Services Group at DWR. His phone No. is 785-296-3830, and e-mail is Chris.Beightel@kda.ks.gov. Let me know if you need anything else.

Doug Schemm

11-06-09
Allen B.

Moran Wells

BN #7
06K18-27-0405
model #
234317S202
HP 5 V 230 3Ph

N #6
069E-21-0473
model 234317SE02
3Ph 5 HP

From: Cara Hendricks [carahendricks@taylordesigngroup.net]
Sent: Monday, July 27, 2009 4:49 PM
To: 'Mike Breuer'
Cc: 'Bruce Hall'
Subject: Project Update

Dear Mike:

The purpose of this email is to update you and Bruce Hall as to the status of the various projects that we are working on for Suburban Water, Inc. The applicable project items are listed below, along with the recommended actions in order to complete each item.

1. Monitoring Plan Update – Discussions with KDHE and the EPA regional office have indicated that Suburban Water can wait until the Stage 2 DBPR testing is completed to revise and submit its monitoring plan. Per our letter dated July 22, 2009 to Kelly Kelsey with KDHE regarding Suburban Water Inc.'s monitoring plan (see attached copy), Suburban Water is currently in the process of completing the necessary testing to comply with the Stage 2 DBPR. This testing should be completed by November of this year. At that time, the monitoring plan will be updated, as necessary, based on the findings of the IDSE report (which will also be submitted to the EPA at that time).

2. Permitting for Moran Wells 3 & 4 – Per our discussion last Friday, we are going to have to put together some plans and specifications for the existing wells. KDHE is requiring submittals of plans and specifications subject to review and approval for these two existing wells. After my discussion with you last week, it appears that Suburban Water has very limited (if any) existing information at its disposal for use in preparing these items.

   You asked that I prepare these items, as necessary, in order to get the wells approved. We may have to piece what little information we have together, and possibly work with KDHE to see if a field visit to the site would be beneficial and/or possible. Again, any information that may be available (i.e. invoices/cut sheets for installed equipment, sizes and type of casing that was installed, etc.) will be helpful. If necessary, in order to gain approval from KDHE for these wells, Suburban Water may have to re-construct these wells in accordance with submitted plans and specifications.

   In order to proceed with this item, I will need to gather from you any information regarding the construction of these wells. Even some digital photos of the wells and equipment may be helpful. We will also need to show how these wells have been connected to the system.

3. Permitting for Moran Wells – 6 & 7 – We have been coordinating with KDHE and DWR for the permitting of wells no. 6 & 7 from the Moran Well Field. I met with the DWR to discuss the requirements for the groundwater study, and am still awaiting a revised scope of work and proposal from Aquaterra to perform the work. Once I receive a proposal for the project, I will forward it to you for your review and approval.

   If the groundwater study concludes that the new wells will not impair the other existing wells in the area, and DWR reviews and approves the study, we can

proceed with the development of plans and specifications for these wells. As previously discussed, KDHE is requiring plans, specifications, well logs, and water quality analysis for these wells to be submitted to the state for review and approval.

4. Compliance with the New Ground Water Rule – Discussions with KDHE personnel, and a review of the rule indicate that the first step in compliance with this rule is to check if Suburban Water's system meets the 4-log virus treatment for all of its groundwater sources. KDHE has developed a simple form (see attached "sample" form entitled "Understanding CT"; an electronic version of this file is available at the following website: http://www.kdheks.gov/pws/download/groundwater/CT_calculation_for_Ground_Water_Rule.xls).

   If it is determined that Suburban Water **does** meet the 4-log virus treatment for all of its groundwater sources, a notification letter must be submitted to KDHE with the appropriate attachments (see attached "4-log Notification Letter to KDHE").

I will continue to coordinate with you and Bruce in order to complete these items. Please contact me if you have any questions. I will be out of the office tomorrow (Tues,, July 28th) but will be back in on Wed., July 29th.

Cara C. Hendricks, P.E.
Taylor Design Group, P.A.
Phone: 785-242-8845

From: Cara Hendricks [carahendricks@taylordesigngroup.net]
Sent: Thursday, August 27, 2009 4:59 PM
To: 'Bruce Hall'; 'Mike Breuer'
Subject: Request for Extension Letter

Bruce and Mike:

Attached is a PDF of the letter that was sent to you regarding Application File No. 47,324. We had previously requested an extension for this file which will expire on Sept. 6th. You will need to submit a letter to the Division of Water Resources requesting an extension if you wish to continue to pursue the possibility of completing a groundwater study for the two new wells. I have yet to receive a revised scope of services with costs from Aquaterra for the study; however, they have indicated that it will be rather costly, and may not have the result that you would like.

<<...>>

Also, I want to inform you that I am leaving Taylor Design Group, and today is my last day here. I have really enjoyed working with you, and wish you both the best with all of your future endeavors.

Thank you.

-Cara Hendricks

Meeting time?

From: Bruce Hall [bruce@suburbanwaterinc.com]
Sent: Tuesday, June 30, 2009 10:58 AM
To: 'Cara Hendricks'
Cc: 'Mike Breuer'
Subject: RE: Meeting time?

Mike and I are available between 9:00 AM and 3:00 PM on the following dates:

Wednesday, July 1st
Wednesday, July 8th
Thursday, July 9th

From: Cara Hendricks [mailto:carahendricks@taylordesigngroup.net]
Sent: Tuesday, June 30, 2009 8:27 AM
To: 'Bruce Hall'
Cc: 'Mike Breuer'
Subject: Meeting time?

Bruce:

Something has come up today, and I won't be able to make it out that way (per my previous email). Will another time this week work for you? (I will be out of the office on Friday, July 3rd.)

Please let me know. Thanks.

Cara C. Hendricks, P.E.

Taylor Design Group, P.A.

Phone: 785-242-8845

From: John Rockhold [JRockhold@aquaterra-env.com]
Sent: Wednesday, September 23, 2009 9:34 AM
To: bruce@suburbanwaterinc.com
Subject: FW: Suburban Water Proposal
Bruce,

This is the info Cara picked up at her meeting with the State.

Our rough scope and estimate follows.

Thanks, John

John R. Rockhold, P.G., CGWP
Senior Project Manager

AQUATERRA
Environmental Solutions, Inc.

7311 West 130th Street, Suite 100
Overland Park, Kansas 66213
Office: (913) 681-0030, ext 221
Fax: (913) 681-0012
Mobile: (913) 302-8254
jrockhold@aquaterra-env.com
www.aquaterra-env.com

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We are one of 200 fastest-growing A/E/P and Environmental Consulting Firms!

From: Cara Hendricks [mailto:carahendricks@taylordesigngroup.net]
Sent: Monday, July 20, 2009 9:50 AM
To: John Rockhold
Cc: Floyd Cotter
Subject: Suburban Water Proposal

John and Floyd:

I met with DWR to find out what would be required for the groundwater modeling for the Suburban Water project. Doug Schemm said that he would get me the contact information for someone from the Technical Services Group that will be reviewing the study in order to provide more technical information as to what will be required with the modeling. (See the attached email for the contact information.)

I also perused through the Water Office files, and found some information (although rather limited) from the file application that was submitted with the RWD wells that were installed in the area. Specifically, there is some correspondence regarding the RWD's well source and formations in the area from Bob Vincent with Groundwater Associates, Inc. I am sending you PDF copies of all of the information that I copied from the DWR files. See the

the file application that was submitted with the RWD wells that were installed in the area. Specifically, there is some correspondence regarding the RWD's well source and formations in the area from Bob Vincent with Groundwater Associates, Inc. I am sending you PDF copies of all of the information that I copied from the DWR files. See the attached folder containing the PDF files.

I would like to get a revised scope together for the proposal for Suburban Water, Inc. I think that it may help to have John contact Chris Beightel from DWR (see attached email for contact info) to discuss what will be required for the study prior to submitting a revised scope and proposal.

Please contact me when you are available to discuss these items.

Sincerely,

Cara C. Hendricks, P.E.
Taylor Design Group, P.A.
Phone: 785-242-8845

From: John Rockhold [mailto:JRockhold@aquaterra-env.com]
Sent: Wednesday, July 08, 2009 4:14 PM
To: carahendricks@taylordesigngroup.net
Cc: Floyd Cotter; Susan McCart
Subject: Suburban Water

Hi Cara

We have reviewed the June 18, 2009 letter from DWR and it appears they are requesting a relatively significant evaluation of the aquifer. We suggest a meeting with DWR to try to narrow and nail down exactly what they are looking for. Currently they are requesting a hydrogeologic report with the estimated extent of the aquifer, site specific aquifer data (from pump tests), estimated maximum drawdown, map of saturated thickness of aquifer, and potential impact on nearby wells based on modeling. As discussed on the phone, relocating the wells to be the required minimum of 1,320 feet away from the other non-domestic wells may be a viable option; if acceptable to DWR. Without knowing the extent of the already available data it makes it very difficult for us to Scope and Cost the required effort to meet DWR's current request. A very draft Scope and Cost outline of our current understanding to meet the DWR request is provided below.

Background Research – Find and evaluate the existing data ($1,500 to 2,500)
- Boring logs
- Aquifer data
- Water well records
- Literature

Data Collection – Collect the necessary data to fill in data gaps ($10,000 to $40,000)
- Current Water Levels
- Surveying
- Pump Test – existing well(s)
  - Design
  - Observation wells
  - Pumping test (72 hrs or more)
  - Analysis

Modeling – Multi-well flow modeling to determine relationship between all existing wells ($8,000 to $12,000)
Visual MODFLOW (likely software for modeling)

Report Preparation ($4,000 to $8,000) Hydrologic Study

≤ $23,500 to $62,500±

Thanks, John

John R. Rockhold, P.G., CGWP
Senior Project Manager

AQUATERRA
Environmental Solutions, Inc.

7311 West 130th Street, Suite 100
Overland Park, Kansas 66213
Office: (913) 681-0030, ext 221
Fax: (913) 681-0012
Mobile: (913) 302-8254
jrockhold@aquaterra-env.com
www.aquaterra-env.com

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9/23/2009

KANSAS

DEPARTMENT OF AGRICULTURE
ADRIAN J. POLANSKY, SECRETARY

KATHLEEN SEBELIUS, GOVERNOR

SUBURBAN WATER COMPANY
PO BOX 147
BASEHOR KS 66007

October 29, 2003

RE: Application
File Nos. 44,055 and 44,056

Dear Sir/Madam:

The following letter is the primary text of the letter as was sent to Suburban Water Company on October 3, 2003. The information that was requested in the October 3, 2003 letter is needed before the above referenced applications can be further processed. During the October 28, 2003, meeting between Ray Breuer, Mike Breuer, Iona Branscum and myself, discussing the October 3, 2003, letter that was sent, it was learned that the applications may be modified by the applicant as such: location of wells, changing single wells to batteries of wells, rates of diversion, place of use (adding Leavenworth No. 6) and the quantity of water per calendar year that can be justified. This information, plus the original applications must be returned to this office by December 1, 2003, or any authorized extension thereof. Any modifications made to the original applications should be initialed and dated by the applicant.

Information available in this office indicates that the quantity of water that can be justified by projections through 2020, appears to be 198.261 million gallons of water per calendar year, which includes 26 million gallons of water per calendar year for Rural Water District No. 10, Leavenworth County. The quantity of 198.261 million gallons of water per calendar year is the maximum quantity of water that can be diverted by the water rights developed by Suburban Water Company under File Nos. 37,167; 37,246; 37,247; 39,184; 39,287; 41,844; 42,733; 44,055 and 44,056. Based upon your senior water rights, this would be 63.161 million gallons of water per calendar year above that already authorized. The Approval of Application and Permit to Proceed for File Nos. 44,055 and 44,056, when and if signed, will both show a quantity of water per calendar year limitation of 198.261 million gallons of water per calendar year limitation when combined with the above referenced senior files.

It has been determined that within the area of consideration for both pending applications, there is 232.785 million gallons (714.4 acre-feet) additional water per calendar year available for appropriation. Your applications request a combined quantity of 320 million gallons (982 acre-feet). Please indicate how you wish the 232.785 million gallons be divided between Application, File Nos. 44,055 and 44,056.

The maximum annual quantity of water justified by the information supplied, is 198.261 million gallons of water per calendar year based upon projections through 2020. If you have additional, or more current information about growth projections through 2023, that information can be considered in a reevaluation of the maximum reasonable annual quantity of water for your municipal system.

Our records indicate that this office has not received names and addresses of nearby well owners located within a one-half mile radius circle of either point of diversion for File No. 44,055 and 44,056. This information is needed as nearby well owners will be notified of the proposed appropriations. Owners of wells used for domestic use also need to be included in this list.

Information in this office indicate that the proposed well for Application, File No. 44,055, does not meet the minimum of 1,320 feet spacing to municipal wells, also being operated by Suburban Water Company. Either the well location must be modified such that spacing to all other non-domestic wells is 1,320 feet or greater, and spacing to all domestic wells is 660 feet or greater, or a waiver of spacing will need to be requested and scientific information be supplied to justify the granting of such waiver.

Information in this office indicate the source of supply for the proposed diversions is buried glacial deposits of the Kansan age. The aquifer proposed to be utilized has unique characteristics that will require additional information to be submitted before the applications can be further processed. This information is needed to determine the potential for impairment to nearby municipal wells and nearby domestic wells. It may be determined, with information submitted, that the applications could be approved with rates of diversion less than requested per file. The requested maximum rate of diversion of 800 gallons per minute per application may be excessive considering the aquifer. Please provide sufficient scientific information that will indicate the aquifer can safely yield the requested 800 gallons per minute per file, or modify the requested rate of diversion to a reasonable rate of diversion per file. Existing wells in this aquifer currently produce at significantly lower rates of diversion.

If the application(s) are approved, special conditions and requirements may be needed to insure that the source of water is not being over utilized and to prevent impairment to senior water rights. This would likely include the installation of and routine monitoring of an observation well(s).

Applications for Approval to Change the place of Use, the Point of Diversion or the Use made of Water of the Water Right Under an Existing Water Right were submitted to this office for Appropriation of Water, File Nos. 37,167; 37,247; 39,184; 39,287; 41,844 and 42,733. It appears these applications may need to be modified, adding the aforementioned RWD No. 6, Leavenworth County. If this addition is needed for these applications, or any other addition is needed, please request the modification and the "Change Applications" will be modified as such.

In order that the applications will retain their priority of filing, the original applications and attachments must be returned, with any corrections dated and signed, to this office on or before December 1, 2003, or within any authorized extension of time thereof. According to the law, default in the refiling of the completed application and attachments as outlined above, within the time allowed, shall constitute forfeiture of priority date and dismissal of the application.

If you have any questions, please contact me (785-296-3494) at this office. If you wish to discuss a specific file, please have the file number ready so that we may help you more efficiently.

Sincerely,

Douglas E. Bush

Douglas E. Bush
Environmental Scientist
Water Appropriation Program

DEB
Enclosure(s)
pc: Topeka Field Office

KANSAS

DEPARTMENT OF AGRICULTURE
ADRIAN J. POLANSKY, SECRETARY

KATHLEEN SEBELIUS, GOVERNOR

SUBURBAN WATER COMPANY
PO BOX 147
BASEHOR KS 66007

January 22, 2004

RE: Application
File Nos. 44,055 and 44,056

Dear Sir/Madam:

The above referenced applications have been reviewed as per previous letters sent to you, and telephone conversations and meetings between Mike Breuer, Ray Breuer and myself. It appears additional information is needed before we can further process either application. We are returning the applications and attachments so that you may have the opportunity to supply the additional information that is needed.

Letters were sent to nearby well owners on December 19, 2003, informing them of the proposed appropriations pertaining to Application, File Nos. 44,055 and 44,056. Many letters, phone calls and discussions in person, all in opposition to the approval of the applications, have been received in this office from this mailing. Information has been obtained from this mailing, pertaining to the ownership of the land where the proposed points of diversion are to be located. **K.A.R. 5-3-3a. Legal access.** If the chief engineer is aware, or becomes aware, that the applicant does not have legal access to either the point of diversion (battery of wells) or right of way, before an application for any of the following can be approved by the chief engineer, the applicant shall demonstrate that the applicant has legal access to the proposed point of diversion (battery of wells) before the approval of the application: An approval of application. No documentation, lease, ownership information, etc... has been received showing legal access to the proposed wells under either application. We therefor need documentation signed by an authorized representative for The Temme Family Partners, in care of Margaret Temme, for Application, File No. 44,055, and documentation signed by James and Cynthia Kelly for Application, File No. 44,056, showing legal access to the locations of the proposed points of diversion for Application, File No(s). 44,055 and/or 44,056. If no legal access documentation is received in this office, included with the returned application, the application(s) will be dismissed for failure to return the application within the time allowed.

If documentation is submitted to this office showing legal access to the points of diversion, (battery of wells), by the below shown deadline, then additional information will also need to be submitted pertaining to the source of water for Application, File No(s). 44,055 and/or 44,056. Information in this office indicate the source of supply for the proposed appropriations is buried glacial deposits of the Kansan age. The aquifer proposed to be utilized has unique characteristics that will require additional information to be submitted before the application(s) can be further processed. This information is needed to determine the potential for impairment to nearby municipal well(s) and nearby domestic wells. If sufficient information is not received in this office to determine if substantial lowering of the static water level will not occur, the applications may not be approved and/or the Chief Engineer may determine a hearing is needed before a final decision is made to approve or deny Application, File No. 44,055 and/or Application, File No. 44,056.

Your applications are being returned so that you may comply with the above instructions. In order that the applications will retain their priority of filing, the original applications and attachments, including the aforementioned documentation, must be returned, with any corrections dated and signed, to this office on or before February 23, 2004, or within any authorized extension of time thereof. According to the law, default in the refiling of the completed application and attachments as outlined above, within the time allowed, shall constitute forfeiture of priority date and dismissal of the application.

If you plan to go to the Division of Water Resources Field Office in Topeka (785-368-8251), please make an appointment and take this letter, your application and attachments with you to the field office.

If you have any questions, please contact me (785-296-3494) at this office. If you wish to discuss a specific file, please have the file number ready so that we may help you more efficiently.

Sincerely,

Douglas E. Bush

Douglas E. Bush
Environmental Scientist
Water Appropriation Program

DEB
Enclosure(s)
pc: Topeka Field Office
James and Cynthia Kelly
Temme Family Partners

SUBURBAN WATER, INC.
SUBWATER(C)SUBWATER.COM
[illegible] STREET P.O. BOX [illegible]
BASEHOR, KS [illegible]
TELEPHONE [illegible] FAX [illegible]

February 25, 2004

Douglas E. Bush
Kansas Department of Agriculture
Division of Water Resources
109 SW 9th Street, 2nd Floor
Topeka, KS 66612-1283

RE: Application File Nos. 44,055 and 44,056

Dear Mr. Bush:

We are in receipt of your letter dated January 22, 2004 in regards to the proposed Application Numbers 44,055 and 44,056.

After careful discussion and review, we have come to a conclusion that we are going to set this aside and retire the proposed locations for this project.

We will endeavor some other location for additional water. We will contact you in the future for more assistance. Thanking you for all your trouble.

Sincerely,

Joseph M. Breuer

Joseph M. Breuer
President

/klm

THE STATE OF KANSAS

KANSAS DEPARTMENT OF AGRICULTURE
Adrian J. Polansky, Secretary of Agriculture

DIVISION OF WATER RESOURCES
David L. Pope, Chief Engineer

IN THE MATTER OF THE DISMISSAL OF APPLICATION FILE NO. 44,055

After due consideration, the Chief Engineer, Division of Water Resources, Kansas Department of Agriculture (hereinafter referred to as the "Chief Engineer"), makes the following findings and order:

FINDINGS

1. That on February 11, 2000, the Chief Engineer received an application to appropriate water for beneficial use, assigned File No. 44,055, proposing the appropriation of 160 million gallons of water, at a maximum requested diversion rate of 800 gallons per minute, for municipal use.

2. That on July 10, 2002, Application, File No. 44,055, and attachments, were returned to Suburban Water Co., applicant, with a cover letter requesting that additional information was needed pertaining to the justification of quantity, and, location(s) of any nearby well(s), including the well owners name and address, with said application being returned, along with attachments and needed information, to the office of the Chief Engineer, by August 12, 2002.

3. That on August 30, 2002, a letter was sent to Suburban Water Co., applicant, reiterating the information shown on the July 10, 2002, letter sent to applicant, and reminding the applicant, that Application, File No. 44,055, must be returned, along with attachments and needed information, to the office of the Chief Engineer, by September 13, 2002, an extended deadline, to correspond with the usual 60 days to locate a proposed point of diversion.

4. That on September 13, 2002, Application, File No. 44,055, and attachments, were returned to the office of the Chief Engineer.

5. That on October 1, 2002, a letter was sent to Suburban Water Co., applicant, requesting that additional information be supplied to justify the proposed quantity of 160 million gallons of water per calendar year, shown on Application, File No. 44,055, with the needed information being submitted to the office of the Chief Engineer by September 13, 2003.

6. That on September 12, 2003, a reminder letter was sent to Suburban Water Co., applicant, reminding said applicant, that the requested information described in Paragraph 5 of this Findings and Order, be submitted to the office of the Chief Engineer, with the deadline to supply additional information being extended to September 29, 2003, as no reminder letter was sent two (2) weeks prior to the original return deadline of September 13, 2003.

7. That on October 3, 2003, Application, File No. 44,055, and attachments, were returned to Suburban Water Co., applicant, with a cover letter requesting that additional information be supplied to the office of the Chief Engineer, inclusive to the justification of quantity, and location(s) of any nearby well(s), including the well owners name and address, well spacing information, and reducing the requested rate of diversion, and, return Application, File No. 44,055, and attachments, to the office of the Chief Engineer, by November 3, 2003.

8. That on October 29, 2003, a letter was sent to Suburban Water Co., applicant, reiterating the information shown on the October 3, 2003, letter, in that additional information be supplied to the office of the Chief Engineer, inclusive to the justification of quantity, location(s) of any nearby well(s), including the well owners name and address, well spacing information, and reducing the requested rate of diversion, and that Application, File No. 44,055, and attachments, be returned to the office of the Chief Engineer, by December 1, 2003.

9. That on November 3, 2003, additional information was received in the office of the Chief Engineer, from Kramer Engineering P.A., justifying a greater quantity of water than supplied with Application, File No. 44,055, that was received in this office on February 11, 2000.

10. That on December 4, 2003, Suburban Water Co., applicant, requested, and was granted, additional time through December 12, 2003, to return Application, File No. 44,055, along with attachments and needed information to the office of the Chief Engineer.

11. That on December 11, 2003, Application, File No. 44,055, was returned to the office of the Chief Engineer, along with attachments and needed information.

12. That on December 19, 2003, letters were sent to nearby well owners requesting that comments pertaining to the approval of Application, File No. 44,055, be submitted to the office of the Chief Engineer by January 9, 2004.

13. That on December 22, 2003, the time to submit comments to the office of the Chief Engineer, pertaining to the approval of Application, File No. 44,055, was extended through January 20, 2004, as per December 22, 2003, verbal request by Charles Benjamin, attorney for nearby well owner.

14. That on January 22, 2004, Application, File No. 44,055, was returned to Suburban Water Co., applicant, with a cover letter indicating that documentation was needed demonstrating that the applicant has legal access to the proposed point of diversion (battery of wells), before said application can be further processed, with a deadline to return said application and attachments, including legal access documentation, to this office on or before February 23, 2004, or any authorized extension of time thereof, or the application will be dismissed for failure to return within the time allowed.

15. That no additional correspondence has been submitted by Suburban Water Co., applicant, nor has Application, File No. 44,055, been returned to the office of the Chief Engineer within the time allowed, as prescribed in **K.S.A. 82a-710.**

16. That Application, File No. 44,055, should be dismissed and its priority forfeited as provided by **K.S.A. 82a-710.**

ORDER

NOW, THEREFORE, It is the decision and order of the Chief Engineer, Division of Water Resources, Kansas Department of Agriculture, that effective the date of this order, in accordance with the law, Application, File No. 44,055, is herewith dismissed and the priority assigned to it is considered to be forfeited.

This is a final agency action. If you choose to appeal this decision or any finding or part thereof, you must do so by filing a petition for review in the manner prescribed by the Kansas Act for Judicial Review and Civil Enforcement of Agency Actions (KJRA K.S.A. 77-601 et seq) within 30 days of service of this order. Your appeal must be made with the appropriate district court for the district of Kansas. The Chief Legal Counsel for the Kansas Department of Agriculture, 109 SW 9th Street, 4th Floor, Topeka, Kansas 66612, is the agency officer who will receive service of a petition for judicial review on behalf of the Kansas Department of Agriculture, Division of Water Resources. If you have questions or would like clarification concerning this order, you may contact the Chief Engineer.

Dated at Topeka, Kansas, this 27th day of February, 2004.

THOMAS L. HUNTZINGER LICENSED 12029 KANSAS PROFESSIONAL ENGINEER

Thomas L. Huntzinger, P.E.
Water Appropriation Program Manager
Division of Water Resources
Kansas Department of Agriculture

State of Kansas)
) SS
County of Shawnee)

The foregoing instrument was acknowledged before me this 27 day of February, 2004, by Thomas L. Huntzinger, P.E., Water Appropriation Program Manager, Division of Water Resources, Kansas Department of Agriculture.

NOTARY PUBLIC OFFICIAL SEAL STATE OF KANSAS
JESSICA LYNN
MY COMMISSION EXPIRES
January 30, 2008

Jessica Lynn
Notary Public

CERTIFICATE OF SERVICE

On this 2nd day of March, 2004, I hereby certify that the attached Findings and Order, Application, File No. 44,055, dated February 27, 2004 was mailed postage prepaid, first class, US mail to the following:

Suburban Water Co.
PO Box 147
Basehor, KS 66607

Dorothy M Halloran
Staff

SUBURBAN WATER, INC.
SUBWATER@SUBURBANWATERCO.COM
12111 W. 49TH STREET, P.O. BOX 147
SHAWNEE, KS 66203
TELEPHONE 913-631-3033 FAX 913-631-3073

March 11, 2004

Douglas E. Bush
Kansas Department of Agriculture
Division of Water Resources
109 SW 9th Street, 2nd Floor
Topeka, KS 66612-1283

RE: Application File Nos. 44,055 and 44,056

Dear Mr. Bush:

We are in receipt of your letter dated March 2, 2004 dismissing the above referenced application numbers for failure to return the application within the time allowed.

After leaving your office around mid September 2003, I was under the impression that all applications and documents were in place regarding additional water rights so when the latest letter arrived I assumed we were granted the additional rights. It was never my intention to fail to return any required documents in a timely manner. I would like to apologize for this misunderstanding on my part.

We would like to pursue additional water rights at later date. I hope that this misunderstanding on my part will not hinder our future applications.

If you have any additional questions or comments please feel free to give me a call.

Sincerely,

Joseph M. Breuer

Joseph M Breuer
President

/klm

Kansas Corporation Commission
Information Request

Request No: 46

Company Name	SUBURBAN WATER CO.	SUBW
Docket Number	11-SUBW-448-RTS	
Request Date	February 17, 2011	
Date Information Needed	February 25, 2011	

RE:

Please Provide the Following:

A review of the records of the Division of Water Resources. file No. 44,055, indicates that Suburban Water Company filed an application for appropriation of water on February 11, 2000, for approximately 320 Million Gallons per year (when combined with file No. 44,056). A letter from the DWR to Suburban dated October 29, 2003 states that it was determined that 233.785 Million Gallons per year were available for appropriation, but additional information would be needed from Suburban. On January 22, 2004, the DWR issued a letter to Suburban Water Company requesting proof of legal access to the proposed well cites, and additional information in order to determine whether the proposed wells would provide an impairment of existing nearby municipal and domestic wells. On February 25, 2004, Suburban Water Company sent a letter to the DWR regarding Application No. 44,055 and 44,056 stating: "After careful discussion and review, we have come to a conclusion that we are going to set this aside and retire the proposed locations for this project." On February 27, 2004, the DWR issued an order dismissing Application Nos 44,055 and 44,056. Please provide the following with regard to these applications.

1. Why were these water appropriation file numbers not provided in response to Staff Data Request No. 14?

2. Why did Suburban choose to "set aside and retire the proposed locations for this project?"

3. Did Suburban have legal access to the proposed well cites discussed in Application No. 44,055 (the Northwest Quarter of the Southwest Quarter of the Southeast Quarter of Section 22 East in Township 11, Leavenworth County, KS)? If so, why was this information not provided to the DWR in a timely fashion in furtherance of this application? If not, why was this legal access not obtained?

Questions 4 and 5 in Data Request No. 47 are a continuance of this data request.

If for some reason, the above information cannot be provided by the date requested, please provide a written explanation of those reasons.

Verification of Response

I have read the foregoing Information Request and answer(s) thereto and find answer(s) to be true, accurate, full and complete
and contain no material misrepresentations or omissions to the best of my knowledge and belief, and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: _____

Date: 2/26/11

Kansas Corporation Commission
Information Request

Request No: 47

Company Name	SUBURBAN WATER CO.	SUBW
Docket Number	11-SUBW-448-RTS	
Request Date	February 17, 2011	
Date Information Needed	February 25, 2011	

RE:

Please Provide the Following:

Continued from Data Request No. 46:

4. Did Suburban have legal access to the proposed well cites discussed in Application No. 44,056? If so, why was this information not provided to the DWR in a timely fashion in furtherance of the application? If not, why was this legal access not obtained?
5. Did Suburban ever seek the information referred to in the January 22, 2004 letter in order to determine whether the proposed wells would provide an impairment of existing nearby municipal and domestic wells? If yes, please provide a copy of the aforementioned information. If not, please explain why this information was not obtained.

Submitted By Sonya Cushinberry

Submitted To Mike Bruer

If for some reason, the above information cannot be provided by the date requested, please provide a written explanation of those reasons.

Verification of Response

I have read the foregoing Information Request and answer(s) thereto and find answer(s) to be true, accurate, full and complete
and contain no material misrepresentations or omissions to the best of my knowledge and belief; and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: _____

Date: 2/26/11

Suburban Water Co.
Docket No. 11-SUBW-448-RTS
KCC Information Request Answers

Request No. 46 and 47
RE: DWR file Numbers 44,055 and 44,056

1. SWC has amended its response to KCC Data Request No. 14 to provide a list of all DWR applications filed between 2000 and 2010. Those applications were not originally identified by SWC in response to Data Request No. 14 due to an oversight on the part of the utility. SWC has met with Staff to discuss and apologize for the omission.

2. SWC, after receiving the letter from DWR dated October 29, 2003, requesting additional scientific information that would indicate that the aquifer could safely yield the quantity of water that SWC had requested in their filing with DWR under filings 44,055 and 44,056, SWC made the decision that the cost of hiring an engineering firm to provide SWC with a hydrological study that could possibly show that the aquifer could support the requested quantity in SWC filing was not economical (cost to prepare the report was estimated to be $65,000.00) for SWC since there was no guarantee the water would produce at a rate sufficient for a public water supply. In addition, SWC had not received the necessary access to the property to drill a test well to confirm the necessary quantities. Finally, SWC was not guaranteed to receive the water rights even if the test well showed promise because of opposition of other water rights owners in the area.

3. SWC did not have legal access to the property discussed in filing 44,055, and is one of the reasons that led SWC to retire the proposed locations. SWC attempted to obtain legal access from the landowners, Temme Family Partners, Ltd., but was refused access by them.

4. SWC did not have legal access to the proposed well locations discussed in filing 44,056. SWC attempted to obtain legal access from James L. and Cynthia J. Kelly, but was refused access by them.

5. SWC did compile a list of the wells in the area where the proposed wells were going to be drilled as filled with DWR on December 11, 2003.

   SWC did not provide an engineering study that might prove that the proposed wells would not impair nearby municipal or domestic wells. The study was not started because of the cost of said study and because legal access to the property was denied.

   Legal access is required before SWC can drill a test well on private property. SWC requested legal access to the site contained in 44,055 and 44,056. However, the land owners personally came to SWC offices and stated vehemently that they would not allow SWC access to their land to drill a test well. This was a verbal confrontation and no contemporaneous records are available.

SWC understands that the land owners meet with DWR to voice their objection to SWC gaining access to their land to drill a test well. SWC heard that the land owners stated to DWR that SWC's proposed well site would impact their existing domestic wells. See attached "Sworn Statement Pursuant to K.S.A. 82a-709" form.

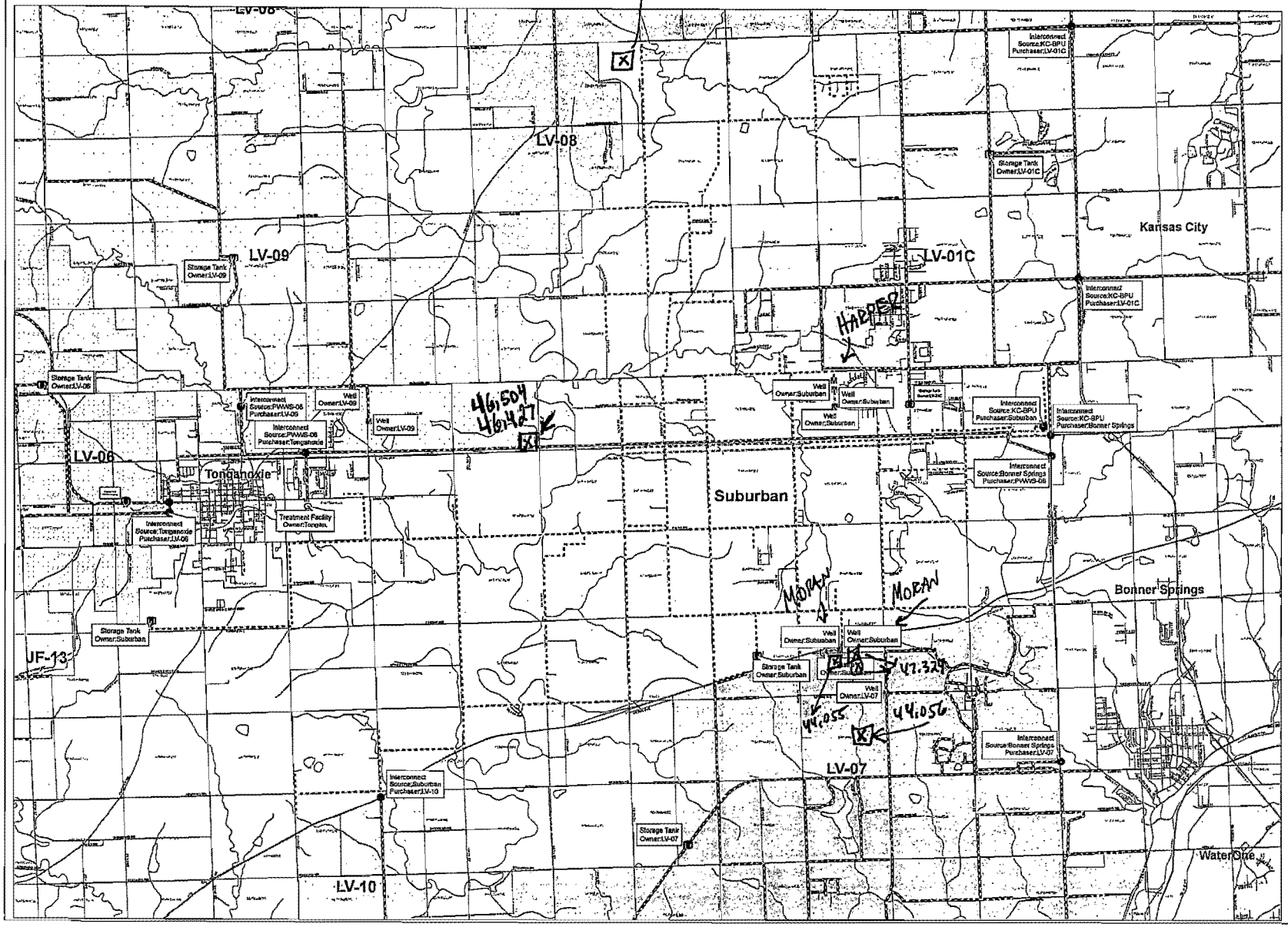
See attached "Impairment Complaints" procedure and Fact Sheet.

See attached SB No. 64 establishing the requirement to obtain legal access.

File No. 44,055, the land was owned by Temme Family Partners when the filing was made. File No. 44,056, the land was owned at the time of the filing and is still owned by James L. and Cynthia J. Kelly.

39,186
39,187
39,188

Suburban Water Co.

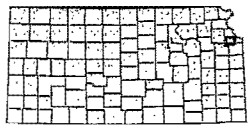


Legend
- Interconnects
- Pump
- Storage Tank
- Surface Intake
- Treatment Facility
- Well

Mainline Diameter
- Pipelines Outside of Study Area
- Less than 4 inch
- 4 to 6 inch
- Greater than 6 inch
- Roads
- Streams
- PLSS
- County Boundary
- City Boundary
- Lakes

0 0.5 1 2 Miles

Locator Map: Study Area



Suburban Water Co.
October 2005

KANSAS

DEPARTMENT OF AGRICULTURE
ADRIAN J. POLANSKY, SECRETARY

KATHLEEN SEBELIUS, GOVERNOR

January 19, 2007

SUBURBAN WATER COMPANY
1216 N 155TH STREET
PO BOX 147
BASEHOR KS 66007-0147

Re: Application - File No. 46,504

Dear Sir or Madam:

We have conducted further review of your application referenced above, and the additional information you have supplied regarding nearby well owners and site-specific hydrologic data.

As noted in our previous correspondence dated December 11, 2006, the rules and regulations in K.A.R. 5-4-4 require that your proposed point of diversion (i.e. geographic center of the well battery) meet the minimum spacing distance of 660 feet from all domestic wells. Information supplied with your application states that an existing domestic well (Well #4), owned by Phillip and Renee Standish, is located 503 feet from the geographic center of the well battery. Therefore your proposed point of diversion does not comply with well spacing requirements to this domestic well.

You provided pump test results to show the effect of the proposed well on existing wells. The test was conducted at a pumping rate of 100 gallons per minute, which is only one-eighth of the requested diversion rate of 800 gallons per minute. Twelve hours of pumping resulted in 30 feet of drawdown at your pumping well and 14 feet of drawdown at a nearby monitoring well. The hydrologic data also indicates the aquifer required greater than 12 hours to recover after the pump was turned off, and it appears the total drawdown may not have stabilized prior to stopping the pump test. Based on the pump test it appears that the proposed well will result in a significant reduction of the estimated 40 feet of saturated thickness in the water source, even when pumped at a fraction of the requested pumping rate. Furthermore, the response of the aquifer to the pump test, and a review of area well logs, indicates that the aquifer is limited in areal extent and is not physically capable of providing water at your proposed rate of diversion.

Based on our telephone discussion on January 9, 2007, the monitoring well at which you reported a 15-foot drawdown is the same domestic well (Well #4) owned by Phillip and Renee Standish. The Standishes have informed the Division of Water Resources that the pump test had a significant and undesirable affect on their domestic well. They reported a drop in static water level of 20 feet during the pump test and discolored water in the well for several days after the test was concluded. A drawdown of 14 to 20 feet would be a 35% to 50% reduction in the saturated thickness, which would be considered an unreasonable lowering of the water table. As set forth in K.S.A. 82a-711, the unreasonable lowering of the static water level at an existing well is considered to be an impairment of an existing water right.

K.A.R. 5-4-4(g) prohibits the chief engineer from allowing a decrease in the spacing between a proposed well and an existing well if it would impair an existing water right. Therefore it will be recommended to the Chief Engineer that Application, File No. 46,504 be dismissed and its priority forfeited for failure to comply with minimum well spacing regulations and the resulting potential impairment of an existing right. Please note that, pursuant to K.S.A. 82a-1904, the Chief Engineer cannot waive a rule or regulation if it would result in the impairment of an existing water right.

We are advising you of these recommendations in order to allow you an opportunity to submit additional information to show why our evaluation should be reconsidered. **You have a period of 15 days (until February 3, 2007) to either (1) submit additional information to our office or (2) request additional time beyond the 15 days to submit additional information.** If you wish to request additional time, you must do so **in writing**, before the 15 day period expires. If you do not request more time within the 15 day period, or if your request is not granted, the above-referenced application will be submitted to the Chief Engineer for final decision based on the recommendations stated above. Any relevant credible information submitted within the time allowed will be given due consideration, prior to final action on the application.

If you have any questions, please contact me at (785) 296-3495. If you wish to discuss a specific file, please have the file number ready so that I may help you more efficiently.

Sincerely,

Douglas Schemm
Environmental Scientist
Permits Unit

pc: Topeka Field Office

THE STATE OF KANSAS

KANSAS DEPARTMENT OF AGRICULTURE
Adrian J. Polansky, Secretary of Agriculture

DIVISION OF WATER RESOURCES
David L. Pope, Chief Engineer

IN THE MATTER OF THE DISMISSAL OF APPLICATION FILE NO. 46,504

After due consideration, the Chief Engineer, Division of Water Resources, Kansas Department of Agriculture (hereinafter referred to as the "Chief Engineer"), makes the following findings and order:

FINDINGS

1. That on June 16, 2006, the Chief Engineer received an application for permit to appropriate water for beneficial use, assigned File No. 46,504, proposing the appropriation of 1,075 acre-feet (350 million gallons) of groundwater at a maximum requested diversion rate of 1,000 gallons per minute, for municipal use, from a battery of four (4) wells in the Southeast Quarter (SE¼) of Section 1, Township 11 South, Range 21 East, Leavenworth County, Kansas.

2. That on June 21, 2006, the application was returned to the applicant providing additional time to verify the location of the individual wells in the well battery and to submit nearby well owner information.

3. That the application was returned to the Division of Water Resources on July 27, 2006, with an attached topographic map showing the location of the proposed well battery, and a list of nearby well owners.

4. That on August 9, 2006, the application was again returned to the applicant to, among other things, verify the exact location of the geographic center of the well battery and provide site specific, hydrologic data regarding the aquifer characteristics.

5. That the application was returned to the Division of Water Resources on December 7, 2006, with required information about the location of the well battery, a revised "Municipal Application Supplemental Information Sheet, and modifications to the original application.

6. That the information provided by the applicant indicated that a domestic well (Well #4) is located approximately 503 feet from the proposed point of diversion (i.e. the geographic center of the well battery) and that the average saturated thickness of the aquifer in the immediate area is 40 feet.

7. That according to K.A.R. 5-4-4(c)(2)(C) and (f) the geographic center of the well battery described in this application for a permit to appropriate water for beneficial use must be located at least 660 feet from all domestic wells.

8. That in a letter dated December 11, 2006, the Division of Water Resources notified the applicant that the proposed location of the geographic center of the well battery did not meet the minimum spacing requirement of 660 feet from all domestic wells.

9. That on December 14, 2006 the applicant submitted site-specific hydrologic data (pump test results) in response to the Division of Water Resources' August 9, 2006 letter.

10. According to the results of the pump test, after 12 hours of pumping at 100 gallons per minute 30 feet of drawdown occurred at the pumping well and 14 feet of drawdown occurred at the nearby domestic well (Well #4) owned by Phillip and Renee Standish. The hydrologic data also indicates the aquifer required greater than 12 hours to recover after the pump was turned off, and the total drawdown may not have stabilized prior to stopping the pump test.

11. That the Division of Water Resources received a letter from Phillip and Renee Standish on January 3, 2007 stating that their domestic well was significantly impacted by the pumping test. They stated that they observed a drop of 20 feet in static water level and the water in the well was discolored for several days after the pump test was concluded.

12. That an unreasonable lowering of the static water level will occur at the Standishes' domestic well (Well #4) if this application is approved such that the domestic water right cannot be satisfied from this well, nor can the Standishes make reasonable economic adjustments in order to satisfy their domestic water right.

13. According to K.S.A. 82a-711(c), the unreasonable lowering of the static water level beyond a reasonable economic limit is considered to be an impairment of an existing water right

14. That in a letter dated January 19, 2007 the Division of Water Resources notified the applicant that the Chief Engineer could not approve this application unless additional information was provided to show that impairment will not occur as a result of this proposed appropriation of water and provided the applicant 15 days until February 3, 2007 to submit this information or to request additional time to submit the information.

15. That no additional information or request for additional time was received from the applicant prior to February 3, 2007.

16. That based on the information presented, Application, File No. 46,504, should be dismissed and its priority forfeited, pursuant to K.S.A. 82a-711, for failure to comply with minimum well spacing criteria in K.A.R. 5-4-4, and the resulting impairment of an existing water right.

ORDER

NOW, THEREFORE, It is the decision and order of the Chief Engineer, Division of Water Resources, Kansas Department of Agriculture, that effective the date of this order, in accordance with the law, Application, File No. 46,504, is herewith dismissed and the priority assigned to it is considered to be forfeited.

This Order shall become a final agency action, as defined by K.S.A. 77-607(b), without further notice to the parties, if a request for hearing or a petition for administrative review is not filed as set forth below.

Request for Hearing. According to K.A.R. 5-14-3(c), any party who desires a hearing must submit a request within 15 days after the date shown on the Certificate of Service attached to this Order. Filing a request for a hearing will give you the opportunity to submit additional facts for consideration, contest any findings made by the Chief Engineer, or present any other information you believe should be considered in this matter. A timely-filed request for hearing will stay the deadline for requesting administrative review of this Order pending the outcome of the hearing.

File No. 46,504

Petition for Review. The applicant, if aggrieved by this Order, may petition for administrative review, pursuant to K.S.A. 82a-711(c) and K.S.A. 82a-1901(a). The petition must be filed within 30 days after the date shown on the Certificate of Service attached to this Order and must set forth the basis for the review, unless stayed by the timely filing of a request for hearing.

Any request for hearing or petition for administrative review shall be in writing and shall be submitted to the attention of: Chief Legal Counsel, Kansas Department of Agriculture, 109 SW 9th Street, 4th Floor, Topeka, Kansas 66612, Fax: (785) 368-6668.

Dated at Topeka, Kansas, this 15th day of February, 2007.

DIVISION OF WATER RESOURCES
DAVID L. POPE
CHIEF ENGINEER
KANSAS DEPARTMENT of AGRICULTURE

David L. Pope, P.E.
Chief Engineer
Division of Water Resources
Kansas Department of Agriculture

State of Kansas)
) SS
County of Shawnee)

The foregoing instrument was acknowledged before me this 15th day of February, 2007, by David L. Pope, P.E., Chief Engineer, Division of Water Resources, Kansas Department of Agriculture.

Debra L Hayes
Notary Public

OFFICIAL SEAL
DEBRA L. HAYES
MY COMMISSION EXPIRES
5/13/2010

Kansas Corporation Commission
Information Request

Request No: 53

Company Name	SUBURBAN WATER CO.	SUBW
Docket Number	11-SUBW-448-RTS	
Request Date	February 21, 2011	
Date Information Needed	March 2, 2011	

RE: Groundwater Study

Please Provide the Following:

On Page 16, beginning on line 13 of Mike Breuer's testimony, he states that "SWC believes it needs to have a study performed as to the likelihood of success of such efforts before going forward in expanding its own water resources." Please provide the following with regard to this statement.

1. Does SWC have a list of qualified vendors that could be asked to perform this service?
2. What does SWC estimate that the cost of such a study would be?
3. Was a study such as this performed before SWC attempted to gain the right to appropriate water from the locations covered under DWR Application #'s 46,504 and 46,427?
4. If the answer to #3 above is no, how did SWC choose the specific sites covered under DWR application #'s 46,504 and 46,427?

Submitted By Justin Grady

Submitted To Mike Breuer

If for some reason, the above information cannot be provided by the date requested, please provide a written explanation of those reasons.

Verification of Response

I have read the foregoing Information Request and answer(s) thereto and find answer(s) to be true, accurate, full and complete
and contain no material misrepresentations or omissions to the best of my knowledge and belief; and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: _____

Date: 3/2/11

Suburban Water Co.
Docket No. 11-SUBW-448-RTS
KCC Information Request Answers

Request No. 53
RE: Groundwater Study

1. In the answer to DR # 42, SWC provided the name of Cara Hendricks, from Taylor Deign Group, as a person SWC contacted about a groundwater study. Ms. Hendricks then contacted Aquarterra about performing the study. SWC does not know of any other firms who have the expertise to complete groundwater supply studies such as the one proposed by Aquarterra.
2. In the answer to DR # 42, SWC provided Aquarterra's preliminary cost estimates which ranged from $23,500 to $ 62,500.
3. No, the location identified in DWR file no. 46,504 and 46,427 is the same location and was first discovered in the 1980's by Breuer, Inc. (SWC) when they drilled a domestic water well for a client and noticed the well-produced water at a very high rate, estimated at over 75 gpm. SWC employee remembered this location and when searching for new groundwater sources drilled a well and applied with DWR for the right to divert water for public water supply purposes.
4. The site was picked because Breuer, Inc. had specific experience with the potential of this site. See DR # 14 for DWR's finding on file no. 46,504.

Kansas Corporation Commission
Information Request

Request No: 55

Company Name	SUBURBAN WATER CO.	SUBW
Docket Number	11-SUBW-448-RTS	
Request Date	March 1, 2011	
Date Information Needed	March 10, 2011	

RE: Groundwater Study

Please Provide the Following:

On Page 16, beginning on line 13 of Mike Breuer's testimony, he states that "SWC believes it needs to have a study performed as to the likelihood of success of such efforts before going forward in expanding its own water resources."
Please provide the following with regard to this statement.
Please describe the nature of the study being referred to in this passage. Would this be a study to cover the entire suburban water territory in order to identify the best potential sites for groundwater? Or would this study be more in line with the study SWC was negotiating with Aquaterra to perform for the permitting process of the Moran 6 and 7 wells?

Submitted By Justin Grady

Submitted To Mike Breuer

If for some reason, the above information cannot be provided by the date requested, please provide a written explanation of those reasons.

Verification of Response

I have read the foregoing Information Request and answer(s) thereto and find answer(s) to be true, accurate, full and complete
and contain no material misrepresentations or omissions to the best of my knowledge and belief; and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: Joseph M. Breuer

Date: 3-7-11

Response Data Request 55

The type of Study that is referred to in Mike Breuer's testimony would be a study that would look at the glacial deposits in regions across Suburban Water's territory. The purpose of this study would be to identify the top areas that might provide Suburban Water with additional ground water sources. After, proposed locations that could have the potential for providing Suburban Water with additional ground water sources are identified the study would then have to look at municipal and domestic wells that are currently producing in that region to see if there would be additional water rights available for Suburban Water to obtain. The study would also have to look at the location of the proposed locations in reference to Suburban Water's current distribution system to develop a cost estimate of not only construction of a new treatment facility, but also the cost to extending Suburban Water's distribution to be able to bring the new ground water into Suburban Water's distribution system.

The study referred to in Mike Breuer's testimony has no relation to Moran Wells 6 and 7. Suburban Water has no plans to have any studies conducted on the area where Moran Wells 6 and 7 were previously drilled. The past wells drilled in this location did not provide a sustainable source of ground water.

Kansas Corporation Commission
Information Request

Request No: 56

Company Name	SUBURBAN WATER CO.	SUBW
Docket Number	11-SUBW-448-RTS	
Request Date	March 1, 2011	
Date Information Needed	March 10, 2011	

RE: Ground Water Study Sites

Please Provide the Following:

On Page 16, beginning on line 13 of Mike Breuer's testimony, he states that "SWC believes it needs to have a study performed as to the likelihood of success of such efforts before going forward in expanding its own water resources." Please provide the following with regard to this statement.
Assuming this study refers to a limited area aquifer modeling study, such as SWC was negotiating with Aquaterra to perform for file No. 47,324, which specific sites would SWC prefer to have the study performed on?
What is Suburban's position on performing the study at the site covered under DWR File No. 44,055?

Submitted By Justin Grady

Submitted To Mike Breuer

If for some reason, the above information cannot be provided by the date requested, please provide a written explanation of those reasons.

Verification of Response

I have read the foregoing Information Request and answer(s) thereto and find answer(s) to be true, accurate, full and complete
and contain no material misrepresentations or omissions to the best of my knowledge and belief; and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: Joseph M. Breuer

Date: 3-7-11

Response Data Request 56

This study does not refer to a limited aquifer.

Suburban Water's position on the site covered under DWR file No. 44055 is that Suburban would not perform the type of study previously discussed with Aquattera at this location. The wells previously drilled at this site only showed a temporary source of ground water. There were two wells drilled at the site covered under DWR file No. 44055 and one of those wells only produced water for a 10 month period before it began to cavitate, which resulted in the well beginning shut down. The performance of the two wells drilled in this area showed that the aquifer in this location simply will not support any additional wells.

Kansas Corporation Commission
Information Request

Request No: 57

Company Name	SUBURBAN WATER CO.	SUBW
Docket Number	11-SUBW-448-RTS	
Request Date	March 1, 2011	
Date Information Needed	March 10, 2011	

RE: Ground Water Study Expenses

Please Provide the Following:

In response to Staff Data Request No. 42, SWC states that it did not have the funds to undertake the study that was necessary in order to complete the permitting process to continue pumping the Moran Wells No. 6 and 7. Assuming this is the same type of study referred to on Page 16, line 13 of Mike Breuer's testimony in this case, does SWC now have the funds to perform the recommended study?

Submitted By Justin Grady

Submitted To Mike Breuer

If for some reason, the above information cannot be provided by the date requested, please provide a written explanation of those reasons.

Verification of Response

I have read the foregoing Information Request and answer(s) thereto and find answer(s) to be true, accurate, full and complete
and contain no material misrepresentations or omissions to the best of my knowledge and belief; and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: Joseph M. Breuer

Date: 3-7-11

Response Data Request 57

The type of study that is referred to in Mike Breuer's testimony is not the same type of study that was previously discussed with Aquaterra. Suburban Water does not have the funds to complete the type of study previously discussed with Aquaterra, nor does it have the funds to complete the type of study described in the response to data request number 55.

Funds to perform this type of study would have to be raised through and increase in water rates.

Kansas Corporation Commission
Information Request

Request No: 19

Company Name	SUBURBAN WATER CO.	SUBW
Docket Number	11-SUBW-448-RTS	
Request Date	January 24, 2011	
Date Information Needed	February 2, 2011	

RE: Calculation of Produced Water Costs

Please Provide the Following:

Please provide the supporting details behind Suburban's calculation of the cost of its produced water for the year 2011 of $.70 per 1000 gallons.

Submitted By Justin Grady

Submitted To Mike Breuer

See attached schedule

If for some reason, the above information cannot be provided by the date requested, please provide a written explanation of those reasons.

Verification of Response

I have read the foregoing Information Request and answer(s) thereto and find answer(s) to be true, accurate, full and complete
and contain no material misrepresentations or omissions to the best of my knowledge and belief; and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: Gregory L Wilson

VERIFICATION OF RESPONSE

I have read the foregoing Information Request and answer(s) thereto and find the answer(s) to be true, accurate, full and complete, and contain no material misrepresentations or omissions to the best of my knowledge and belief; and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: _____

Date: February 4, 2011

Suburban Water Company
Pumped Water Cost Calculation
Test Year Ending Sept 30, 2010

Line No				YE 9/30/10	
1	Pumped Water Costs:				
2	Production Electric Cost	for wells only		$ 12,019	
3	Lab Testing & Water Treatment			$ 8,846	
4	Repairs & Maintenance			$ 6,128	
5	Well Repair and Monitoring Labor Costs			$ 13,140	Based on $30/hr. times 438 hours
6	Amortization of Well Depletion Costs (See Below):			$ 5,513	
7	Total Pumped Water Costs:			$ 45,646	
8	Pumped Cost of Water per 1,000 Gallons			$ 0.7050	
9	Well Depletion Costs:	20 Year			
10	Pumps	$ 11,022			
11	Telemetry	$ 63,492			
12	Chlorinators	$ 21,534			
13	Wells	$ 9,001			
14	Pump House	$ 5,203			
15	Capital Expenditures:	$ 110,252			
16	Annual Amortization	$ 5,513			

Kansas Corporation Commission
Information Request

Request No: 24

Company Name	SUBURBAN WATER CO.	SUBW
Docket Number	11-SUBW-448-RTS	
Request Date	January 24, 2011	
Date Information Needed	February 2, 2011	

RE: Cost New Water Sources in 2010

Please Provide the Following:

Re: Mike Breuer Testimony, page 6, lines 11 and 15
1. Please provide documentation that supports the year 2010 cost estimates of $5,800,000 to lay a new pipeline to Water One and to the City of Leavenworth for $400,000.
2. Please provide documentation that supports the year 2010 estimate of $400,000 to find a new water field and drill one or more wells in the new field.

Submitted By Bill Baldry

Submitted To Mike Breuer

Please See attached document

If for some reason, the above information cannot be provided by the date requested, please provide a written explanation of those reasons.

Verification of Response

I have read the foregoing Information Request and answer(s) thereto and find answer(s) to be true, accurate, full and complete
and contain no material misrepresentations or omissions to the best of my knowledge and belief; and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: Gregory L Wilson

VERIFICATION OF RESPONSE

I have read the foregoing Information Request and answer(s) thereto and find the answer(s) to be true, accurate, full and complete, and contain no material misrepresentations or omissions to the best of my knowledge and belief; and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: _____

Date: February 4, 2011

Cost Estimate to connect to WaterOne

- Material Cost
  - 79,200' of 12" PVC Water Main = $ 14' per foot
    - Total Cost = $1,108,800
  - Fittings (Hydrants, Valves, etc.)
    - Total Cost = $792,000
- Labor Cost
  - Cost for contractor complete installation
    - Total Cost = $1,188,000
- Contingency @ 20%
  - Total Cost = $617,760
- Annual Interest on Borrowed Money
  - Cost to finance the installation of meter distribution mains
    - Total Cost = $14,000
    - Total Interest over 20 years @ 5% = $2,164,237.31

Total Cost to connect with WaterOne of Johnson County = $5,870,797.31

- WaterOne of Johnson County has a wholesale rate of $2.80 per 1000 gallons. Also, included is a monthly service charge of $106.20

Cost Estimate to connect to Leavenworth

- Material Cost
  - 11,200' of 12" PVC Water Main = $ 14' per foot
    - Total Cost = $156,800
  - Fittings (Hydrants, Valves, etc.)
    - Total Cost = $22,600
- Labor Cost
  - Cost for contractor complete installation
    - Total Cost = $ 145,600
- Contingency @ 20%
  - Total Cost = $65,000
- Annual Interest on Borrowed Money
  - Cost to finance the installation of meter distribution mains
    - Total Cost = $10,000

Total Cost to connect with Leavenworth = $400,000

Cost Estimate to construct New Well Field

- Estimated Cost to Drill a new Water Well = $ 50,000
- Estimated Cost to construct new treatment plant to treat ground water = $125,000
- Estimated Annual Cost to operate new well field = $50,000
- Contingency @ 20% = $65,000
- Annual Interest on Borrowed Money = $100,000

Total Cost of New Well Field $400,000

(Drilling only one new well would still require a new treatment plant as well as the yearly operating cost)

Kansas Corporation Commission
Information Request

Request No: 60

Company Name	SUBURBAN WATER CO.	SUBW
Docket Number	11-SUBW-448-RTS	
Request Date	March 1, 2011	
Date Information Needed	March 10, 2011	

RE: Groundwater Volumes

Please Provide the Following:

SWC's applications for water appropriation rights filed under DWR file Nos 46,504, 46,427, 44,055 and 44,056 all requested a significant quantity of water. (From 160 Million Gallons per Year to 350 Million Gallons per Year). Has Suburban considered requesting the right to appropriate water at less significant quantities in order to increase the possibility of success in these, or other areas?
Given SWC's estimates to drill and new well field, what amount of water (in Millions of Gallons per year) does Suburban believe would be necessary in order to make ground water economical when compared to purchases from BPU? Please provide all calculations necessary to support the conclusion.

Submitted By Justin Grady

Submitted To Mike Breuer

If for some reason, the above information cannot be provided by the date requested, please provide a written explanation of those reasons.

Verification of Response

I have read the foregoing Information Request and answer(s) thereto and find answer(s) to be true, accurate, full and complete
and contain no material misrepresentations or omissions to the best of my knowledge and belief, and I will disclose to the Commission Staff any matter subsequently discovered which affects the accuracy or completeness of the answer(s) to this Information Request.

Signed: _____

Date: 3/9/11

Suburban Water Co.
Docket No. 11-SUBW-448-RTS
KCC Information Request Answers

Request No. 60
RE: Groundwater Volumes

1. The right to use Kansas water is based on the principle of "first-in time – first-in right". Therefore, when requesting to appropriate water for a municipal water supply, the utility bases its needs on projected demands. (See attached Kansas Handbook of Water Rights) In SWC answer to DR# 47, Kramer engineering provided projected water use growing from 23 million gallons per year to 198 million gallons per year. In the attached Handbook of Water Rights, the 4th phase of a water right is the development of the right. As stated in the handbook, the water right must be "perfected", or to develop the water right by actually using water. After a period of time, generally 20 years for a municipal supply, the water right is limited to the largest amount by beneficial use within the terms, conditions, and limitations of the approval of the application. This means no matter what the original water right quantity authorized for diversion, only the highest amount diverted over the 20 year perfection period will be allowed to be diverted in the future.
2. Because of the first-in time principle and the perfection of a water right procedure it is prudent to request the maximum quantities of water based on reasonable projected needs. The projected needs vs. the actual amount pumped have no relationship. If any water is found only that quantity that can be pumped will be authorized. If only 50% of the amount requested can be pumped then only 50% of the requested amount will be authorized for future diversion.
3. Groundwater vs. BPU purchases analysis is based on the probability of finding water vs. the guarantee of the BPU supply. The probability of successfully bring a well field into a utility's water supply is based on numerous known and unknown variables. Some of the known variables are;
    a. Cost to develop a proven well field
    b. Cost to connect a proven well field to the utility's distribution system
    c. Cost of borrowed money
    d. Annual cost to operate a proven well field
4. Some of the unknown variables are;
    a. Hydrological study costs to find a well field with proven quantities sufficient to recover the cost to develop and operate a municipal water supply well field
    b. Gaining legal access to a site identified in a hydrological study
    c. Cost of the right-a-way to develop a well field with proven quantities on private land
    d. Cost of private right-of-way to connect a proven well field to the utility's distribution system
    e. Successfully obtain all necessary financing for infrastructure requirements
    f. Successfully recovery the costs, in rates, of an unsuccessful attempt to find a well field with proven quantities.
5. Estimated cost to develop a proven well field;
    a. Drill well and treatment plant - $400,000
    b. Connect to distribution system - $$28.00 per liner foot
    c. Average distance, in feet, to connect to the distribution system - 10,528 feet (2 miles)
    d. Annual operating costs of a well field, $0.62 per 1,000 gallons

Request No. 60
RE: Groundwater Volumes

e. Amortization of well field and distribution system infrastructure over 20 years
f. Cost of borrowed money – 7.50%
g. Estimated total cost of known variables;
    i. Infrastructure annual amortizations - $ 68,664.53 per year or $1,373,291 over 20 years
    ii. Annual operating costs @ $0.62 per 1,000 gallons
h. BPU current cost of water is $2.05 x 10.9% PILOT or $2.27345 per 1,000 gallons
i. Dividing BPU's current cost of purchased water into the annual infrastructure amortization costs results in 30,203,000 gallons of water could be purchased with the same funds. In addition, to pump 30,203,000 gallons at $0.62 per 1,000 gallons, the additional operating costs would be $18,726 or another 8,327,000 gallons from BPU. For a total equivalent purchase of 38,530,000 gallons.
j. SWC pumped 59,297,700 gallons in 2009 from the Moran well field. (See DR# 41)
k. A new well field would need to produce 65% of the quantities currently being produced at the Moran field to match the cost of BPU water or $87,596 per year.
l. All of this assumes the unknown variables, such as; the cost of a hydrologic study, the cost of right-of-way for both the well field and the connection to the distribution system, ability to obtain financing at 7.5%, and that no other water rights are impaired is less expense and more reliable than a supply from the BPU.

KANSAS DEPARTMENT OF AGRICULTURE

Kansas Handbook of Water Rights

See Also: *Kansas Water Resources Publication (7.28 MB)*

Why Do I Need a Water Right?

Water, like other natural resources enjoyed so bountifully by Kansans, is protected for the use and benefit of the citizens of this state. Water should be used wisely and good conservation measures should be practiced by all water users.

The Kansas Water Appropriation Act protects both the people's right to use Kansas water and the state's supplies of groundwater and surface water for the future.

The law is administered by the Kansas Department of Agriculture's Division of Water Resources, which issues permits to appropriate water, regulates usage, and keeps records of all water rights in the state.

It is illegal for individuals in Kansas to use water without holding a vested right or applying for, and receiving a permit to appropriate water from the Division of Water Resources.

The exception is water used solely for domestic purposes - that is, water primarily used for the household, watering livestock on pasture, or watering up to two acres of lawn and gardens. No permit is needed for that class of water usage.

The Water Appropriation Act affects all Kansans. If you are a farmer who uses irrigation to grow crops, it requires you to obtain a permit and to make yearly reports of the water you use. If you are a city dweller who drinks, washes with, or cavorts in, city water, you likely are able to do so because your municipality has a water right or rights.

The right to use Kansas water is based on the principle of "first in time - first in right." In times of shortage, that means the earliest water right or permit holders have first rights to use the water. The maintenance of water right and permit records allows Kansas water to be apportioned fairly.

> *. . . the Water Appropriation Act is Kansas law. Violating it can subject you to a maximum of six months in jail and a $500 fine.*

Why is it so important to follow proper procedures to obtain a water right and report use of water? One reason is to protect the investment in your right to divert water for beneficial use on your farm for irrigation, a feedlot, recreational reservoir, or in your municipality, water supply district, or industry. Another reason is to protect Kansas water resources for tomorrow and future generations. Finally, you should remember that the Water Appropriation Act is Kansas law. Violating that law can subject you to a maximum of six months in jail and a $500 fine.

Step by Step Guide to Obtaining a Water Right

1. File an Application

Contact the Division of Water Resources for an application to appropriate water for beneficial use. Anyone who wishes to use water for any purpose other than domestic use must file an application accompanied by a filing fee which is determined by the amount of water to be appropriated. Obtain a form from the Division of Water Resources, 109 SW 9th Street, Second Floor, Topeka, Kansas 66612-1283. Applications filed within a groundwater management district are reviewed by the district, and recommendations are made based on the policies, and rules and regulations of that district.

2. Receive Permit

If it is determined that: (1) water is available at the desired location; (2) its appropriation will not interfere with other area water rights, minimum desirable streamflow, or the public interest; and (3) it meets all other Division requirements, the application may be approved.

3. Complete Diversion Works

After the permit is issued by the Division of Water Resources, its holder is free to complete the authorized diversion works by drilling and completing a well, pumpsite or building a dam within the time allowed. Check valves also are required for safety in chemigation use. The permit holder then must notify the Division of Water Resources of the completion of the diversion works and submit the required field inspection fee. If required, water flow meters must be installed before water is put to use and before a notice of completion of the diversion works can be accepted. (A dam impounding more than 50 acre-feet of water requires an additional permit from the Division's Water Structures Section.)

4. Develop the Water Right

At this point the applicant has a specific period of time, usually four to five years, to "perfect" - or to develop - the water right by actually using water as authorized by the permit. If more time is needed, an extension of time must be requested in writing with the required fee, before expiration of this period. The water right is based on the year of the largest amount of beneficial use within the terms, conditions, and limitations of the approval of the application.

5. Field Inspection

After the water right has been completed, the Division of Water Resources conducts a field inspection to determine such things as rates of diversion of water, where and how the water has been used, as well as other numerous details of the actual operation in relation to the perfection - or development - of the water right. These tests will determine the maximum and normal rates of water diversion. Water use reports and other information also will be analyzed to determine the quantity of water diverted and acres irrigated each year within the limits of the permit.

6. Comment on Draft Certificate

After the Division of Water Resources determines the extent of water right developed, the water right holder will receive a draft certificate of appropriation. He or she has 30 days to comment on the proposed certificate of appropriation.

7. Certificate Issued

When the water right holder receives the actual certificate, he or she must file it with the Register of Deeds in each county where the authorized point or points of diversion is/are located.

8. Water Use Reported Yearly

After the application to appropriate water is approved, the permit holder is required to complete and return a yearly report of water use no later than March 1 of each year. The forms, which are mailed in January to the permit holder or to the designated water use correspondent, are for the previous year's usage. The Kansas legislature has made the report of water use mandatory and authorized fines for late reporting. Deliberate falsification of data on a report is a class C misdemeanor. Water use reports are used to perfect the water right and prove it has not been abandoned. Reports must be submitted even if water was not used in the previous year and the reason for nonuse explained.

Special Cases

Abandonment of a Water Right

A water right is considered abandoned after five successive years of nonuse without due and sufficient cause. Examples of due and sufficient cause for nonuse include such reasons as water being unavailable from the source of supply, adequate moisture is provided by natural precipitation for production of crops normally requiring full or partial irrigation within the region of the state in which the place of use is located, or temporary pollution of the water supply.

Changing a Water Right

If a water right holder wants to change such things as the place of use, the type of water use, or a point of diversion, he or she is required to file an application for change with the Division of Water Resources, and to pay the appropriate filing fee. Some parts of Kansas have no water available for new permits. In those areas, acquisition of an existing water right and obtaining approval to change one of the features may be the only way to meet such a change request.

Temporary Permits

Temporary permits are available for water use which will last less than six months and generally consist of less than a million gallons of water used for non-domestic purposes. Temporary permits, which often are issued for such purposes as oil well drilling or small construction projects, must be accompanied by a filing fee.

Where to Find Help

You can contact the Division of Water Resources at the Kansas Department of Agriculture, 109 SW 9th Street, Second Floor, Topeka, Kansas 66612-1283, or call (785) 296-3717.

For your convenience, Division of Water Resources field offices are located across the state.

Suburban Water Company --11-SUBW-448-RTS
Calculation of the Cost of Pumped Water using Suburban's Estimates of Capital Costs

Month	1	2	3	4	5	6
Balance	$ 534,784	$ 533,818.2	$ 532,846.4	$ 531,868.5	$ 530,884.5	$ 529,894.3	$ 528,898.0
Monthly Payment	$ 4,308	$ 4,308	$ 4,308	$ 4,308	$ 4,308	$ 4,308	$ 4,308
Interest Expense	$ 3,342	$ 3,336	$ 3,330	$ 3,324	$ 3,318	$ 3,312	$ 3,306
Outstanding Balance	$ 533,818	$ 532,846	$ 531,869	$ 530,884	$ 529,894	$ 528,898	$ 527,895

Month	7	8	9	10	11	12
Balance	$ 527,895.4	$ 526,886.6	$ 525,871.4	$ 524,850.0	$ 523,822.1	$ 522,787.8
Monthly Payment	$ 4,308	$ 4,308	$ 4,308	$ 4,308	$ 4,308	$ 4,308
Interest Expense	$ 3,299	$ 3,293	$ 3,287	$ 3,280	$ 3,274	$ 3,267
Outstanding Balance	$ 526,887	$ 525,871	$ 524,850	$ 523,822	$ 522,788	$ 521,747

Annual Depreciation (20 Years)	$ 26,739
Annual Interest Expense	$ 39,627
Total	$ 66,366

Gallons of Water	20,000,000	30,000,000	40,000,000	50,000,000	60,000,000	70,000,000	80,000,000	90,000,000	100,000,000
Price Per Thousand Gallons (For Depreciation and Interest)	$ 3.318	$ 2.212	$ 1.659	$ 1.327	$ 1.106	$ 0.948	$ 0.830	$ 0.737	$ 0.664
Plus Maintenance of $.61 per 1000 gallons	$ 0.610	$ 0.610	$ 0.610	$ 0.610	$ 0.610	$ 0.610	$ 0.610	$ 0.610	$ 0.610
Total Cost of Water	$ 3.93	$ 2.82	$ 2.27	$ 1.94	$ 1.72	$ 1.56	$ 1.44	$ 1.35	$ 1.27

Breakeven Gallons as Compared to BPU for 2011 39,503,703

Amortiztion Calculation for Suburban Water Company

Loan Amount	$ 534,784
Interest Rate (Yearly)	7.50%
Interst Rate (Monthly)	0.63%
Number of Periods	240
Annuity Multiplier	124.13
Monthly Payment	$ 4,308.18

Loan Amount Details (Based on Suburban Estimates):

Cost of New Well Field	$ 50,000	Suburban's Estimate See DR # 24 for details
Cost of New Treatment Facility	$ 125,000	Suburban's Estimate See DR # 24 for details
Cost of New Well Field (Contingency)	$ 65,000	Suburban's Estimate See DR # 24 for details
Cost of Distribution System Exp	$ 294,784	Suburban's Estimate, See DR # 60 for details.
Total	$ 534,784	

Docket No. 11-SUBW-448-RTS
Exhibit JTG-55
Page 1 of 1

Cost Estimating Guide for Water, Wastewater, Roads, and Buildings

For Use in Preparing the Local Infrastructure Capital Improvement Plan (ICIP)

Revised June 2007

Developed For:
Department of Finance & Administration
Local Government Division
Bataan Memorial Building, Suite 202
Santa Fe, NM 87507
(505) 827-4977

Prepared By:
New Mexico Environmental Finance Center
2445 Alamo SE, Suite 300
Albuquerque, NM 87106
(505) 924-7028
http://nmefc.nmt.edu

Part 3: Drinking Water System Cost Estimate Worksheet

Surface Water Treatment System For Any Number of Households

Source: Rural Utilities Services, 2000 updated for 2007

The previous cost estimating techniques were for ***groundwater treatment systems***. The information provided here is for ***surface water treatment facilities.*** Costs for distribution systems and storage tanks can be determined using the methods presented previously; the first method from Part 1 should be used if there are less than 300 households and the second method from Part 2 should be used if there are greater than 300 households in the system

This cost table is a surface water treatment facility, and is a one -time cost estimate for construction of a new facility. The estimate does not include expenses for operation and maintenance.

Rural residential households are estimated to include 3.5 peop le per household. The average daily water use is approximately 125 gallons per person per day. This cost table is based on those estimates.

Approximate Number of Households to be Served	Size of Surface Water Treatment Facility	Cost per 1 Gallon of Water
Greater than 3,000	1,000,000 gallons or more per day	$1.75
2,000 – 3,000	750,000 gallons or more per day	$2.19
1,500 – 2,000	500,000 gallons per day	$2.81
Less than 1,500	Less than 500,000 gallons per day	$3.63 - $4.22

Data Request Summary

Printed On: March 16, 2011

11-SUBW-448-RTS

DR#	Request	Submitted By	Submitted To	Satisfactory	Void
1	1) In its Application, Suburban Water indicated that it has 1,542 total customers. Please indicated how many of these customers are residential customers; commercial customers; industrial customers and wholesale customers. 2) In its Application, Suburban Water indicated that its total retail water sales for 2010 was 137,384,453 gallons, of which 34,070,002 gallons was wholesale sales. Net retail water sales was 103,314,451. Please indicate how many gallons of water was sold to residential customers, commercial customers and industrial customers.	Sonya Cushinberry	Mike Breuer		
2	1. Revenue Requirement Exhibit B, page 1, column F, line 31 of the Application shows a revenue requirement of $1,134,968. Exhibit B, page 2 (entitled Rate Design) states that total revenues are $1,144,918. a. Are the revenue requirements on pages one and two supposed to be the same? b. If the revenue requirements are supposed to be the same, please state which revenue requirement is correct. c. If the revenue requirements are supposed to be different, and please explain why the two revenue requirements should be different.	Bill Baldry	Mike Breuer		
3	Wholesale Water Sales Rate for RWD #10 Re: Pages 4 and 5 in Exhibit B On page four of Exhibit B, the Contract Rate for RWD #10 in 2011 is $2.70. On page five of Exhibit B, the Wholesale Revenue Rate per 1,000 gallons for RWD #10 in 2011 is $3.25. a. Is the rate per thousand gallons for RWD #10 supposed to be the same on pages 4 and 5 or are they supposed to be different? b. If the rates are supposed to be the same, which rate is correct? c. If the rates are supposed to be different, please explain why the rates should be different.	Bill Baldry	Mike Breuer		
4	PILOT Percentage for 2012 The Black & Veatch report, Table 9, line 19 shows a Payment in Lieu of Taxes (PILOT) percentage of 9.9% for 2012. Page 6 of Exhibit B (titled Suburban Estimated Wholesale Water Rates) shows a PILOT percentage of 10.9% for 2012. a. Please provide the correct PILOT percentage for 2012.	Bill Baldry	Mike Breuer		

Data Request Summary

11-SUBW-448-RTS

DR#	*Request*	*Submitted By*	*Submitted To*	*Satisfactory*	*Void*
5	BPU Price Increase for 2010 a. Please provide the date that the BPU wholesale price increase became effective in 2010. b. Please provide the BPU wholesale price per thousand gallons that went into effect in 2010.	Bill Baldry	Mike Breuer		
6	Water Revenue a. Please provide Suburban Water sales (in dollars and gallons sold) by month for the period July 2009 - December 2010. b. Please break down Suburban Water sales information (in question a.) between residential, commercial and wholesale customer groups.	Bill Baldry	Mike Breuer		
7	Purchased Water Cost a. For the months of November and December 2010, please provide: 1. Total actual Suburban Water sales in gallons 2. Suburban Water purchases of water from BPU in gallons 3. Cost of water purchased 4. Dollar amount of PILOT adder percentage related to water purchased.	Bill Baldry	Mike Breuer		
8	Suburban Water's Wholesale Activity a. For the months of November and December 2010, please provide: 1. Water sales in gallons to District 10 2. Water sales in dollars to District 10 3. Water sales in gallons to District 6 4. Water sales in dollars to District 6.	Bill Baldry	Mike Breuer		

Data Request Summary

Printed On: March 16, 2011

11-SUBW-448-RTS

DR#	*Request*	*Submitted By*	*Submitted To*	*Satisfactory*	*Void*
9	Kansas City, Kansas Board of Public Utilities a. Please provide a general explanation of the Kansas City, Kansas Board of Public Utilities, for example: 1. Did the City of Kansas City establish the Board of Public Utilities or was it established by state statute? If it was established by state statute, please provide the statute(s). 2. Is the Board of Public Utilities a separate entity or is it a part of the City of Kansas City, Kansas? 3. Does the Board of Public Utilities operate only in the City of Kansas City, Kansas? 4. Does the Board of Public Utilities operate in all parts of Wyandotte county? 5. Does the Board of Public Utilities have operations outside of Wyandotte county?	Bill Baldry	Mike Breuer		
10	Water One Wholesale Water Rates On page 6, line 11 of Mike Breuer's testimony, Water One's wholesale rate of $2.80 per thousand gallons is mentioned. a. Does Water One have a PILOT fee that is added on to water purchases similar to the PILOT fee that BPU adds on to Suburban Water's purchases? b. If Water One has a PILOT fee, does the $2.80 per thousand gallons include the PILOT fee? c. If Water One has a PILOT fee, please provide the rate per thousand gallons for wholesale sales.	Bill Baldry	Mike Breuer		
11	City of Leavenworth Wholesale Water Rates On page 6, line 16 of Mike Breuer's testimony, the City of Leavenworth's wholesale rate of $2.42 per thousand gallons is mentioned. a. Does the City of Leavenworth have a PILOT fee that is added on to water purchases similar to the PILOT fee that BPU adds on to Suburban Water's purchases? b. If the City of Leavenworth has a PILOT fee, does the $2.42 per thousand gallons include the PILOT fee? c. If the City of Leavenworth has a PILOT fee, please provide the rate per thousand gallons for wholesale sales.	Bill Baldry	Mike Breuer		

Data Request Summary

11-SUBW-448-RTS

DR#	*Request*	*Submitted By*	*Submitted To*	*Satisfactory*	*Void*
12	When available, please provide a copy of the Kansas City Kansas Board of Public Utilities' invoice to Suburban Water Company for purchased water for the month of January 2011 (or the first monthly bill reflecting the new 2011 water rate).	Justin Grady	Mike Breuer		
13	Exhibit MB-2, attached to the Direct Testimony of Suburban Witness Mike Breuer, lists a total Moran Well Field production of 69,892,700 Gallons for the year 2000. Exhibit MB-3, also attached, lists a total Moral Well Field production of 60,659,179 Gallons for the year 2010. Please provide the following with regard to these figures. 1. To what does Suburban attribute this decline in production? 2. Please provide the yearly production figures for this well field from 2001-2009. 3. Has Suburban made any attempts to reclaim past production levels from this facility? If so, please provide the details of the efforts. 4. Does Suburban have any future plans to attempt to increase the production of this facility to year 2000 levels? If so, please provide the details of these plans.	Justin Grady	Mike Breuer		
14	On Pg. 6, Line 19 of Mike Breuer's testimony he states that Suburban "is concerned with its ability to obtain water rights in the area near it's distribution system because of the existing water rights owned by the property owners." Additionally, Mike Breuer states on Page 16, Line 11 that "it may be difficult to obtain new water rights in this area given the current water rights to the ground water that is in close proximity to SWC's distribution system." Please provide the following with regard to these statements: 1. Please elaborate on these statements. How does Suburban define the terms "near" and "close proximity" with respect to its distribution system? 2. Has Suburban attempted to obtain water rights for any well projects other than the well attempted in 2006? If so what was the result? Please provide the file number for each water right application. 3. Please provide copies of any correspondence between Suburban Water Company and any entity with respect to the acquisition of water rights from 2000 through 2010.	Justin Grady	Mike Breuer		

Data Request Summary

11-SUBW-448-RTS

DR#	*Request*	*Submitted By*	*Submitted To*	*Satisfactory*	*Void*
15	Exhibit MB-3, attached to the Direct Testimony of Suburban Witness Mike Breuer, states that the Harper Well Field was abandoned in 2008 due to a decreased water table that reached a level below that of the harper wells. 1. What level are the three wells at the Harper Field drilled to? 2. What level was the water table when the field was abandoned? 3. Has Suburban determined the level of the water table at the Harper field site since the facility was abandoned? If so, what was the water table level at 2009, and 2010? 4. When was each of the wells at the field abandoned? All at once in 2008, or over time? What was the cause of each well abandonment? 5. When the well facility was abandoned, did Suburban consider drilling the wells deeper to tap into the lower water table? If so, why was this not pursued? 6. Does Suburban have plans to reopen the Harper Well Field facility at any time in the future either through deeper wells or if the water table increases at the site?	Justin Grady	Mike Breuer		
16	On Page 2, Line 8 of Mike Breuer's testimony, he states that the Moran Well Field had "5 wells at its peak. Please provide the following with regard to this facility. 1. Please list the number of wells at this field from the year 2000 to 2010. 2. If there is a decrease in the number of wells from the year 2000 to 2010, please explain in detail why each well was closed, Suburban's efforts to prevent its closure, and any future plans to re-open the well.	Justin Grady	Mike Breuer		
17	On page 17, line 1 of Mike Breuer's testimony, he states: "However, currently, the City of Leavenworth's Water Department has not been a realistic possibility for an alternative supply of water. This is because the cost to install the necessary distribution mains and connection to purchase water from the City of Leavenworth is estimated to be $400,000. Also the current wholesale water rate of the Leavenworth Water Department ($2.42 per 1000 gallons) exceeds that of BPU ($2.05 per 1000 gallons). Please provide the following with regard to this statement. 1. Has Suburban Water Company determined what BPU water rate, (and volume of water purchased) would make the City of Leavenworth's water rate economical, given the upfront $400,000 investment? If so, please provide.	Justin Grady	Mike Breuer		

Data Request Summary

Printed On: March 16, 2011

11-SUBW-448-RTS

DR#	*Request*	*Submitted By*	*Submitted To*	*Satisfactory*	*Void*
18	Regarding Suburban Water Company's consideration of a wholesale water agreement with the City of Leavenworth in 2010, please provide the following: 1. Copies of all correspondence between the City and Suburban Water Company considering a possible wholesale water agreement (power point presentations, meeting materials, letter of proposals, etc.)	Justin Grady	Mike Breuer		
19	Please provide the supporting details behind Suburban's calculation of the cost of its produced water for the year 2011 of $.70 per 1000 gallons.	Justin Grady	Mike Breuer		
20	Re: Mike Breuer Testimony, page 6, line 17 Mike Breuer states a cost to find a new supply of ground water. 1. If the company did plan on finding a new supply of ground water, does the company have an area already in mind that would be a potential source of ground water? 2. If the company drilled water wells in a new water field, how far away would the new source of ground water be from Suburban's distribution system?	Bill Baldry	Mike Breuer		
21	Please provide the Kansas City, Kansas Board of Public Utilities explanation for / definition of the Payment in Lieu of Taxes charge.	Bill Baldry	Mike Breuer		
22	Article I of the contract states that all water supplied by BPU to Suburban Water shall be surplus water. 1. Does BPU believe that it will still have surplus water when Suburban's contract expires in 2020?	Bill Baldry	Mike Breuer		
23	Re: Mike Breuer Testimony, page 5, lines 2 and 5 1. Please provide documentation that supports the year 2000 cost estimates of $5,000,000 to lay a new pipeline to Water One and to the City of Leavenworth for $400,000.	Bill Baldry	Mike Breuer		

Data Request Summary

Printed: Dec March 16, 2011

11-SUBW-448-RTS

DR#	*Request*	*Submitted By*	*Submitted To*	*Satisfactory*	*Void*
24	Re: Mike Breuer Testimony, page 6, lines 11 and 15 1. Please provide documentation that supports the year 2010 cost estimates of $5,800,000 to lay a new pipeline to Water One and to the City of Leavenworth for $400,000. 2. Please provide documentation that supports the year 2010 estimate of $400,000 to find a new water field and drill one or more wells in the new field.	Bill Baldry	Mike Breuer		
25	In the Revised Engineering Report dated July 26, 2004, Kramer Engineering, P.A. recommended the following (Page V-5): " Install a 70,000 gallon clearwell, and high service pumps be designed and installed at the Moran Well Field to provide additional ground storage, and improve the efficiency of the well field and pumping operations. Did Suburban follow through with this recommendation? If yes, when was this recommendation completed and in-service? If no, please explain Suburban's decision not to follow through with the recommendation, and provide any future plans, if any, to perform the recommendation.	Justin Grady	Mike Breuer		
26	Page 2 of Section 3 of Exhibit MB-1 as attached to Mike Breuer's testimony (The June 1999 Kramer Engineering Report), is missing. Please provide a copy of this missing page.	Justin Grady	Mike Breuer		
27	The Commission's Order in the 10-SUBW-602-TAR Docket expressed concern that Suburban was paying for free water services for the Unified Government and Fire Protection. The Commission in its Order referred to table 18 and Pgs 40-41 of the Black and Veatch report. Although it does in appear that the City and Public Fire Hydrant rate classes have had their allocated costs removed in Table 18, Pg 40 of the report states the following: "Costs associated with City and Interdepartmental service and public fire protection are not recovered through direct charges, therefore, the cost of service for these classes is reallocated to all other retail customers in proportion to their allocated cost of service." (Emphasis added) This passage would appear to support the notion that only the retail customers (and therefore not the wholesale customers) are paying for the free water services to the City and Public Fire Protection. What is Suburban's position about this language? Does Suburban still believe that wholesale water customers are paying for the free water services of the City and Public Fire Protection?	Justin Grady	Mike Breuer		

Data Request Summary

Printed On: March 16, 2011

11-SUBW-448-RTS

DR#	*Request*	*Submitted By*	*Submitted To*	*Satisfactory*	*Void*
28	Please provide a technical explanation for how the water table at the Moran well field can affect production, if the depth of the water table remains above the level that the wells are drilled. (Reference Exhibit MB-4)	Justin Grady	Mike Breuer		
29	Please provide the underlying data in an excel spreadsheet that supports the "Static Level Moran Well Field" graph attached as Exhibit MB-4 to Mike Breuer's testimony.	Justin Grady	Mike Breuer		
30	In response to Staff Data Request No. 13 Suburban Water provided the yearly Moran well field production levels from the year 2000 through 2010. Please provide the following with regard to this response. In 2003 the Moran well field produced 82,395,200 gallons of water, and the static level of the water table appeared to be about 50 feet deep (Exhibit MB-4). In 2010, the Moran well field produced 60,659,179 gallons of water, and the static level of the Moran well field appeared to be just over 50 feet deep. Given these two production levels and the static level of the water at each level, please provide a technical explanation of how the production level drop-off can be attributable to the water table depth.	Justin Grady	Mike Breuer		
31	In response to Dr. No. 13, Suburban stated that it replaced the pumps in wells number 3 and 4 at the Moran Well field in an effort to increase production capacity. The response states that the wells provided an increase in production for a short time period, but the well field as a whole lost production. Please provide the details of this experiment. How much increased production was achieved over what time period? Also, when the wells lost production, how much was lost, over what time period? Was this test performed by an outside contractor? If so, please state the contractor. Is Suburban able to produce documentation (pump test results or otherwise) that supports this conclusion? If so, please provide.	Justin Grady	Mike Breuer		
32	In response to Data Request No. 15, Suburban states that the static water level was determined to be 40.8 feet at the Harper well field on January 1, 2009. Does Suburban know what the water level was in January of 2008 when the wells were shut down? If so, please provide the readings.	Justin Grady	Mike Breuer		
33	The tables attached to Mike Breuer's testimony as Exhibit MB-3 state that the water level at the Harper well field dropped to a level below the depth of the wells in 2008. The Harper wells are drilled at 61, 66, and 71 feet respectively; does this mean that the water table dropped to a depth below 71 feet in 2008?	Justin Grady	Mike Breuer		

Data Request Summary

11-SUBW-448-RTS

DR#	*Request*	*Submitted By*	*Submitted To*	*Satisfactory*	*Void*
34	In response to data request No. 15, Suburban stated that the water level at well #3 had achieved a groundwater depth of 35 feet as of 2010. This appears to be above the level that existed at the time the wells were drilled in 1985 of 36 feet. Does this mean that the aquifer has re-charged to a sufficient level to consider drilling a new well or re-opening well number 3 at the Harper well field?	Justin Grady	Mike Breuer		
35	In response to Data Request No. 16 Suburban states that well No. 5 at the Moran well field was closed in 2007 because of a decrease in the water table. Please provide the following with regard to this well. -What level was well #5 drilled to when it was drilled? -What was the static water level of well #5 at 2007, 2008, 2009, and 2010?	Justin Grady	Mike Breuer		
36	In response to Data Request No. 16 Suburban states that well No. 5 at the Moran well field was closed in 2007 because of a decrease in the water table. Please provide the following with regard to this well. How was Suburban able to determine that well #5 lost production due to a decrease in the water table, instead of a plugged screen, faulty equipment, etc? Was a pump test performed to confirm the suspicions? Please provide documentation if available. Does Suburban plan to replace the pump at well #5 in the future if the water table rises to a sufficient level?	Justin Grady	Mike Breuer		
37	In response to Data Request No. 18 various meeting notes were provided regarding Suburban Water's meeting with the City of Leavenworth in pursuit of a purchased water contract. Please provide the following: 1. In the 7/7/10 meeting a reference is made to a proposal from SWI to Leavenworth. Please provide a copy of the proposal. 2. In the 04/01/10 meeting, a reference is made to a copy of the "Evaluation to Purchase Water 032410" Please provide a copy of this referenced document.	Justin Grady	Mike Breuer		
38	In response to Staff Data Request No. 24, Suburban Water provided cost estimates to connect to Water One and to Leavenworth. 1. Please provide a copy of the source documents that support the cost estimates to connect to Water One and Leavenworth. 2. a. Who prepared the estimates to connect to Water One and Leavenworth? For example, did the city of Leavenworth and Water One provide the estimates to Suburban Water or are the estimates from an engineering firm?	Bill Baldry	Mike Breuer		

Data Request Summary

11-SUBW-448-RTS

DR#	*Request*	*Submitted By*	*Submitted To*	*Satisfactory*	*Void*
39	In response to Staff Data Request No. 24, Suburban Water provided cost estimates to construct a new well. 1. Please provide a copy of the source documents that support the cost estimates to construct a new well. 2. a. Please provide the name of the individual or company that prepared the cost estimate to construct a new well field. b. Please provide the various assumptions that were used in developing the cost estimate. For example, the proposed depth of the well, the location of the new well, expected productive capacity of the well, the capacity of the new treatment plant, the extent the water is expected to be treated, etc. 3. The annual interest expense on the borrowed money is estimated to be $100,000 each year. a. Please provide a copy of the work papers that support the calculation of the annual interest expense. 4. If the $100,000 of interest expense is over the period of time the company expects to pay the borrowed money back to the bank rather than on an annual basis, please provide the number of years and interest rate the interest expense is based on.	Bill Baldry	Mike Breuer		
40	Exhibit B, page 8 of the Application shows sales of water in gallons to Water District No. 6 for a portion of the years 2009 and 2010. Suburban Water sold 276,650 gallons in November 2009 and 280,500 gallons in December 2009 to District No. 6. In January 2010, Suburban sold 788,650 gallons and 1,095,600 gallons in February 2010 to District No. 6. 1. Please explain the causes of why water sales to District No. 6 increased so dramatically from November 2009 to February 2010. 2. Does Suburban Water expect future sales to District No. 6 to remain in the 1.1 to 1.2 million gallon range each month or does Suburban Water expect large increases or decreases? 3. a. If Suburban Water expects large changes in water volume in the future to District No. 6, please explain why the company believes sales volumes will change. b. If sales volumes are expected to change in the future, please provide an estimate as to the volume of water Suburban expects to sell to District No. 6 on a monthly basis when water sales stabilize.	Bill Baldry	Mike Breuer		

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DR#	*Request*	*Submitted By*	*Submitted To*	*Satisfactory*	*Void*
41	A review of the records at the Division of Water Resources, Topeka Field Office, reveals that Application file #47,324 was filed in June of 2009 requesting water appropriate rights for two wells south of the Moran field referred to in the records as Moran #6 and Moran #7. Please provide the following with regard to these wells. 1. Why was this water appropriations file number not provided in response to Staff Data Request No. 14? 2. The records indicate that production from these unpermitted wells was recorded a production for Moran well #5 during the years 2006, 2007, 2008 and 2009. Was the production from these wells (Moran #6 and #7) included in the Moran well production table data provided in response to Staff Data Request No. 13? If so, please separate out the water included in this table that was produced by the wells at Moran 6 and 7 during this time frame that was provided in response to Staff DR No. 13.	Justin Grady	Mike Breuer		
42	On August 31, 2009, the Suburban Water Company requested by letter a 90-day extension of time from the Division of Water Resources (File # 47,324) to provide the necessary engineering and hydrologic data proving that the Moran #6 and #7 wells didn't impair the existing water rights in the area. The letter stated that Suburban was negotiating with Aquaterra to perform a study of the subject aquifer and the referenced two wells. Please provide the following with regard to this letter. 1. Please provide all correspondence between Aquaterra and Suburban Water Company relating to the Moran #6 and Moran #7 wells, the aquifer that these wells tap into, application # 47,324, etc. 2. Was Aquaterra ever contracted to provide the study that Suburban refers to in this letter? If not, please provide an explanation as to why this study was not performed. If so, please provide a copy of the report generated as a result of the study. 3. if Aquaterra was not contracted to provide the service, was there another consulting or engineering firm contracted to provide the service, such as the Taylor Design Group? If so, please provide all correspondence between Suburban Water Company and the consulting/engineering firm contracted to perform the study.	Justin Grady	Mike Breuer		

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43	1. In response to Staff Data Request 19, Suburban Water provided an estimate of well repair and monitoring labor costs based an hourly rate and an estimate of the number of hours to would take to repair and monitor the wells during the year. a. Please provide a copy of the work papers and support documents that were used to develop: 1. the $30.00 hourly rate 2. the 438 hours 2. Well Depletion Costs - lines 10 through 14 of Suburban's response to Staff Data Request 19 a. Are the captialized costs associated with the water well based on current costs to drill and complete a water well or are the costs based on historical costs? b. If the costs are historical costs, what year are the historical costs based on? c. Please provide a copy of the work papers and support documents that were used to develop the well costs.	Bill Baldry	Mike Breuer		
44	In response to Staff Data Request 12, Suburban Water included a copy of its January 2011 bill from BPU. 1. Please provide a copy of the invoices from BPU for Suburban's water purchases for each month of the calendar year 2010.	Bill Baldry	Mike Breuer		
45	Suburban's response to Staff Data Request Number 24 included cost estimates to construct a new well field. Included in the costs to construct a new well field were costs to construct a new treatment plant. 1. Please explain the purpose of a treatment plant and to what extent the plant treats or purifies the well water. 2. Please provide a list of the components of a treatment plant and the cost associated with each component. 3. Does the Moran field have a treatment plant? 4. Does each well field need to have its own treatment plant or could a new well field near the Moran field be connected to the Moran field's treatment plant? 5. If Suburban Water had just one water well in an area, would that one well need a treatment plant?	Bill Baldry	Mike Breuer		

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46	A review of the records of the Division of Water Resources, file No. 44,055, indicates that Suburban Water Company filed an application for appropriation of water on February 11, 2000, for approximately 320 Million Gallons per year (when combined with file No. 44,056). A letter from the DWR to Suburban dated October 29, 2003 states that it was determined that 233.785 Million Gallons per year were available for appropriation, but additional information would be needed from Suburban. On January 22, 2004, the DWR issued a letter to Suburban Water Company requesting proof of legal access to the proposed well cites, and additional information in order to determine whether the proposed wells would provide an impairment of existing nearby municipal and domestic wells. On February 25, 2004, Suburban Water Company sent a letter to the DWR regarding Application No. 44,055 and 44,056 stating: "After careful discussion and review, we have come to a conclusion that we are going to set this aside and retire the proposed locations for this project." On February 27, 2004, the DWR issued an order dismissing Application Nos 44,055 and 44,056. Please provide the following with regard to these applications. 1. Why were these water appropriation file numbers not provided in response to Staff Data Request No. 14? 2. Why did Suburban choose to "set aside and retire the proposed locations for this project?" 3. Did Suburban have legal access to the proposed well cites discussed in Application No. 44,055 (the Northwest Quarter of the Southwest Quarter of the Southeast Quarter of Section 22 East in Township 11, Leavenworth County, KS)? If so, why was this information not provided to the DWR in a timely fashion in furtherance of this application? If not, why was this legal access not obtained? Questions 4 and 5 in Data Request No. 47 are a continuance of this data request.	Sonya Cushinberry	Mike Bruer		

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DR#	*Request*	*Submitted By*	*Submitted To*	*Satisfactory*	*Void*
47	Continued from Data Request No. 46: 4. Did Suburban have legal access to the proposed well cites discussed in Application No. 44,056? If so, why was this information not provided to the DWR in a timely fashion in furtherance of the application? If not, why was this legal access not obtained? 5. Did Suburban ever seek the information referred to in the January 22, 2004 letter in order to determine whether the proposed wells would provide an impairment of existing nearby municipal and domestic wells? If yes, please provide a copy of the aforementioned information. If not, please explain why this information was not obtained.	Sonya Cushinberry	Mike Bruer		
48	A review of the files of the Division of Water Resources indicates that Suburban Water Company filed water appropriations application No. 46,427 on May 19, 2006 for 315 Million Gallons per year of municipal water. The records show that Suburban Water Company requested a 60-day extension in order to identify specific points of diversion within the area requesting water rights. On March 16, 2006 the DWR sent a letter to the Suburban Water Company requesting the specific diversion points, a stratigraphic log of the test hole or well, information justifying requested quantities of water, information regarding surrounding existing wells, etc. On May 17, 2006 the DWR issued an order dismissing this application. Please provide the following with regard to this application. 1. Why was this water appropriation file No. not provided in response to Staff Data Request No. 14? 2. Why did Suburban not provide the requested information identified in the March 16, 2006 letter from the DWR to the DWR in continuation of this application? 3. Did Suburban ever drill any test holes at the site of the requested water rights? What were the results of those test holes? Please provide a copy of any hydrologic data collected by Suburban or on Suburban's behalf regarding the potential for ground water availability at this specific site. (Section 1, Township 11 South, Range 21 East in Leavenworth County).	Justin Grady	Mike Bruer		
49	Staff has learned that Suburban Water made a request to the Kansas Department of Agriculture that its water rights to the Harper well field be dismissed. 1. Please provide the reasoning and any documents that would support the company's request to dismiss its Harper well field water rights.	Bill Baldry	Mike Breuer		

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50	A review of File No. 41,844 (Moran field) indicates that the Water Resources Division of the Department of Agriculture issued an Order on March 1, 2010 allowing Suburban Water to sell wholesale water to Rural Water District Nos. 7 and 9 and to the City of Tonganoxie. 1. Is Suburban Water currently selling water to Rural Water District Nos. 7 and 9 and to the City of Tonganoxie? 2. If yes, please indicate when sales of water began. 3. If Suburban is selling water to Rural Water District Nos. 7 and 9 and to the City of Tonganoxie, please provide the volume of water sold and dollar amount of sales by month for the calendar year of 2010 for each rural water district and the City of Tonganoxie.	Bill Baldry	Mike Breuer		
51	Suburban Water filed an application with the Water Resources Division of the Department of Agriculture requesting an investigation as to whether a well of Rural Water District No. 7 was impairing the Moran field well nos. 1 - 4. The Water Resources Division dismissed the application due to unpermitted pumping from the Moran wells 6 and 7. 1. In reference to Suburban's response to Staff Data Request No. 30, question 3 of 5; please explain why Suburban Water has not requested that the investigation be re-opened. 2. Is Suburban Water planning on requesting that the Water Resources Division re-open the investigation.	Bill Baldry	Mike Breuer		
52	1. Has Suburban Water considered buying water from any Public Wholesale Water District (such as Public Wholesale Water District No. 6)? 2. If yes, please provide details as to the cost of water, terms discussed, etc. 3. If Suburban Water is planning on buying water from a public wholesale water district, please provide details such as when purchases will begin, which water district, estimated quantitiy of purchases, price per thousand gallons, etc.	Bill Baldry	Mike Breuer		

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DR#	*Request*	*Submitted By*	*Submitted To*	*Satisfactory*	*Void*
53	On Page 16, beginning on line 13 of Mike Breuer's testimony, he states that "SWC believes it needs to have a study performed as to the likelihood of success of such efforts before going forward in expanding its own water resources." Please provide the following with regard to this statement. 1. Does SWC have a list of qualified vendors that could be asked to perform this service? 2. What does SWC estimate that the cost of such a study would be? 3. Was a study such as this performed before SWC attempted to gain the right to appropriate water from the locations covered under DWR Application #'s 46,504 and 46,427? 4. If the answer to #3 above is no, how did SWC choose the specific sites covered under DWR application #'s 46,504 and 46,427?	Justin Grady	Mike Breuer		
54	Please provide a copy of the invoices from Suburban Water's consultants that relate to work they have perfomed on docket no. 11-SUBW-448-RTS.	Bill Baldry	Mike Breuer		
55	On Page 16, beginning on line 13 of Mike Breuer's testimony, he states that "SWC believes it needs to have a study performed as to the likelihood of success of such efforts before going forward in expanding its own water resources." Please provide the following with regard to this statement. Please describe the nature of the study being referred to in this passage. Would this be a study to cover the entire suburban water territory in order to identify the best potential sites for groundwater? Or would this study be more in line with the study SWC was negotiating with Aquaterra to perform for the permitting process of the Moran 6 and 7 wells?	Justin Grady	Mike Breuer		
56	On Page 16, beginning on line 13 of Mike Breuer's testimony, he states that "SWC believes it needs to have a study performed as to the likelihood of success of such efforts before going forward in expanding its own water resources." Please provide the following with regard to this statement. Assuming this study refers to a limited area aquifer modeling study, such as SWC was negotiating with Aquaterra to perform for file No. 47,324, which specific sites would SWC prefer to have the study performed on? What is Suburban's position on performing the study at the site covered under DWR File No. 44,055?	Justin Grady	Mike Breuer		
57	In response to Staff Data Request No. 42, SWC states that it did not have the funds to undertake the study that was necessary in order to complete the permitting process to continue pumping the Moran Wells No. 6 and 7. Assuming this is the same type of study referred to on Page 16, line 13 of Mike Breuer's testimony in this case, does SWC now have the funds to perform the recommended study?	Justin Grady	Mike Breuer		

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DR#	*Request*	*Submitted By*	*Submitted To*	*Satisfactory*	*Void*
58	A review of a geologic map of Leavenworth County, Kansas, found at the following link, http://www.kgs.ku.edu/General/Geology/County/klm/leavenworth.html This map appears to show a significant glacial drift aquifer North of Highway 24, between Stranger Creek and Wolf Creek, north of SWC's existing Harper Well fields. Has SWC ever attempted groundwater exploration in this aquifer, in this area? If yes please describe the extent of such efforts and the level of success at locating groundwater, if any. Does SWC believe that this area would be a promising area to focus a study on, reference Page 16, line 13 of Mike Breuer's testimony in this case.	Justin Grady	Mike Breuer		
59	In response to Data Request No. 46, Item No. 3, SWC states that it could not gain legal access to the property owned by Temme Family Partners, Ltd, to drill a test well at the site covered by DWR file No. 44,055. Does SWC's president Raphael Breuer currently own the property referenced above? If the answer is No, does SWC currently have access to this property? Is this the same property that Moran Wells 6 and 7 were drilled on in 2006?	Justin Grady	Mike Breuer		
60	SWC's applications for water appropriation rights filed under DWR file Nos 46,504, 46,427, 44,055 and 44,056 all requested a significant quantity of water. (From 160 Million Gallons per Year to 350 Million Gallons per Year). Has Suburban considered requesting the right to appropriate water at less significant quantities in order to increase the possibility of success in these, or other areas? Given SWC's estimates to drill and new well field, what amount of water (in Millions of Gallons per year) does Suburban believe would be necessary in order to make ground water economical when compared to purchases from BPU? Please provide all calculations necessary to support the conclusion.	Justin Grady	Mike Breuer		
61	1. Please provide Suburban Water's actual rate case expense through February 28, 2011. 2. Please provide a copy of the invoices supporting the actual rate case expense through February 28th. 3. Please continue to provide rate case expense and a copy of the supporting invoices the company incurs for each calendar month subsequent to February 2011 until the rate case is completed.	Bill Baldry	Mike Breuer		

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DR#	*Request*	*Submitted By*	*Submitted To*	*Satisfactory*	*Void*
62	In response to Staff Data Request No. 51, Suburban Water Company stated that it has not requested to re-open the complaint because a March 15, 2010 letter from the Division of Water Resources indicated that the investigation had been invalidated by SWC's illegal diversion from Moran Wells # 6 and 7. Staff is also in possession of this letter, and the last paragraph states the following: "Please note that this action does not restrict or in any way preclude the Suburban Water Company from filing any complaint in the future pursuant to K.A.R. 5-4-1 if you believe your prior right to the use of water is being impaired by junior users." In discussions with Katherine Tietsort, Water Commissioner of the Division of Water Resources, Staff has learned that SWC could request that the impairment investigation be re-opened at any time, and that the paragraph referenced above clarifies that. Given the above discussion, why does SWC believe that it cannot request to re-open the impairment investigation because the investigation was suspended in the past?	Justin Grady	Mike Breuer		
63	In response to Staff Data Request No. 51, Suburban Water Company stated that it is currently in discussions with RWD No. 7 about possible water supply options that would be beneficial to SWC. Please provide an explanation as to what discussions have taken place, when the discussions began, the amount of groundwater discussed to be purchased, terms of such purchases, etc. Please provide all correspondence between RWD No. 7 and SWC regarding "possible water supply options that would be beneficial to SWC." Please discuss the extent to which a connection exists between SWC's distribution system and the RWD No. 7's distribution system. Does an interconnection exist currently that would allow SWC to buy water from RWD No. 7? If these water supply discussions fail to result in an additional source of groundwater for SWC, will SWC request to re-open the impairment investigation with the DWR?	Justin Grady	Mike Breuer		

Total Requests To Date: **63**