City of Gooding, Idaho
Water Facilities Planning Study
DEQ Grant No. DWG 126-2012-7
PWS No. ID5240009





May 2016

Documents included in Water Facilities Planning Study:

- Water Facilities Planning Study, January 2016
- Supplement to Water Facilities Planning Study, March 2013
- Revision I to Water Facilities Planning Study, February 2015
- Revision II to Water Facilities Planning Study, April 2016

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City of Gooding

Water Facilities Planning Study

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PROJECT NO. 212004
May 2016

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Table of Contents

List of Tables

List of Figures

Authorization

In January 2012, the City of Gooding, Idaho contracted with Keller Associates, Inc. to prepare a Water Facilities Planning Study and Master Plan for the City's potable water system (PWS No. ID5240009). The study was funded with the DEQ SRF grant (50%) and by the City of Gooding (50%). DEQ Grant No. DWG 126-2012-7.

Chapter 1 Executive Summary

1.1 Introduction

In 2012, the City of Gooding, Idaho contracted with Keller Associates, Inc. to prepare a Water System Facilities Planning Study. The purpose of the study is to provide a comprehensive evaluation of the existing system and provide recommendations to meet future demands and to continue to provide quality water to all residents in the service area.

1.2 Existing Water System

There are 1378 residential and 231 commercial connections in the City. Water is supplied to the distribution system from three groundwater wells located within the City limits. The total pumping capacity of the system is 3,543 gpm and the City has water rights for 3,164 gpm.

The distribution system consists of approximately 42.5 miles of piping. The City owns and operates two above ground water storage reservoirs: a 50,000 gallon tank at Senior Avenue and a 1.14 MG glass-lined tank at Washington Street. The reservoirs supply water to the City with the assistance of two booster pump stations. The City also utilizes a separate gravity irrigation system that services approximately 73% of the homes.

The City monitors their water meters to determine how much water is used on a per connection basis and monitors water production at each groundwater well. Based upon this information the average day demand is 26,014 gallons per home per month (355 gpcd) for homes without access to irrigation and 7,329 gallons per home per month (100 gpcd) for homes with irrigation water access.

1.3 Projected Conditions

According to the 2000 Census, Gooding had a population of 3,384 people (U.S. Census Bureau, 2002); and according to the 2010 Census, the City had increased in population to 3,567 people (U.S. Census Bureau, 2012). This was an annual increase of 0.53% over 10 years. Although the population between 2000 and 2010 increased at a slow rate, it is important to design for anticipated growth under ideal conditions. The projected populations for the years 2017, 2032, and 2052, assuming a 1.2% annual growth rate, are 3,878, 4,637, and 5,887 people, respectively.

1.4 Existing Facility Evaluation

Issues identified in the Water Facilities Planning Study are summarized as follows:

- The gravity irrigation system has deteriorated beyond repair and is becoming unmanageable. The City intends to abandon the irrigation system and upgrade the potable water system to accommodate potable and irrigation needs.
- The City's current water rights and infrastructure are insufficient to accommodate the use of potable water for irrigation.

- An upgrade of the water system (wells and piping) is necessary to accommodate increased demands from the potable water system and to meet fire flow requirements.
- Much of the system is connected through piping smaller than 6 inches. IDAPA 58.01.08, §542.06 requires that fire hydrants be connected to water mains no smaller than 6 inches.

1.5 Water System Improvements and Project Schedule

Several system improvements, including opinions of probable cost, have been identified to help remediate the system deficiencies presented in Section 1.4 (Table 1-1). These improvements are competing alternatives, and were presented as such to the City.

Table 1-1 Summary of Conceptual Cost Estimates

Alternative	Estimated Cost
Water Supply Improvement 1 – Maintain existing gravity irrigation system	$14,162,000
Water Supply Improvement 2 – Install pressurized irrigation system	$12,052,000
Water Supply Improvement 3a – Drill additional wells & upgrade distribution system	$9,450,000
Water Supply Improvement 3b – Construct surface water treatment plant & upgrade distribution system	$19,068,000
Water Supply Improvement 3c – Construct surface water treatment plant & add new well & upgrade distribution system	$14,770,000

After presenting our findings and recommendations at advertised public meetings and receiving input from citizens in general as well as a citizens advisory committee, key City staff and elected officials elected to proceed with Water Supply Improvement 3a. Further cost breakdown of this alternative is presented in Table 1-2. A detailed description of each alternative and priority improvements are given in Chapter 7.

Table 1-2 Water System Priority Improvements 3a

Item	Total
Priority 1	$2,387,100
Priority 2	$1,127,840
Priority 2.5	$2,192,520
Construction Subtotal	*$5,707,460*
Contingency (2.56%)	$146,216
Construction Total	***$5,853,676***
Land and Easement Acquisition	$142,100
SCADA	$90,000
Land and SCADA Subtotal	*$232,100*
Construction Total, Land, and SCADA Subtotal	*$6,085,776*
Engineering (16%)	$973,724
Water Rights	$2,004,000
Legal and Permitting	$80,000
Financial and Audit	$15,000
Interim Interest Expense	$200,000
Administrative services	$91,500
Total	**$9,450,000**

The cost estimate herein is based on our perception of current conditions at the project location. This estimate reflects our opinion of probable costs at this time and is subject to change as the project design matures. Keller Associates has no control over variances in the cost of labor, materials, equipment, services provided by others, contractor's methods of determining prices, competitive bidding or market conditions, practices or bidding strategies. Keller Associates cannot and does not warrant or guarantee that proposals, bids, or actual construction costs will not vary from the cost presented herein. Cost sums are rounded up to the nearest ten thousand.

A financial analysis was completed on Alternative 3a to estimate the water user rates required to complete the project. The analysis of user rates with an assumption that the City would not receive grant funds is given in Table 1-3.

Table 1-3 Estimated Rate Impact without Grants

Priority	Project Costs	Estimated Monthly User Rate Increase	Cumulative Monthly Rate
Existing Rate	-	-	$32.06
Alternative 3a	$9,450,000	$34.44	**$66.50**
Total	**$9,450,000**	**$34.44**	**$66.50**

Further analysis was performed based on the anticipated grant and loans listed in Table 1-4 and the assumption that the users will maintain the same water use characteristics. The analysis was made for Priorities 1, 2, and 2.5 assuming the Idaho Department of Commerce Community Development Block Grant of $350,000, a 1% DEQ loan of $7,100,000, and a 3.5% private loan of $2,000,000 (Table 1-4). To complete the project under this Alternative, the City will need to raise water user rates from the current average rate of $32.06 to $63.88.

Table 1-4 Anticipated Increase of Monthly User Rates

Anticipated rate	Funding Amount	Monthly Rate Impact for Users
Block Grant	$350,000	$0.00
DEQ Loan	$7,100,000	$20.38
Private Loan (water rights)	$2,000,000	$7.29
Total	**$9,450,000**	**$27.67**
	Reserve (10%)	**$2.77**
	Increased O&M (5%)	**$1.38**
	Total	**$31.82**

DEQ loan: 1%, 20 years, 1609 connections
Private loan: 3.5%, 20 years, 1609 connections

Chapter 2 Introduction

2.1 Introduction

The City of Gooding, Idaho is a small farming community located 12 miles north of Wendell, Idaho, which is off Interstate 84 between Jerome and Bliss. Gooding is the county seat for Gooding County encompassing four small communities Bliss, Gooding, Hagerman and Wendell. The City was established in 1907 and incorporated in 1908. Originally, the town was located on approximately 160 acres owned by Frank R. Gooding, one of the pioneer sheep ranchers of the area, an early mayor of the City of Gooding, and who later served as Idaho's Governor and then on the U.S. Senate. The City is a strong agricultural hub with ventures in cattle and sheep ranching, dairy farms, irrigated and dry farming, and cheese factories to service the strong dairy industry (Gooding Chamber of Commerce, 2011). The Union Pacific Railroad runs on the northern end of the City and serves as easy access for grain shipments (Figure 2-1).

Today, the City of Gooding has a population of 3,567 with a majority of employment in farming and processing. The City currently provides water, sewer, and garbage service to City residents. The City's potable water supply comes from 3 groundwater wells within the City limits. The City also provides gravity irrigation services to approximately 73% of its residents. Based on the water billing data provided by the City, 27% of homes use potable water for irrigation purposes, 44% of homes irrigate with surface water and 29% users irrigates with both systems.

Other utilities available to community residents and businesses from other non-city entities include electrical power, natural gas, and high speed communications.

This study has been completed to assess the current condition and capacity of the Gooding water system as well as to assess the system with regard to future needs. The City owns and operates its water supply, storage, and distribution system and is committed to providing all residents with quality water and fire protection. This study evaluates the current water system, identifies potential deficiencies, and makes recommendations to improve the system in order to continue delivering quality water and meet future demands. System improvements were developed without any consideration of the ethnicity, religion, or socioeconomic status of City residents that the proposed improvements will benefit.

The City of Gooding will carry out the project according to the project schedule and take responsibility for operation and maintenance of the new system upon completion of the project. The City has licensed operators and completed successful infrastructural projects in the past, including a collection system improvement project in 1990s. The City is in the process of obtaining necessary financial resources. As part of the process the City is working with Bond Council, Moore Smith Buxton and Turcke, Chartered, and has scheduled a judicial confirmation for February 15th, 2013. The City will follow federal procurement guidelines for acquisitioning, maintaining, safeguarding, and disposing of property.

2.2 Purpose

The purpose of this Water Facilities Planning Study is to provide a comprehensive evaluation of the existing system and provide recommendations to meet current and future needs.

2.3 Scope

The Scope of this study includes the following:

- Existing Facilities Condition and Evaluation
- Compilation of data concerning the age and condition of the existing water system, including but not limited to pipelines, valves, the reservoir, wells, and other facilities
- Evaluation of the existing water system components
- Outline of prioritized recommended improvements
- Model existing water facilities
- Compile and review in the model:
    - Study area boundaries
    - Inventory of existing facilities
    - Type and amount of water consumption and production
    - Existing and projected land use and population
- Evaluate standards, recommendations, and design criteria for:
    - Water supply
    - Storage
    - Pressure requirements
    - Fire Protection
- Review existing water system condition, including:
    - System pressures
    - Pressure zones
    - Facility and pipe capacities
    - Available fire protection
    - Well supply
    - Water storage
    - Transmission and delivery
- Develop alternative solutions to address potential system deficiencies
- Water supply and storage analysis
- Review current and future water supply and storage needs
- Evaluate available water quality information and make recommendations to improve quality
- Evaluate reservoir mixing and recommend improvements
- Master planning and capital improvement plan
- Prepare Master Plan including:
    - Future facility needs
    - Replacement and pipeline extensions
    - Develop an estimated schedule for capital improvements and a summary of potential impacts on rates and/or funding sources
- Report preparation

- Submit to City for review and approval
- Submit to Idaho Department of Environmental Quality for review and approval
- Public participation, presentations, and meetings
- Environmental Information Document (EID)

2.4 Abbreviations

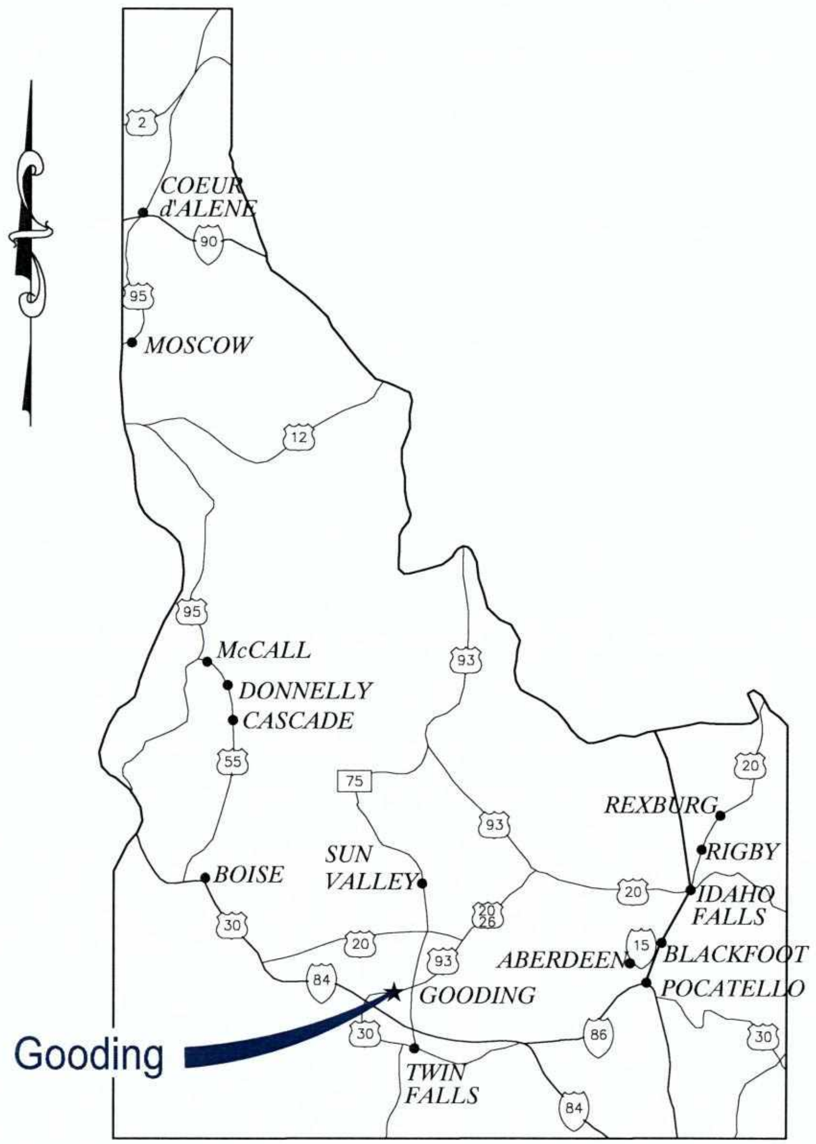
- ADD average day demand
- AWWA American Water Works Association
- bgs below ground surface
- cfs cubic feet per second
- CDBG Community Development Block Grant
- DEQ Idaho Department of Environmental Quality
- EPA United States Environmental Protection Agency
- FPS Facilities Planning Study
- ft feet
- fps feet per second
- gal gallons
- gpcd gallons per capita per day
- gpm gallons per minute
- gpd gallons per day
- Hp horsepower
- IDWR Idaho Department of Water Resources
- IRPDWS Idaho Rules for Public Drinking Water Systems
- IOC inorganic chemical
- kW kilowatt
- MCL maximum contaminant level
- MDD maximum day demand
- MGD million gallon per day
- mg/L milligrams per liter
- MG million gallons
- PHD peak hour demand
- ppb parts per billion
- ppm parts per million
- psi pounds per square inch
- PWI potable water irrigators
- RD United States Department of Agriculture – Rural Development
- sec second
- SDWA Safe Drinking Water Act
- SOC synthetic organic chemical
- SWI surface water irrigators
- VOC volatile organic chemicals
- WFPS Water Facilities Planning Study

2.5 Definition of Terms

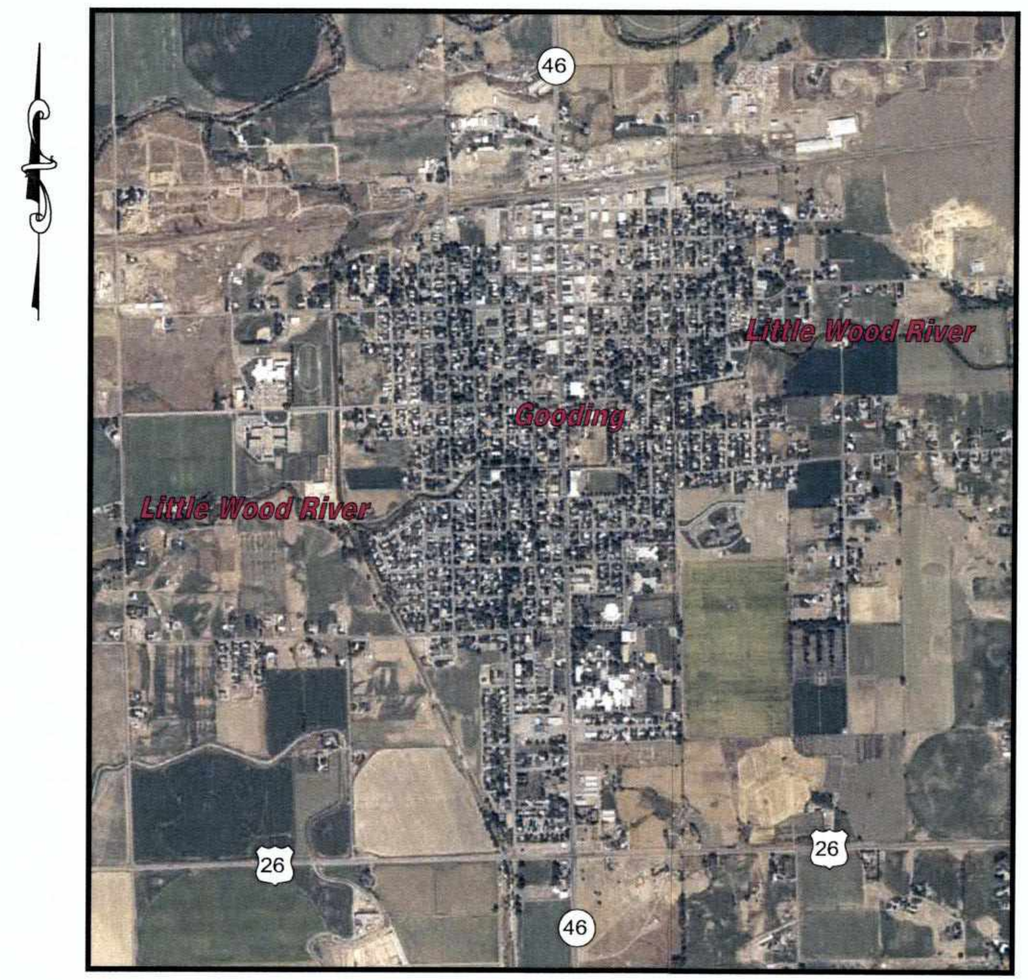
- Average Day Demand (ADD) – the volume of water supplied to the system in a year divided by 365 days
- Consumption – refers to the volume of water customer's use. Consumption is generally measured with a water meter installed at each consumer's connection to the water system. In cases where a water system is not equipped with water meters at individual connections, consumers are charged a flat rate for water usage.
- Demand – refers to the water needed to meet residential, commercial, industrial, and public water needs over a period of time, as well as the system losses that are associated with the demand. Demands on the water system vary by the time of day and season. Due to varying consumer needs, system condition, and other factors, individual communities have unique water demand patterns. Volumetric rates (gpm or cfs), volumes (gal or MG), and per capita demand (gpcd) are often used to quantify the demand placed on a system.
- Demand Factors – also referred to as peaking factors. Demand factors define the relationships between ADD, MDD, and PHD.
- Fire Flow – flow required to supply a sufficient quantity of water to fight a fire. The *International Fire Code* establishes fire flow requirements and is the accepted code in the State of Idaho.
- Firm Pumping Capacity – the total pumping capacity that a pump system can deliver with the largest pump out of service.
- Maximum Contaminant Level (MCL) – refers to the greatest concentration of a contaminant allowed in drinking water often reported in ppm, ppb, mg/L, or µg/L.
- Maximum day Demand (MDD) – the maximum volumetric rate or volume of water supplied to the system in one day during a year.
- Peak Hour Demand (PHD) – the maximum volumetric rate or volume of water supplied to the system in one hour during a year.
- Safe Drinking Water Act (SDWA) – United States regulation passed by Congress in 1974 to protect public health by regulating public drinking water. The Act was amended in 1986 and 1996 and is enforced by the EPA.
- Total Pumping Capacity – the total pumping capacity of all pumps within a pumping system.

CITY OF GOODING
WATER FACILITIES PLANNING STUDY

PROJECT NO. 212004 MAY 2012



VICINITY MAP



LOCATION MAP

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CITY OF GOODING

WFPS

LOCATION OF GOODING

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FIGURE NO. FIG. 2-1

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Chapter 3 Design Criteria

Municipal water system improvements need to be designed with consideration for future growth and associated demands on the water system. Water system components that can be easily accessed, such as pumps, and storage facilities, should be sized for a 10 to 25 year design period, which is the assumed useful life of these components. Other improvements, such as distribution mains, underground valves, and fire hydrants, have a useful life in the range of 25 to 50 years (Chin, 2000). A longer design period should be considered for these facilities since the materials typically have a longer life and the components are not easily or readily accessible. Water system design, for smaller communities with stable growth, is often based upon requirements for fire flow, but these systems may become undersized if the community experiences an increase in growth above its predicted growth rate over the design life of the system.

3.1 Water Supply

The City of Gooding uses two water systems, a pressurized groundwater drinking water system and a gravity surface water irrigation system. However, the drinking water system that is projected to be deficient by 2017 scarcely meets the existing water demand and calls for a need in supplemental water supply sources, a need to eliminate public health concerns associated with low pressures in the system, and a need for redundant power systems.

Modifications to the water system's configuration are considered to be substantial and include an increase in redundant well pumping capacity and an increase in transmission and distribution water mains to facilitate construction of new wells and improved fire flows.

A substantially modified system, as defined by IDAPA 58.01.08.118, is a system where "as the result of one or more projects, there is a combined increase of twenty-five percent (25%) or more above the system's existing configuration in the population served or number of service connections, the total length of transmission and distribution water mains, and the peak or average water demand." Such a system must have standby power and/or storage capable of providing eight hours of ADD plus fire flow, as specified in IDAPA 58.01.08.501.07:

> *New community water systems constructed after April 15, 2007 are required to have sufficient dedicated on-site standby power, with automatic switch-over capability, or standby storage so that water may be treated and supplied to pressurize the entire distribution system during power outages. During a power outage, the water system shall be able to meet the operating pressure requirements of Subsection 552.01.b. for a minimum of eight (8) hours at average day demand plus fire flow where provided. A minimum of eight (8) hours of fuel storage shall be located on site unless an equivalent plan is authorized by the Department. Standby power provided in a public drinking water system shall be coordinated with the standby power that is provided in the wastewater collection and treatment system.*

Furthermore, a water system must be capable of providing MDD plus fire flow with any pump out of service. The pumping requirement to meet this scenario may be reduced depending upon the system's available gravity fire storage. The local Fire Authority, in writing, may reduce the required fire flow as deemed appropriate (IDAPA 58.01.08.501.18).

Booster stations have similar requirements to those previously stated. For more information on these requirements consult the Idaho Rules for Public Drinking Water Systems sections §541.04.c, §501.17, and §501.07.b.ii.

3.2 Water Storage

The Idaho Rules for Public Drinking Water Systems defines the following storage components[1] (Figure 3-1):

- Dead Storage – Storage that is either not available for use in the system or can provide only substandard flows and pressures
- Effective Storage – Storage other than dead storage that is made up of operational storage and standby storage
- Operational Storage – Storage that supplies water when, under normal conditions, the sources are off. This component is the larger of:
  - The volume required to prevent excess pump cycling and ensure that the equalization, fire suppression, and standby storage components are full and ready for use when needed
  - The volume needed to compensate for the sensitivity of the water level sensors
- Equalization Storage – Storage of finished water in sufficient quantity to compensate for the difference between a water system's maximum pumping capacity and PHD.
- Fire Suppression Storage – The water needed to support fire flow in those systems that provide it.
- Standby Storage – Storage that provides a measure of reliability or safety factor should sources fail or when unusual conditions impose higher than anticipated demands.

[1] IDAPA 58.01.08 – Idaho Rules for Public Drinking Water Systems, § 003.16

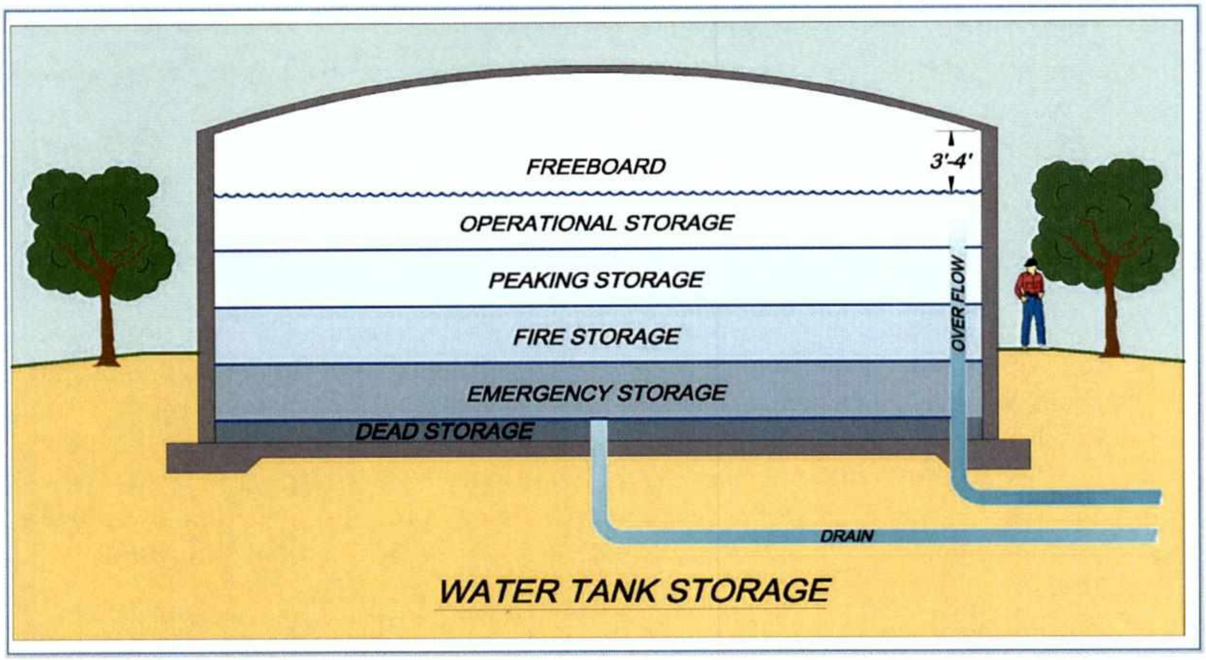

Figure 3-1 Water Tank Storage Components

Keller Associates recommends a minimum storage capacity equal to the equalization, fire suppression, and standby operational storage needs.

3.3 System Pressures

Water pressures at any point in the distribution system must not be below a minimum pressure of 40 psi during PHD conditions excluding fire flow. Water pressure at any point in the distribution system must be maintained above 20 psi during a MDD and fire flow event[2]. If pressure in the system drops below 20 psi the system is at risk of contamination and in violation of State regulations. Furthermore, IDAPA 58.01.08.552.01.b.vi states, "Any public water system shall keep static pressure within the distribution system below one hundred (100) psi and should ordinarily keep static pressure below eighty (80) psi. Pressures above one hundred (100) psi shall be controlled by pressure reducing devices installed in the distribution main. The Department may approve the use of pressure reducing devices at individual service connections on a case by case basis, if it can be demonstrated that higher pressures in portions of the distribution system are required for efficient system operation. If system modification will cause pressure to routinely exceed eighty (80) psi, or if a check valve or an individual pressure reducing device is added to the service line, the water system owner shall notify affected customers. Notification may include reasons for the elevated pressure, problems or damage that elevated pressure can inflict on appliances or plumbing systems, and suggested procedures or mitigation efforts affected property owners may initiate to minimize problems or damage."

[2] IDAPA 58.01.08 – Idaho Rules for Public Drinking Water Systems, § 552.01.b.i & § 552.01.b.v

3.4 Distribution and Transmission Pipelines

Pipeline design is based upon meeting PHD as well as fire protection while maintaining required system pressures. The following design criteria should be addressed:

- Water lines where fire flow is not supplied should not be smaller than three inches in diameter[3]. Keller Associates, Inc. recommends eight-inch diameter pipes for water mains that provide fire flow.
- Dead end lines should be equipped with a means of flushing at a velocity of at least 2.5 fps[4].
- Dead end mains should be minimized by looping the system when practical.
- Valves should be located to minimize the amount of the system exposed to contamination due to loss of pressure during repairs.
- Fire hydrants should be connected to lines that are at least six inches in diameter3.
- Fire hydrants should be placed 250 to 500 ft apart, depending upon the area served.
- System pipe sizing should reduce the velocity head to reduce friction loses. Typical pipeline velocities should be between 2.5 ft/sec and 5 ft/sec and should not exceed 10 ft/sec.
- Pipelines may be oversized to allow for flexibility in future growth.

3.5 Fire Protection

The local fire department relies on the City's potable water system to provide adequate volume and pressure for fighting fires. Pipeline size is often based upon meeting fire protection demands. As previously discussed, the Idaho Rules for Public Drinking Water Systems require that the water system maintain residual pressure of 20 psi during a MDD plus fire flow with any pump off-line to minimize the risk of contamination to the water system.

Table 3-1 estimates fire protection requirements based upon the 2009 International Fire Code, however, exact requirements are also based upon construction type (International Code Council, 2009). The 2009 International Fire Code should be consulted for further details. Reduction in fire flow requirements of up to 50% for one- and two-family residential buildings and 75% for buildings other than one- and two-family residential buildings is allowed when the building is equipped with an approved automatic sprinkler system. Currently, the general City limits of Gooding has a class 3 (light noncombustible construction) fire insurance classification as rated by the Idaho Surveying & Rating Bureau.

Table 3-1 describes the general rule of thumb for sizing required fire flows. Appendix A further breaks down each business's necessary fire flows per the Idaho Surveying and Rating Bureau. Appendix A also includes system pump curves.

[3] IDAPA 58.01.08 – Idaho Rules for Public Drinking Water Systems, § 542.06

[4] IDAPA 58.01.08 – Idaho Rules for Public Drinking Water Systems, § 542.09

Table 3-1 Fire Protection Requirements

Building Type	Building Size (ft^2)	Flow (gpm)	Duration (hr)	Storage (gal)
One- & Two Family Residential	<3,600	1,500	2	180,000
Multi- & One-Family Residential	<3,600	1,500	2	180,000
Multi- & One-Family Residential	3,600 – 4,800	1,750	2	210,000
Multi- & One-Family Residential	4,801 – 6,200	2,000	2	240,000
Non-Residential	5,901 – 7,900	1,750	2	210,000
Non-Residential	15,401 – 18,400	2,750	2	330,000
Non-Residential	18,401 – 21,800	3,000	3	540,000
Non-Residential	21,801 – 25,900	3,250	3	585,000
Non-Residential	25,901 – 29,300	3,500	3	630,000
Non-Residential	29,301 – 33,500	3,750	3	675,000
Non-Residential	>33,501	4,000	4	960,000

3.6 Water Quality Regulations

Water quality is based on the EPA SDWA which includes primary standards (legally enforceable) and secondary standards (not legally enforceable). Primary standards are defined to protect public health while secondary standards are defined for contaminants that pose no public health issue, but may cause corrosion, odor, unpleasant taste, or staining. Primary standards exist for microorganisms, IOC's, SOC's, and VOC's.

In association with the SDWA, the EPA has developed rules to further address water quality. The following drinking water rules are considered priority rulemakings by the EPA. The summaries that follow contain only an overview of the associated rule and should in no way be considered authoritative. For additional information consult the EPA's Ground Water & Drinking Water page at www.epa.gov/safewater (U.S. Environmental Protection Agency, 2006).

- **Ground Water Rule** – The Ground Water Rule (October 2006) addresses the risks of exposure to fecal contamination from community water systems that are supplied by ground water. Viral and bacterial pathogens are found in fecal matter which can be introduced to ground water sources from leaking septic systems, leaking sewer systems, and potentially through open flow paths in the ground. This rule addresses risk through a risk-targeting approach using four components. These components are:
    1. Periodic sanitary surveys
    2. Source water monitoring
    3. Corrective actions
    4. Compliance monitoring

- **Nitrate Rule** – The Phase II Rule, the regulation for nitrate, became effective in 1992. The MCL for nitrate is 10 mg/L. Nitrates themselves are fairly nontoxic and are primarily used as fertilizer for agriculture. However when nitrates are ingested they are converted to nitrites. Nitrites basically do not allow oxygen to bind to the blood cells, thus decreasing the transportation of oxygen throughout the body, a condition known as methemoglobinemia. The ingestion of nitrates is especially harmful to infants (Argonne National Laboratory, 2005). Infants below six (6) months of age who drink water containing nitrate in excess of the MCL could become seriously ill and, if untreated, may die. Symptoms include shortness of breath and blue baby syndrome (EPA, 2012a).

- **Arsenic Rule** – Long-term exposure to arsenic in drinking water has been linked to cancer of the bladder, lungs, skin, kidney, nasal passages, liver, and prostate. Other effects of ingesting arsenic include cardiovascular, pulmonary, immunological, neurological, and endocrine effects. The Arsenic Rule was published in January 2001 and changed the MCL from 0.050 mg/L to 0.010 mg/L (EPA, 2012b).

- **Nuisance Contaminants** – Some of the nuisance contaminants found in municipal water systems are Hydrogen Sulfide, Ammonia, Iron, and Manganese. Where applicable, contaminants have been compared to the National Secondary Drinking Water Regulations as set by the EPA. These are non-enforceable guidelines regulating aesthetic water quality parameters. The EPA does not have suggested guidelines for hydrogen sulfide and ammonia.

  The presence of hydrogen sulfide adversely affects the smell and taste of the water. Hydrogen sulfide causes the "rotten egg" taste and odor problems commonly encountered in many wells in the area. At concentrations of 1 mg/L, hydrogen sulfide may tarnish some metals, and leave black stains on laundry and porcelain fixtures.

  Ammonia is found naturally in groundwater supplies and as a result of agricultural and industrial processes. According to the studies performed by the World Health Organization, natural levels of ammonia are usually below 0.2 mg/L in groundwater. Ammonia does not usually affect anything other than the taste and smell of the water. Toxicological effects from ammonia do not become an issue until concentrations of 200 mg/kg of body weight are reached.

  Iron is a naturally occurring contaminant in drinking water and is typically found in concentrations ranging from 0.5 mg/L to 50 mg/L depending on the geologic characteristics of the area. Excessive iron in drinking water can cause discoloration and taste problems.

  Manganese is a metal found naturally in ground and surface water supplies at concentrations ranging from 1μg/L to 10 mg/L. Its presence in drinking water is not considered a health risk, but it can lead to discoloration and precipitate deposition on water fixtures. Iron and Manganese are responsible for the "hard" taste in many waters and can be treated by adding a polyphosphate when iron and manganese levels are low to moderate.

A chlorine residual of 0.2 mg/L in a water distribution system can be used to eliminate the growth of bacteria and other contaminants throughout the distribution system. Chlorination is used to oxidize constituents such as hydrogen sulfide which causes "rotten egg" taste and odor problems.

- **Lead and Copper Rule** – The lead and copper rule was promulgated in June 1991 to address lead and copper concentrations in drinking water that occur due to corrosion in transmission and distribution systems. Action levels were established at 0.015 mg/L for lead and 1.3 mg/L for copper based upon the 90th percentile level in tap water samples taken in homes/buildings that are considered to be at high risk of lead/copper contamination. A corrosion control study and subsequent treatment must be instituted if action levels are exceeded.

- **Stage 1 & 2 Disinfectants and Disinfection Byproducts Rule** – Disinfectants are used to inactivate many potentially harmful microorganisms, but they may also react with natural organic and inorganic material in the source water to form disinfection byproducts (DBP's). DBP's, such as chloroform, have been shown to be carcinogenic and have been shown to cause reproductive and developmental effects in laboratory animals. The Stage 1 Disinfectants and Disinfection Byproduct Rule was promulgated in December 1998 and establishes maximum residual disinfectant levels (MRDL) and MCL's for disinfection byproducts. Additionally, this rule addresses removal of total organic carbon (TOC) to minimize the production of DBP's. Stage 2 Disinfectant and Disinfection Byproducts Rule was promulgated in December 2005 and focuses on decreasing DBP concentration peaks in the transmission and distribution system.

- **Radionuclide Rule** – The Radionuclide Rule was promulgated in December 2000 to address exposure to radionuclides found in drinking water. This rule retains preexisting MCL's for combined radium-226 and radium-228, gross alpha particle radioactivity, and beta particle and photon activity. The rule establishes a MCL for uranium. The purpose of this rule is to reduce exposure to radionuclides in drinking water due to the increased risk of cancer from exposure.

- **Radon Rule** – The radon rule has not been promulgated but has been formally proposed. The proposed rule includes two options; the first establishes a MCL for radon in drinking water. The second option establishes an alternative MCL (AMCL) that is greater than the MCL in option one. The second option requires the water system to adopt a multimedia mitigation (MMM) program that focuses on reducing indoor air exposure as well as exposure from drinking water.

Chapter 4 Existing Conditions

4.1 Planning Area

The City of Gooding is located north of I-84 between the two small cities of Wendell and Fairfield. Boise is located 103 miles to the west and Twin Falls 34 miles to the southeast. The City limits incorporate 900 acres. All water supply sources are within City limits. Similarly, all of the distribution system lies within the City limits.

4.2 Demographics

The population of the City of Gooding was 3,384 in the 2000 Census and 3,567 in the 2010 Census. This resulted in a population increase of 0.54% per year. In July 2012 the total number of housing units in the City was 1,477 (Personal Communication, Morri Hall, City Clerk, July 25, 2012). The year 2010 average occupancy for this population was 2.4 individuals per unit. The 2010 median household income of Gooding is reported at $29,404, a 0.3% increase since 2000, compared to the 2010 Idaho median household income of $46,423 (USA.com, 2012).

4.3 Population

For the purpose of this study, population growth projections are calculated based on historical data trends. The growth rate from 2000 to 2010, according to actual US Census poling, shows an annual growth rate of 0.54%. For planning purposes, it is recommended that any future improvements use a slightly higher growth rate of 1.2%, especially with the recent downturn in the economy and the lack of movement in the communities of this size. Figure 4-1 describes that a growth rate of 1.2% makes a good fit with population data from the US Census Bureau.

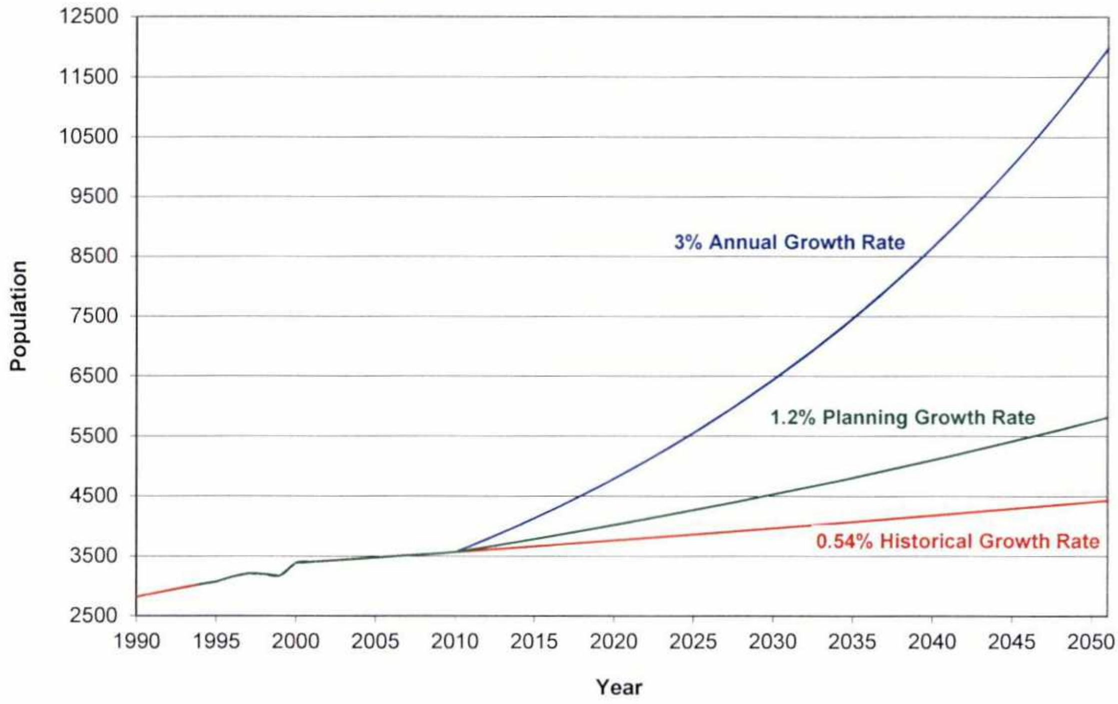

Figure 4-1 Population Growth Projections

For planning purposes, Figure 4-1 depicts a constant population growth rate at 1.2% of approximately 40 people per year. The projected growth represents a 27% increase in population over the 20 year design period. This estimated growth appears to be optimistic considering that the population has only increased by 0.53% from the period 2000 to 2010; it is nevertheless prudent to design communities for growth. The projected populations based on the planning growth rate for the years 2017, 2032 and 2052 are 3,878, 4,637, and 5,887 people, respectively.

4.4 Dwelling Units

The City of Gooding reported a total of 1,477 houses in the City. The average occupancy for this population was 2.4 individuals per unit. The population of the City is characterized by slow growth. In fact, the trend of new units built from the 30's to the present has been declining. Figure 4-2 shows the trend for new units built in the City. It is not anticipated that growth will come from increased dwelling occupancy but from new units. Figure 4-2 depicts slower growth over the years and supports the hypothesis of a constant population growth rate during the design period (Advameg, 2010).

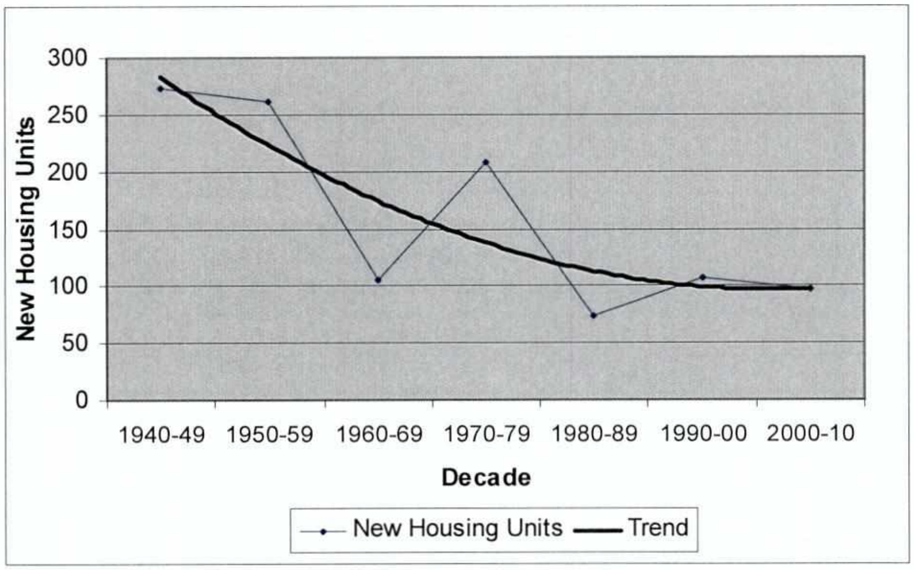

Figure 4-2 Trend for New Units Built

The City collects water fees from residents in order to finance operations pertaining to the distribution and storage of water. The number of dwelling units is important in determining the magnitude of the rate per dwelling unit. Dwelling units are categorized as residential or commercial. Both residential and commercial units are charged the same rate for water usage.

4.5 Study Area Characteristics

4.5.1 Physiography

The City of Gooding is located approximately 34 miles northwest of Twin Falls and 103 miles southeast of Boise. The City is located in the Snake River Palin in south-central Idaho near the confluent of the Big Wood and Little Wood Rivers. The City is bounded by the Big Wood River on the north and HWY 26 on the south.

Elevations in the planning area range from 3,550 feet near the Big Wood River to 3,590 near HWY 26. The terrain within the planning area generally slopes down from the south side, near HWY 26 to the north side, near the Big Wood River. Characteristic of the basalt lava flows in the area, the landscape is fairly flat with gentle slopes ranging from 0% to 8%, except for the higher slopes found on the river banks. Rocky outcrops are common; although they do not protrude significantly above ground level in the study area, they form buttes in parts of the county.

4.5.2 Climate

According to the Western Regional Climate Center, there is a weather station located in the City of Gooding. The area has a mild climate with four distinct seasons, which feature a definitive spring, summer, fall and winter. The average annual temperature is approximately 48 degrees, with an average annual precipitation of

9.33 inches and an average snowfall of 27.3 inches. The area is classified as arid and has a prevailing wind from the west to east. More detailed climatic data can be found in Table 4-1 (Western Regional Climate Center, 2006).

Table 4-1 Climatic Data for Gooding City

Month	Average Maximum Temp (°F)	Average Minimum Temp (°F)	Average Precipitation (in)	Average Total Snowfall (in)
January	33.4	15.9	1.32	10.6
February	39.5	20	0.92	5.6
March	50.8	26.7	0.86	1.8
April	62	33.6	0.81	0.8
May	71.1	40.9	0.87	0.2
June	80.1	47.6	0.62	0.0
July	90.6	54.8	0.22	0.0
August	88.5	52.2	0.22	0.0
September	77.9	43.5	0.43	0.0
October	65.1	34.7	0.71	0.0
November	48.2	25.6	1.15	2.5
December	37.1	19.3	1.2	5.7
Annual	**62.0**	**34.6**	**9.33**	**27.3**

4.5.3 Soil & Geology

Classification of soils in and around the planning area was completed by the USDA Natural Resource Conservation Service (NRCS). The soils in the planning area are generally considered to be silt-loam soil underlain by basalt bedrock. The majority of the parent soil material is wind deposited. Table 4-2 summarizes the extent of various soils in the planning area, including their classification as prime farmland (USDA Natural Resource Conservation Service, 2012).

Table 4-2 Soils in the Planning Area

Soil	Acres	Percent	Prime Farmland
Quencheroo-Loupence complex, 0-1% slopes	624.3	69.30%	If Irrigated
Wendell-Wako-Rekima complex, 1-4% slopes	132.2	14.70%	No
Ackelton-Jestrick-Rock outcrop complex, 2-12% Slopes	51.5	5.70%	No
Snowmore-Idow-Bruncan complex, 2-8% slopes	41.3	4.60%	No
Lava flows-Lithic Torriorthents complex, 2-8% slopes	27.1	3.00%	No
Power silt loam, 0-3% slopes	8.5	0.90%	If Irrigated
Harsan-Schnipper complex, 1-4% slopes	6.9	0.80%	If Irrigated
Wendell-Wako-Ackelton compalex, 2-8 % slopes	6.1	0.70%	No
Water	2.3	0.30%	No

According to the NRCS soil map (Appendix B), the soil located within the Gooding City limits is predominately *Quencherro-Loupence* complex soil. A typical profile of this soil is shown below.

Depth	**Soil Description**
0' – 5"	Silt Loam
5" – 21"	Loam
21" – 49"	Silt Loam
49" – 59"	Unweathered Bedrock

These soils can be described as sandy loam soils approximately 49 inches thick overlying basalt bedrock. The soil thickness in the study area is highly variable and in some areas the bedrock is exposed. The layer of loamy soil offers the most resistance to the transmittance of water beyond the root zone and into the water table. This layer of soil, when disturbed, can suffer increased permeability.

4.5.4 Groundwater Hydrology

The study area lies entirely on the Eastern Snake River Plain. The ground water in the study area is a part of the extensive Snake River Aquifer system. There are no known perched aquifers in the study area. The Snake River Aquifer is the sole source of drinking water for the City. The City draws its drinking water from three public water supply wells located within the municipal area (Figure 4-5). Department of Water Resources describes the aquifer in this region as "Snake River Basalt" type. The description alludes to the fact that it is thought that the water bearing geologic structure in the area is the fractured basalts that characterized the subsurface geology. The flow direction of groundwater in the study area is from East to West. The City of Gooding wastewater treatment facility is located west of the City and down gradient of the groundwater flow.

Groundwater levels are dynamic and vary with user rates, precipitation and hydro-geological variables. Table 4-3 summarizes year 2005 data from the USGS monitoring program for four wells that are in the vicinity of the study area.

Table 4-3 2005 USGS Data for Well Located Near Study Area

Well ID	Depth to Water Table (ft)	Ground Elevation (ft)	Ground Water Elevation (ft)
05S14E-25CAA1	138	3,536	3,398
05S17E-04CBC1	192	3,590	3,398
05S15E-23CBB1	139	3,616	3,477
05S15E-35DBD2	165	3,627	3,462
	Average	**3,592**	**3,434**

Table 4-3 indicates that the groundwater table is at depth of between 138 and 192 feet below ground level and also that the groundwater table is at approximately 3,434 ft above mean sea level.

Groundwater quality is important because groundwater is the sole source of drinking water for the City of Gooding. Groundwater is also used for irrigation in the area and is susceptible to pollution from agricultural activities. Groundwater nitrate concentrations average 2 mg-N/L and are considered to be elevated. The level of nitrate in the groundwater is consistent with agricultural activities but is still well below the regulated maximum concentration for drinking water of 10 mg-N/L.

The City's drinking water supply wells (Figure 4-5) are monitored for nutrients, metals, pesticides, and nitrates among other constituents. The City's water quality records for last five years have been provided in Appendix C. The City's water quality reports indicate that groundwater is of excellent quality with respect to regulated constituents such as metals, pesticides, and bacteria. Concentrations of chlorinated herbicides and bacteria have been found to be consistently non-detectable in the ground water, while concentrations of nitrates are well below the maximum regulated limit. No public complaints regarding the water quality have been received.

4.5.5 Surface & Groundwater Hydrology

The flow of surface water in the area is from east to west. Two rivers, Big Wood River and Little Wood River, flow through the planning area and ultimately unite to form the Malad River, west of the planning area. Surface water is used for irrigation through irrigation canals. Clover Creek canal carries large flows from south to north through the study area. Figure 4-5 shows the surface drainage features in the study area.

Most of the natural flow of the Little Wood River is diverted upstream of the discharge point into Clover canal, leaving a small flow in the river. It is estimated that the base flow in the Little Wood River is as little as 3 cfs.

4.5.6 Flora, Fauna, and Natural Communities

The planning area supports a variety of plant and animal life. Several species in the region have been listed as endangered, threatened, or candidates for listing. The Greater Sage Grouse (*Centocercus urophasiunus*) and the North American Wolverine (*Gulo gulo luscus*) are listed as candidates for threatened status. The Mollusks identified on the list include the Banbury Springs Lanx (*Lanx sp.*) and the Snake River Physa (*Haitia (Physa) natricinia*), both listed as endangered; and the Bliss Rapids Snail (*Talorconcha serpenticola*), listed as threatened (Appendix D) (U.S. Fish and Wildlife Service, 2012a). However, there are no endangered or threatened plant species located in the planning area.

While the majority of land in the planning area has been developed or is used for agriculture, there are some areas that contain natural vegetative communities.

4.5.7 Utility Use

The existing water system is discussed in Section 1.2 and water quality and supply are discussed in Section 5.1.3. The City of Gooding owns ground and surface water rights. The gravity irrigation system is used for flood irrigation and three ground water wells are the only sources of potable water in the community. The City uses water meters to monitor consumption of water on a per connection basis. During peak summer months households without access to flood irrigation use approximately three times more potable water than homes irrigating with surface water. In winter, when the gravity irrigation system is not in use, the average use of water between two types of households remains the same. The Walker Center, hospital and schools are the largest commercial water consumers.

The City indicated the availability of three phase power throughout the City, including the areas of approximate well site locations.

4.5.8 Floodplains

A majority of the area within the City of Gooding lies within the 100-year flood plain (Figure 4-6). The flooding source is the Little Wood River that runs through the City. There is a small section on the northeast corner and a few intermittent areas through the center of the City that are not impacted (Federal Emergency Management Agency, 2011).

There are no known wetlands within or near the identified planning area. No wetland data for the City of Gooding are available from the U.S. Fish and Wildlife Service Wetland Mapper (2012b).

4.5.9 Wild and Scenic Rivers

Two rivers, the Big Wood River and the Little Wood River, flow through the planning area. Neither of these rivers is a designated or proposed wild and scenic river (National Wild and Scenic Rivers System, 2012).

4.5.10 Public Health and Water Quality Considerations

The potable water is treated with chlorine gas prior to its entry into the distribution system. The water is tested for chlorine residual and other required parameter s is considered to be of good quality. There are no environmental conditions in the planning area that need to be addressed with regard to public health.

4.5.11 Cultural Resources

There is one building, Schubert Theatre, in the planning area that is listed on the National Register of Historic Places in Idaho. It is located at 402 Main Street (Idaho State Historical Society, 2011). This historical landmark will be minimally impacted by this study and subsequent recommendations.

4.5.12 Land Use and Development

Outside the City limits (Figure 4-3), Gooding County administers the area and all the land is privately owned. Agriculture is the predominant land use type in the area of study although residential development is growing.

Residential housing is the predominant land use within the City boundaries (Figure 4-4). According to the City Clerk, no new housing units were built in the City within the last year. Currently, two large remodels on assisted living homes are taking place. However, the remodels do not involve new construction and will not affect water usage in the City. A light industrial area to the north of the City is largely undeveloped. Industrial growth can potentially contribute significantly to the volume of potable water demand depending on the nature of the industries. There are 377 registered commercial facilities in the City of Gooding. Commercial activities are considerable along Main and Idaho streets. No significant increases in industrial or commercial activities are predicted in the City's comprehensive plan within the design period.

All of the City's water sources and storage facilities are located within City limits.

4.5.13 Air Quality and Noise

Idaho DEQ monitors air quality and publishes air quality information for areas with populations over 350,000 (Idaho Department of Environmental Quality, 2011). No air quality data are available for the City of Gooding.

Proposed project improvements are not expected to cause long-term adverse impacts on the air quality and noise level. Project construction work may have temporary effects on the air quality (dust) in localized construction areas, however, best management practices during construction can alleviate the temporary impact on the air quality and noise level.

4.5.14 Regionalization

Regionalization with neighboring communities was considered. The nearest cities, Wendell, ID, 11 miles South of Gooding and Bliss, ID, 13 miles West of Gooding are not in close enough proximity to make regionalization on this project feasible.

4.5.15 Energy Production and Consumption

The existing water distribution system utilizes electrical energy for pumping water from three wells into two storage tanks. The construction of three additional wells will increase energy consumption but is essential for addressing health and safety issues created by the existing water system.

4.5.16 Socioeconomic Profile / Population Statistics

According to 2010 Census Records, the population of the City of Gooding in 2010 was 3,567 (U.S. Census Bureau, 2010). A discussion on projected population growth is included in Section 4.3. The historical growth rate of 1.2% was used to calculate population growth projections. The population for the year 2032 was estimated to be 4,637.

Based on 2006-2010 data, the median family income in Gooding is $40,221. In comparison, the median family income in Idaho and the U.S.A. is $54,689 and $62,982, respectively. The population in poverty is about 16.7%; 13.6% and 13.8% in Idaho and the U.S.A., respectively (USA.com, 2012).

Any of the proposed alternatives discussed in Chapter 6, except for the "No Action" alternative, involves long-needed and necessary upgrades to the current system. Improvements to the existing water distribution system entail and increase in cost of potable water. This can potentially negatively impact minorities, elderly or disadvantaged members of the public. In review and consideration of all proposed alternatives, the choice was given to the least expensive alternative making impacts to the elderly and disadvantaged members of the community minimal. Construction of new ground water wells in their respective proposed locations will not adversely affect low-income or minority groups. No benefits from this project are expected to accrue in a discriminatory manner.

4.5.17 Environmental Information Document

An Environmental Information Document (EID) will be prepared in conjunction with this study. The EID will identify potential environment impacts in the planning area and address ways to mitigate potential adverse impacts. Implementation of the project improvements is not anticipated to cause any long-term negative effects on the environment. Best managements practices will be applied where necessary to ensure that environmental impacts associated with the project are minimal.

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PROJECT NO. 212004 FIGURE NO. FIG. 4-3	GOODING CITY LIMITS	WFPS	CITY OF GOODING	KELLER associates

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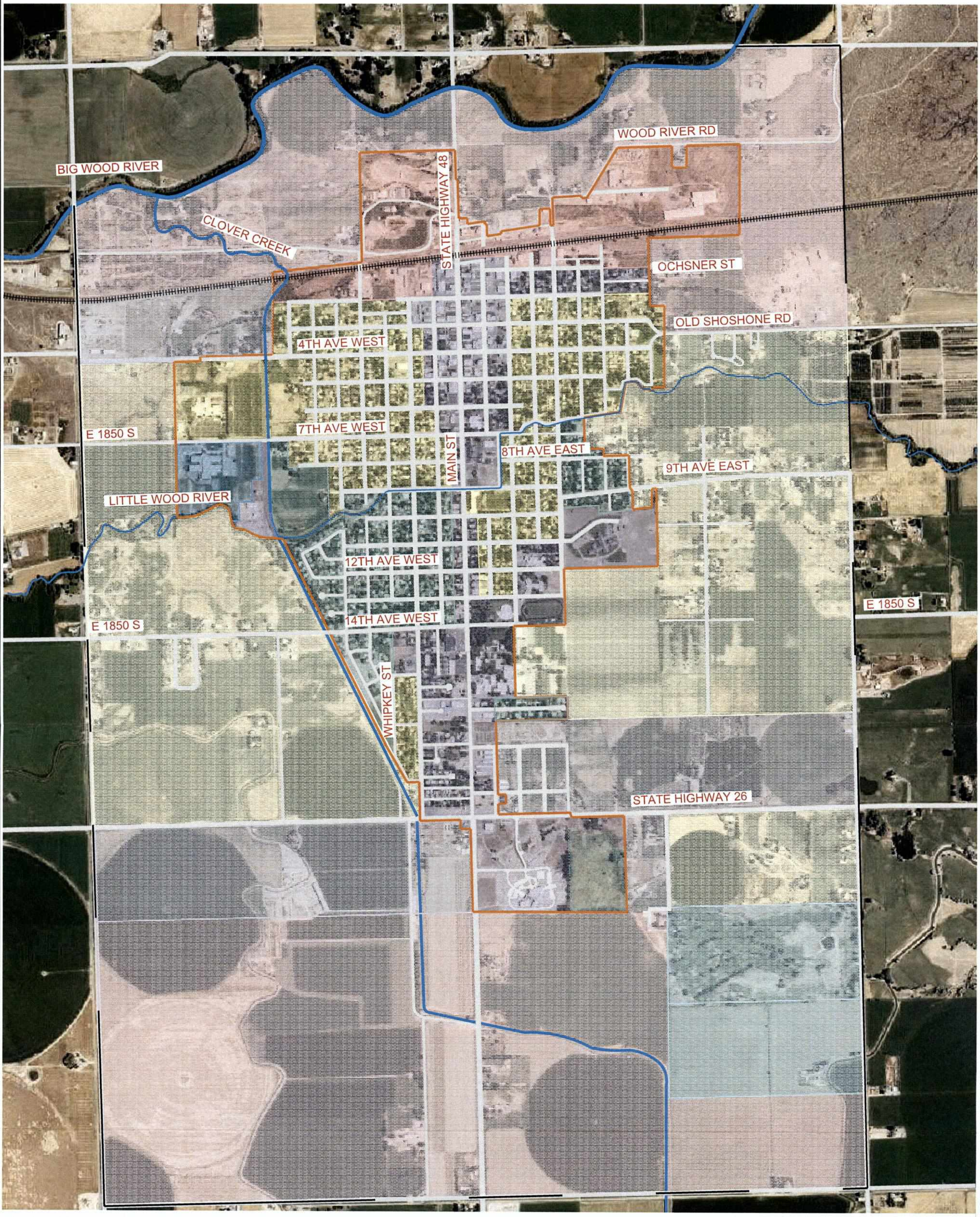
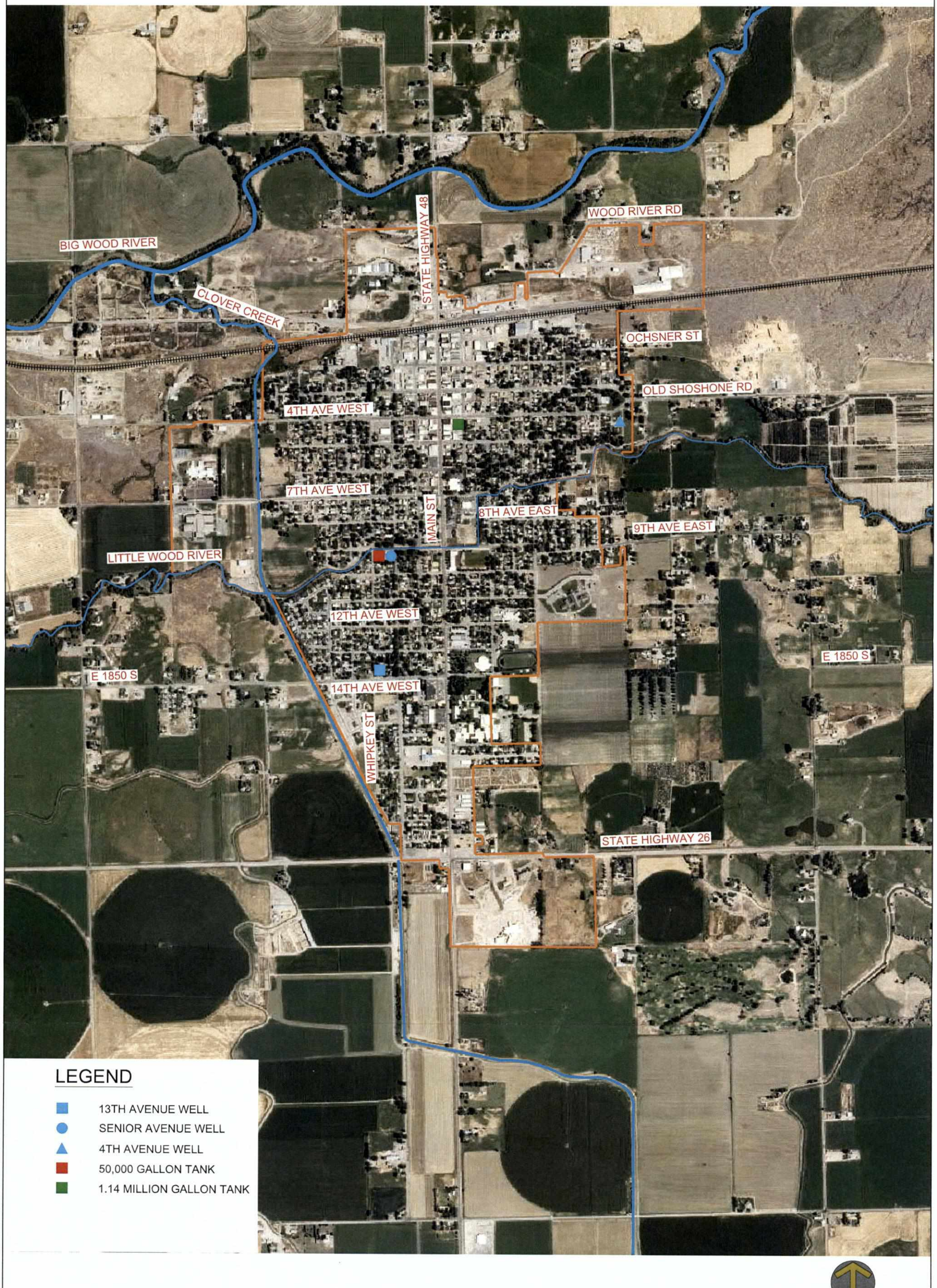


INDUSTRIAL-CITY
COMMERCIAL CITY
RESIDENTIAL SINGLE FAMILY - CITY
RESIDENTIAL DUPLEX MAXIMUM - CITY
RESIDENTIAL AGRICULTURAL - CITY
TRANSITIONAL 2 - IMPACT
COMMERCIAL - IMPACT
RESIDENTIAL - IMPACT
RESIDENTIAL IMPACT - 2
RECREATIONAL - IMPACT

PROJECT NO. 212004 FIGURE NO. FIG. 4-4	ZONING MAP	WFPS	CITY OF GOODING	KELLER associates



PROJECT NO. 212004 FIGURE NO. FIG. 4-5	LOCATIONS OF SYSTEM ASSETS	WFPS	CITY OF GOODING	KELLER associates

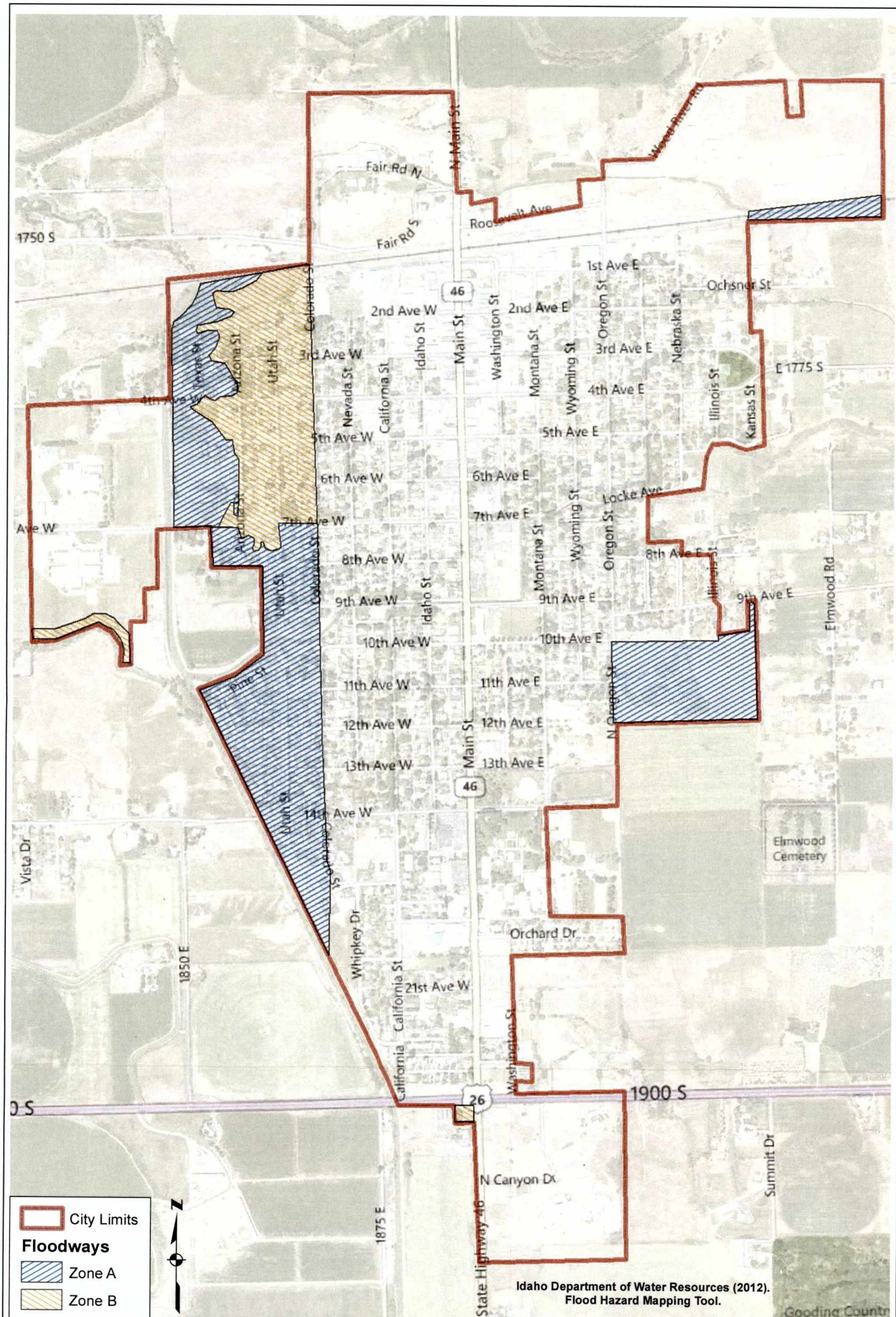


FIGURE NO.				PROJECT NO.
4-6	Gooding WFPS	City of Gooding, Idaho	KELLER associates 305 N. 3rd Avenue Pocatello, ID 83201 208.238.2146 www.kellerassociates.com	212004
	Floodplains			FILENAME Fig 4-6

Chapter 5 Existing Facility Evaluation & Future Projections

Residents of Gooding, Idaho receive domestic potable water from a community-wide water system. The distribution system is currently comprised of approximately 42.5 miles of pipe. Four-, eight- and twelve-inch pipes of miscellaneous materials make up a large portion of the distribution system but six and ten inch diameters are also present. The water supply comes from three groundwater wells that are located within the City. There are two storage reservoirs located within City limits with a total storage capacity of 1.19 MG.

5.1.1 User Rates

There are 1,378 residential connections and 231 commercial connections within City limits (Personal Communication, Morri Hall, City Clerk, August 1, 2012). Every connection pays the same base rate of $7.80 per month for up to 1,200 gallons. For 1,200 gallons to 1,300 gallons the user pays an additional $0.80. For each additional 100 gallons, beyond the first 1,300 gallons, the user pays $0.10. Users that use above 75,000 gallons pay an additional $0.25 per thousand gallons (Figure 5-1). The water system and wastewater collection system are both owned and operated by the City. The City also owns and operates a gravity irrigation system that is in poor operating condition.

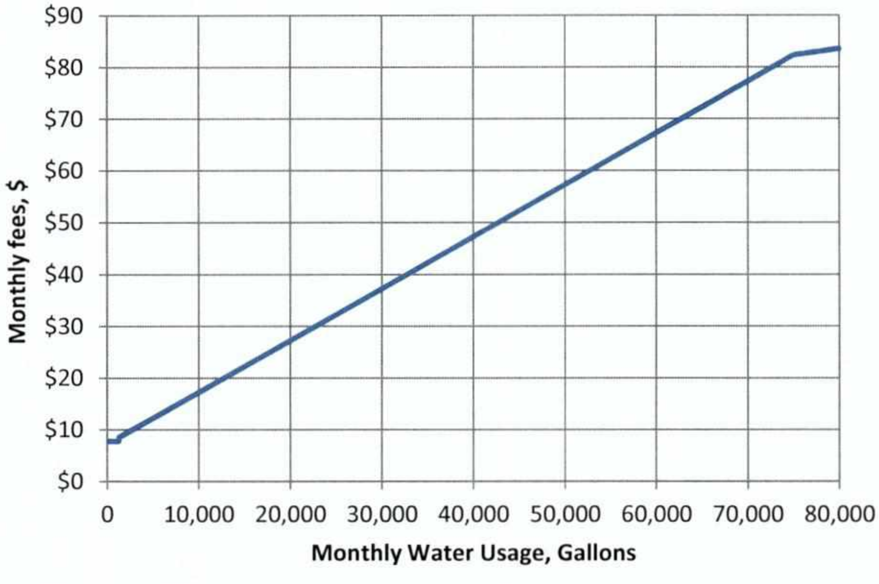


Figure 5-1 Potable Water Billing vs. Usage

5.1.2 Water Rights

Ground water rights for municipal use held by the City of Gooding are summarized in Table 5-1. Appendix E contains more information regarding these water rights. The City owns water right No. 37-11221 with 5.9 cfs or 2,648 gpm and water right No. 37-4080 with 2.8 cfs or 1,257 gpm. However these two water rights are limited to a total combined diversion rate of 7.05 cfs or 3,164 gpm. The City also owns water rights for irrigation and domestic waters.

Table 5-1 Ground Water Rights

Water Right	Type	Priority	Rate	
			(cfs)	(gpm)
37-4080	Decreed	9/28/1928	2.8	1,257
37-11221	Decreed	4/20/1977	5.9	2,648
		Current Total	8.7	3,905
		Allowed Total	**7.05**	**3,164**

5.1.3 Water Quality & Supply

Capacity of a water supply is a function of the characteristics of the available water source and the water rights held by the water user. Water withdrawal from the source is governed by the quantity of available water or the limits placed upon the user by the associated water right. Under Idaho Water Law, a water right must be put to beneficial use. If the water is not put to beneficial use, part or all of the right can be lost.

The City of Gooding's domestic water supply comes from three groundwater wells located within the City. The ground water is disinfected with chlorine gas before water enters the storage tanks. The chlorine gas system consists of 150-pound chlorine cylinders and Regal gas chlorinators. The City tests for chlorine residual on a weekly basis.

Chlorine disinfectant contact time (T) for the City of Gooding was evaluated using the EPA CT Calculator (available from www.epa.gov). The contact time is "the time that the disinfectant is in contact with the water at peak hourly flow." "T is measured from the point of disinfectant injection to the point where the residual is measured before the first customer" (U.S. EPA, 2003).

The calculations were performed based on several parameters, specifically, the number of disinfection facilities of a ground water source, the number of sample sites for each ground water source, and the volume of the system. The volume was calculated based on the diameter and length of pipe after disinfection but before the first customer. Other parameters used for disinfectant contact time calculations were baffling factor, disinfectant type, residual chlorine concentration, pH, temperature, and peak hour flow rate. Disinfectant contact time for the potable water distribution system in Gooding was estimated to equal 18.3 minutes and 400.0 minutes for the 50,000-gallon and 1.14 MG storage reservoirs, respectively. This contact time is sufficient to provide a 4-log inactivation of viruses, as required by the Ground Water Rule. The EPA CT Calculator output is available in Appendix F.

Figure 4-5 shows the location of the water system assets including the locations of three groundwater wells. Generally, the wells produce good quality water. In the last 5 years of reporting data there has only been one positive sample for coliform (Appendix C). Their non-coliform sample summaries are below the MCL as well (Idaho Department of Environmental Quality, 2011a). Land uses around the groundwater wells consist of residential, commercial, industrial, and agricultural properties.

The 4th Avenue well is located in close proximity to the City's primary 1.14 MG water storage reservoir. Water from this well is treated before it enters the reservoir. From the well log (Appendix G), 4th Avenue well was developed in 1996 with a completed depth of 428 ft below ground surface (bgs); the static water level was 154 ft bgs. The well is cased with 14-inch diameter, 0.38 gauge steel casing.

The Senior Avenue well is located alongside of Senior Avenue, next to the 50,000-gallon tank. Water from this well is disinfected before it enters the storage tank.

13th Avenue well is located just off of the intersection of 13th Avenue W. and Nevada Street. This well pumps directly into the distribution system and runs only when additional flows are required. There is no well log available for this well. The well capacity is detailed in Table 5-2.

Nitrate concentrations from water samples taken from the ground water sources range from 1.65 to 2.07 mg/L which is below the MCL for Nitrate. Arsenic concentrations have been below the MCL for Arsenic at 10 μg/L.

Table 5-2 Current Supply & Pumping Capacity

Well	Capacity (gpm)	Pressure Head (ft)
4th Avenue Main Booster	925	207
Senior Avenue Booster	1,518	56
13th Avenue Well Pump	1,100	132
Total Well Pumping Capacity	**3,543**	N/A
Firm Pumping Capacity	**2,025**	N/A

5.1.4 Water Storage

A 1.14 MG elevated welded steel storage reservoir (Figure 4-5) is located on the northern end of town on the corner of 4th Avenue E and Washington Street. The reservoir is filled with water from 4th Avenue Well. A booster pump station comprised of 3 pumps with a total capacity of 4,500 gpm feeds water from the storage reservoir into the distribution system (Table 5-3). Pump curves for these pumps are included in Appendix A. The tank elevation is 3,584 feet above sea level.

The City also has a 50,000-gallon reservoir (Figure 4-5) that feeds the City through a 1,100 gpm booster pump station (Table 5-3) is located at the corner of Senior

Avenue and Nevada Street. The reservoir is filled directly from the Senior Avenue Well. The elevation at the tank's base is 3,571 feet above sea level. The well located at 13th Avenue feeds water directly into the system.

Table 5-3 Booster Pump Capacity

Booster Pump	Capacity (gpm)
4th Avenue Booster	3,000
4th Avenue Booster	1,000
4th Avenue Booster	500
Senior Avenue Booster	1,100
13th Avenue Well Pump	1,100
Total Booster Pumping Capacity	**6,700**

Both of the City's water storage reservoirs are mixed by only hydraulic means. Water quality in the storage reservoir is related to water age, which refers to the length of time (age) that water is stored before it is used. Water age is a result of no or insufficient mixing in a storage reservoir. Thermal stratification and stagnate zones develop in poorly mixed tanks. As a result, water is unable to flow and circulate within these zones adequately, allowing water age to increase and water quality to degrade, leading to potentially unsafe water in stagnate zones. These stagnate waters could enter the distribution system during a fire event, due to increased system demand, or during an emergency when water sources must be taken offline. Tank mixing can be used to mitigate stagnant water and thermal stratification problems through controlling inflow/outflow to encourage water movement within the tank. This can be achieved through water jets or properly designed inlet and outlet manifolds. Water quality due to prolonged water age in the storage reservoirs of the City has not been reported to be a concern.

The overall storage for a system is comprised of four major components, dead storage, peaking storage, emergency storage, and fire suppression storage. The dead storage is the volume within the storage system that is unusable due to elevation or pump suction requirements. The peaking storage (also known as equalization storage) is the portion of the storage capacity that is required to meet the peak demand of the system, typically peak hour. The emergency storage is the volume that is selected to supply the community with water in case of an emergency, such as power loss or pump failure. Another component of the storage equation is the fire demand storage. This volume is the amount of water required to meet the determined maximum fire demand. When considering storage requirements, the redundant supply volume can be deducted from the total storage required to meet the peak demand. The conservative method is to calculate the required volume of storage assuming the largest supply source is removed from service.

Dead Storage
As stated by the City of Gooding, the dead storage of the existing water storage tanks is 42,276 gallons.

Equalization Storage
According to IDAPA 58.01.08 Section 003.16.d, "Equalization storage is the storage of finished water in sufficient quantity to compensate for the difference between a water system's maximum pumping capacity and the peak hour demand (PHD)." At present, with the irrigation system in place and the total pumping capacity of 3,543 gpm and the PHD of 2,850 gpm, the City's equalization storage requirement is satisfied. In accordance with the selected alternative, elimination of the irrigation system and construction of three new wells will increase the total pumping capacity to 8,097 gpm and the PHD to 6,419 gpm, respectively. In this future scenario, where the system's maximum pumping capacity is greater than the peak hour demand, the system's equalization storage will be satisfied and no additional storage is required.

Emergency Storage
Emergency storage is storage of water that "provides a measure of reliability or safety factor should sources fail or when unusual conditions impose higher than anticipated demands" (IDAPA 58.01.08.003.16). The City requested emergency storage capacity sufficient to meet the MDD for a 24-hour emergency event. The new water distribution system is designed to satisfy the City's request without increasing existing water storage capacity (Table 5-4).

Fire Suppression Storage
The fire suppression storage for the system is based on the largest fire flow demand in the system. According to Fire Chief of Gooding, the largest fire flow requirement is 5,000 gpm (Appendix A). IDAPA 58.01.08, Section 501.18a requires that systems providing fire flow demand (FFD) to a public water system meet Redundant Fire Flow Capacity which must provide maximum day demand (MDD) plus fire flow with any pump out of service. Generally, the conservative approach is to eliminate the largest pump. Gooding's fire storage need is represented by the difference between the total well pumping capacity and the largest pump (1,518 gpm), MDD, and highest fire demand (5,000 gpm). The volume of fire storage is calculated based on a 4-hour fire flow duration requirement.

+3,543 gpm (total pumping capacity)
-1,518 gpm (largest pump)
-1,900 gpm (MDD)
-5,000 gpm (fire flow requirement)

-4,875 gpm, or -1,170,000 gallons for a 4-hour event

As shown above, with the existing total well capacity of 3,543 gpm, required fire suppression storage is 1,170,000 gallons. Construction of three new wells will increase the new total pumping capacity to 8,097 gpm. This will decrease the volume of required fire suppression storage from 1,170,000 to 648,000 gallons meeting the existing storage capacity.

+8,097 gpm (total pumping capacity)
-1,518 gpm (largest pump)
-4,279 gpm (MDD)
-5,000 gpm (fire flow requirement)

-2,700 gpm, or -648,000 gallons for a 4-hour event

Present and future storage needs of the City of Gooding are summarized in Table 5-4.

Table 5-4 Storage Needs

Existing Storage (gal)		
Above ground glass lined reservoir	1,140,000	1,140,000
Above ground steel reservoir	50,000	50,000
Total	1,190,000	1,190,000
Effective Total Storage	1,190,000	1,190,000
Required Storage (gal)	**Current**	**Future Need**
Dead Storage	42,276	42,276
Equalization/Peaking Storage	0	0
Standby/Emergency Storage	0	0
Fire Suppression Storage	1,170,000	648,000
Total Storage Needs	1,212,276	690,276
Additional Storage Needs	*22,276*	*0*

Note: The following values were used in above calculations:
MDD Current =1,900 gpm, MDD future=4,279 gpm
PHD current=2,850 gpm, PHD future=6,419 gpm
Current redundant well capacity=2,025 gpm, Future redundant well capacity=6,579 gpm
*based on 1.2% projected population growth

Total present and future storage needs, as shown in Table 5-4, are a summation of dead storage and fire suppression storage. Although the existing storage is insufficient for the City's needs, construction of three new ground water wells will supply additional pumping capacity making the current total pumping capacity of 3,543 gpm increase by 4,554 gpm for the new total pumping capacity of 8,097 gpm. Combined with the flow provided by the booster pumps (Table 5-3), the additional pumping capacity will be sufficient to meet water storage needs of the City.

In summary, considering results of the current and potential storage needs, existing reservoirs and ground water wells, combined with three new wells, will provide sufficient storage for City's needs and it is unnecessary to provide additional storage reservoirs.

5.1.5 Distribution System

The potable water distribution system in the City of Gooding consists of one pressure zone. The City operates two booster pump stations, one located adjacent to each storage reservoir. The 13th Avenue well pumps directly into the system.

The water pressure throughout the system is controlled by the pumps delivering water into the system. Figure 4-5 shows the locations of the City's groundwater wells and reservoirs.

Table 5-5 summarizes the size and estimated lengths of pipe in the Gooding distribution system and Figure 5-2 shows the City's water system. The table does not classify pipe sizes by material because this information is not entirely known.

Table 5-5 Summary of the Distribution Piping

Pipe Diameter (in)	Length (ft)	Length (mile)	Available Pipe Size Percentage
4	67,412	12.8	30%
6	24,546	4.7	11%
8	61,131	11.6	27%
10	14,359	2.7	6%
12	56,730	10.7	25%
Total	**224,178**	**42.5**	**100%**

5.1.6 Operations

City government within Gooding consists of an elected mayor and four council members. Based on Idaho Distribution System Classification, City of Gooding Public Drinking Water System (PWS No. ID5240009) is a Class II system (Appendix H). The City currently employs Todd Bunn as the Public Works Director. He serves as the Responsible in Charge (RIC) and has a Drinking Water Distribution Operator – Class II and Wastewater Treatment Operator – Class I and II licenses. Scott Carrico and Noel Edwards are the substitute RIC. Both have their Drinking Water Distribution Operator – Class II licenses.

All pumps in the water system are operated based upon the water levels in the storage reservoirs. The City is on one pressure zone making operations simplified when transitioning between winter and summer demands. Given the minimal elevation change in and around the City of Gooding, a future pressure zone (higher or lower) is not anticipated in the next 20 years.

Idaho Rules for Public Drinking Water Systems require backflow preventers on all connections that carry the risk of contaminating the water system[5]. The City of Gooding cross-connection control program (Appendix I) is implemented by the Water Department foreman certified in backflow prevention. According to the City's Public Works Director, some of the foreman's responsibilities include the following (Personal Communication, Todd Bunn, Public Works Director, November 13, 2012):

1. Identify potential cross connections and implement requirements for backflow devices;
2. Monitor installation and testing of new backflow devices;
3. Insure no water service to be turned on before required backflow devices are properly installed;
4. Keep a file containing list of backflow devices and annual test results;
5. Review annual test of each device on file;
6. Insure replacement of any device failing to operate properly;
7. Insure all new residential connections have backflow device installed at meter;
8. Initiate termination of any connection that fails to meet the requirements of the backflow ordinance or state requirements.

The City attempts to follow an established maintenance program. Identified during the calibration of the water model, several valves were closed that were thought to have been open. Therefore, it is recommended that the City establish a valve-check routine on a two year rotation to identify closed, paved-over, or broken valves in the system.

[5] IDAPA 58.01.08 – Idaho Rules for Public Drinking Water Systems, §550.03

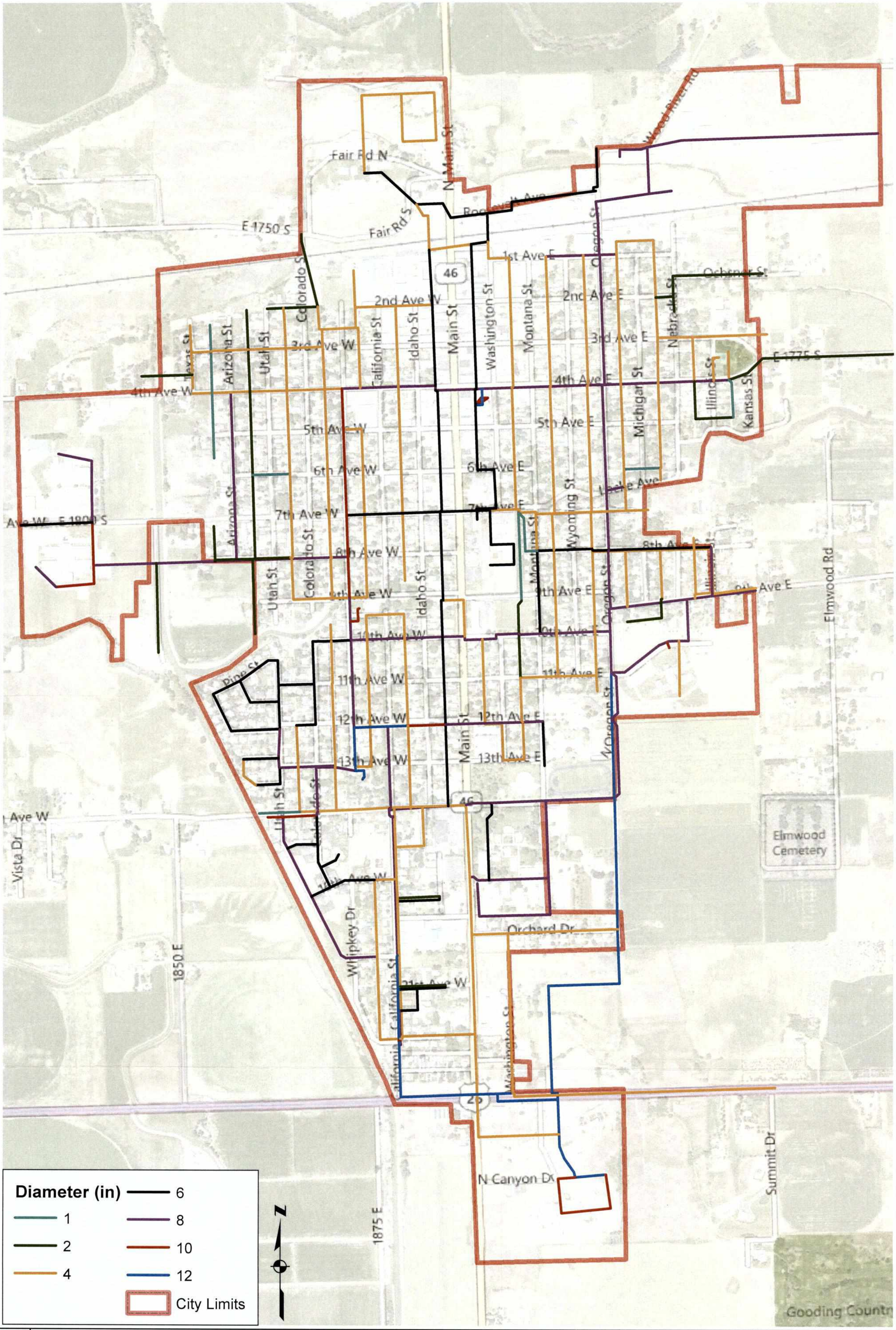


FIGURE NO.				
5-2	Gooding WFPS	City of Gooding, Idaho	KELLER associates 305 N. 3rd Avenue Pocatello, ID 83201 208.238.2146 www.kellerassociates.com	PROJECT NO. 212004
	Gooding Water Distribution System			FILENAME Fig 5-2

5.2 Hydraulic Evaluation

Water demand varies by season, day, and time of day, with the greatest water consumption during the summer months, generally in the morning and evening hours, and the lowest consumption occurring in the winter. Demand scenarios must be established to accurately estimate water system demands. Peak hour demand (PHD) is the greatest demand on the water system in a single hour during a year and is used for evaluating operating pressures in the existing system. Similarly, fire flow demands, maximum day demand (MDD) and average day demand (ADD) must be considered in water system evaluation. In this study, the ADD and MDD were calculated from 2007 summer well data. The PHD is generally assumed to be 1.5 times greater than the MDD.

5.2.1 Water Demand

In Gooding, water demand can be divided into two categories, winter demand and summer demand. Summer demand can be further broken down into two subcategories, homes irrigating with potable water and homes irrigating primarily with irrigation water. Winter demand is generally a function of indoor uses. Summer demand is the winter demand plus irrigation demands.

Figure 5-3 presents data collected in 2007-2008 from 24 individual homes, 12 homes with access to surface water irrigation and 12 homes that irrigate with potable water. During the summer months, there is a significant difference between those homes requiring potable water support for irrigation and those that do not. Well data collected in the summer of 2007 are presented in Figure 5-4 and were used to calculate the overall system's seasonal demand statistics (Table 5-6).

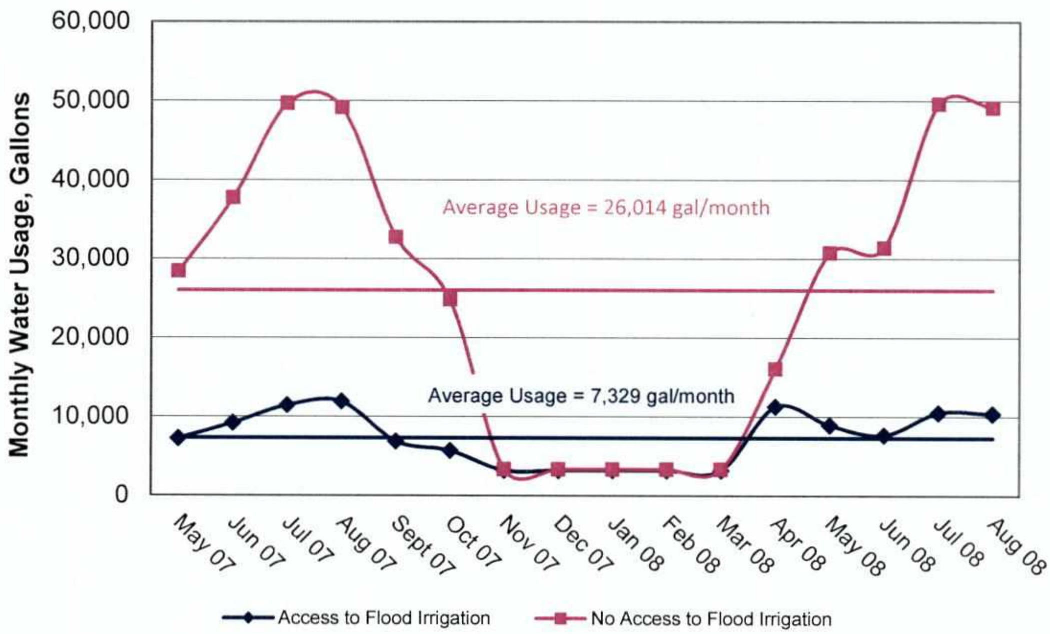


Figure 5-3 Water Usage in 2007 - 2008

Figure 5-4 depicts well data collected in the summer of 2007. These well data were used to calculate the system's ADD and MDD, as presented in Table 5-6.

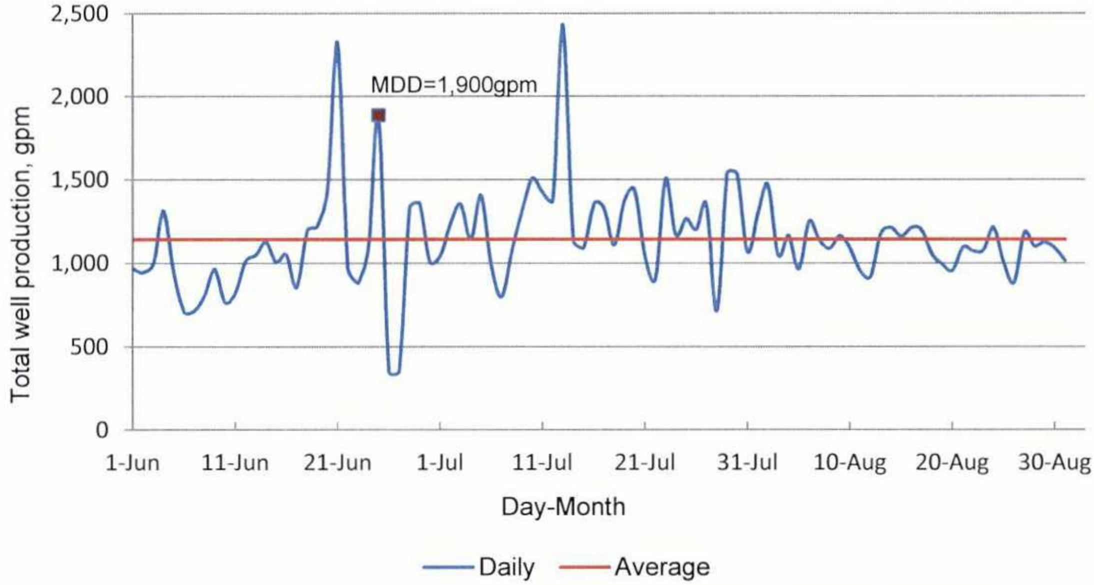


Figure 5-4 Daily Well Production for Summer 2007

The MDD of 1,900 gpm was calculated based on two-day averages to reduce the possible effects of two uncommonly high well production data points. A peak hour factor of 1.5 times greater than the MDD was used to calculate the PHD. PHD is a theoretical number that accounts for the occasion when all system demands are at their maximum hourly average. The sources provide for only a portion of peak hour demand, and the rest is provided by the system's equalization storage capacity.

Table 5-6 Potable Water Demands from 2007 Summer Well Data

	ADD (gpm)	MDD (gpm)	PHD (gpm)
Combined Well Data	1,140	1,900	2,850

Note: ADD and MDD estimated from empirical data, PHD is MDD multiplied by 1.5

The City's gravity irrigation system will be abandoned as part of the selected alternative creating a new potable water demand currently supplied by the irrigation system. Residents who have access to surface water will start using potable water for irrigation purposes. Consistent with the information presented above and population growth projections, anticipated water demands were determined. A detailed description of these demands is outlined in Chapter 6.

The firm capacity of the existing wells (2,035 gpm) will be supplemented by construction of additional ground water wells to ensure the projected MDD is satisfied. Section 5.3 describes the surface water system in further detail.

5.2.2 Hydraulic Modal Creation

A hydraulic model of Gooding's water system has been created for the purpose of evaluating the system pressures under various demand scenarios. Bentley's WaterCAD V8i water modeling program was used to model the system. The model was created using the best available data sources on the system including recording drawings, operator knowledge, and field investigations.

Several days of field testing provided the calibration data necessary to match model conditions to observed conditions as well as identify anomalies in the system such as closed valves. The calibrated model now predicts system pressures under various scenarios within 3 psi.

Tables detailing model inputs along with a corresponding model map can be found in Appendix J of this report.

5.2.3 Peak Hour System Pressures

Under a peak hour demand scenario, the model results show that system pressures currently drop far below the IDAPA standard of 40 psi throughout the system. As system demands increase from more potable irrigation, these pressure are predicted to drop to zero in some areas. Detailed model results are presented in Appendix J.

5.2.4 Maximum Day Demand plus Fire Flow Conditions

Gooding has approximately 142 fire hydrants connected to the municipal water system. According to the Idaho Rules for Public Drinking Water Systems (IDAPA 58.01.08, §542.06), fire hydrants must be connected to water mains no smaller than six inches in diameter.

The model was used to evaluate the available fire flow under existing maximum day demands with the largest pump (4th Avenue 3,000 gpm booster) offline. Results from this analysis showed that the majority of the existing system cannot provide fire flow and maintain pressures above 20 psi. These deficiencies only increase as demands on the system increase. Results from this analysis can be found in Appendix J.

5.2.5 Modeled Improvements

With adequate supply to meet existing and future needs, distribution system improvements were modeled to improve the system's capacity to deliver the required flows and pressures. Hydraulic restrictions were identified by tracing hydraulic losses through each line in the system. Key bottlenecks were eliminated by upsizing distribution mains as shown in Figure 7-2, and Figure 7-3. Once the hydraulic restrictions are eliminated, the system will be able to deliver peak hour demands and maintain pressures above 63 psi. Maximum day demands plus fire flow can be delivered throughout the system while maintaining pressures above 20 psi and leaving the largest pump offline. A 300-ft maximum service radius was assumed for the fire flow coverage evaluation.

Waterlines that supply individual businesses and homes are not considered in the fire flow evaluation because these lines only provide domestic use and do not have hydrants.

Additional detail regarding the recommended improvements can be found in Chapter 6. Detailed model results showing the improved fire flow and system pressures can be found in Appendix J.

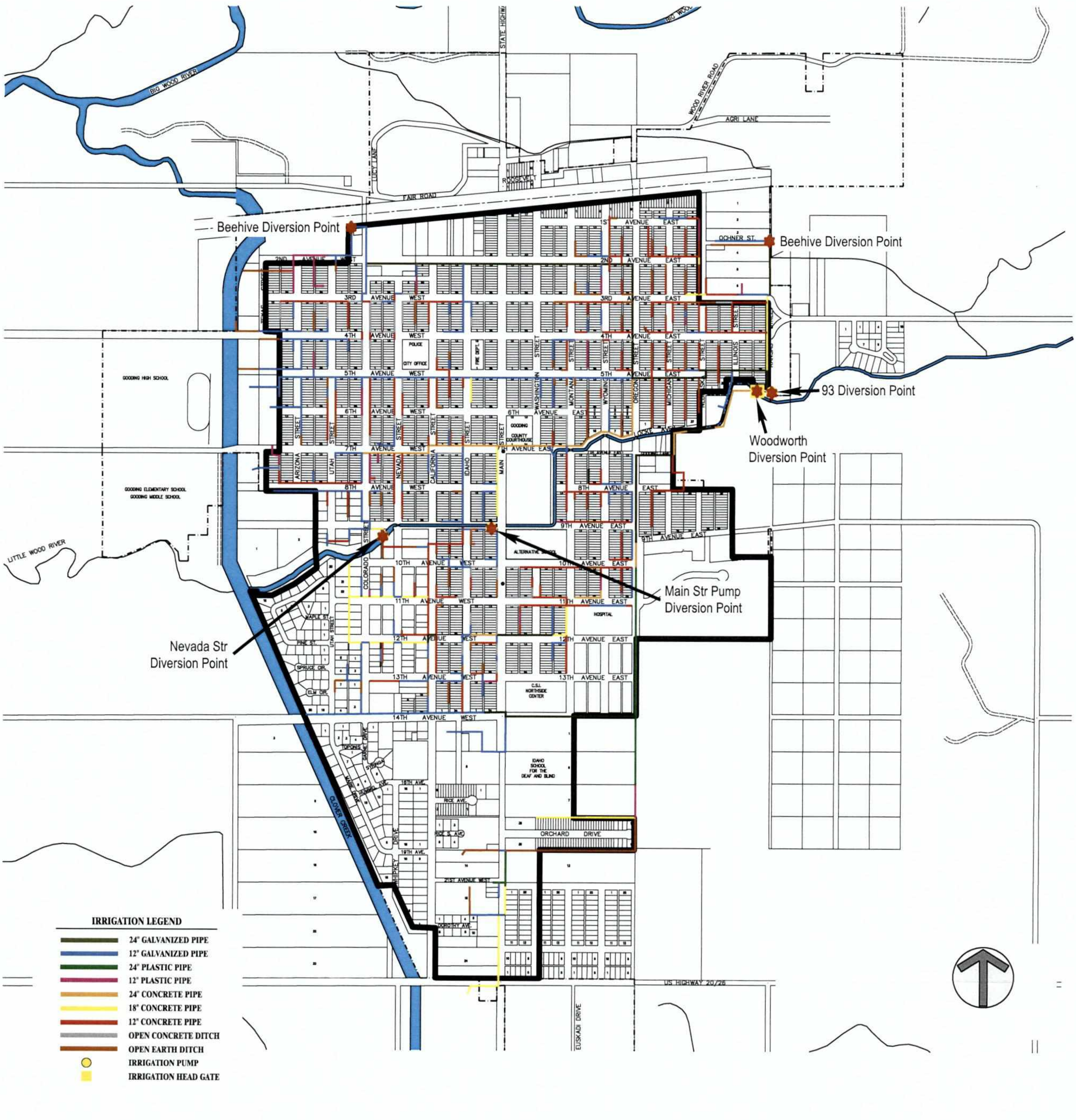
5.3 Surface Water Irrigation System

The City operates, along with their pressurized groundwater potable water system, a gravity surface water irrigation system (Figure 5-6). The surface water system provides irrigation water to residents and parks throughout a majority of the City through gravity pipes and open ditches that are fed by the Little Wood River as shown in Figure 5-5. The City is able to divert 9 cfs of water (Table 5-7) from the Little Wood River from six different diversion points as shown in Figure 5-7.

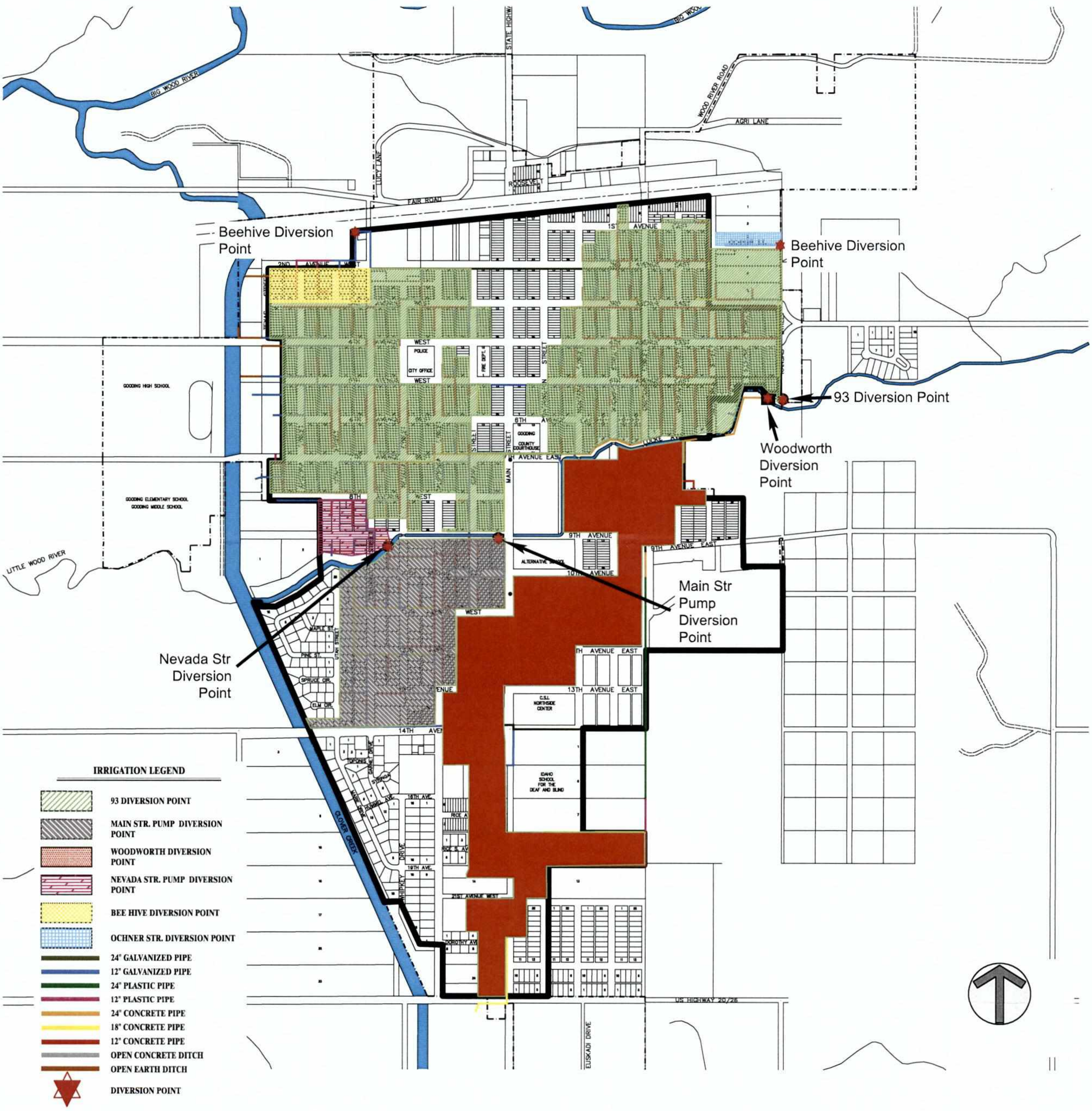
Table 5-7 Surface Water Rights

	No. of Shares	cfs	gpm	gpd
Shares	143.48	1.8	805	1,160,000
Decree		7.2	3,234	4,660,000
Total		9.0	4,039	5,820,000

Figure 5-5 City Irrigation Diversion Point



PROJECT NO. 212004	IRRIGATION SYSTEM	WFPS	CITY OF GOODING	KELLER associates
FIGURE NO. FIG. 5-6				



PROJECT NO. 212004 FIGURE NO. FIG. 5-7	IRRIGATION ZONES	WFPS	CITY OF GOODING	KELLER associates

5.3.1 Present Usage

The gravity irrigation system comprises over 21 miles (approximately 110,000 ft) of pipes and ditches (Table 5-8). The old and outdated system has become increasingly complex and difficult to manage. The construction of the system started in the 1920's and expanded with growth of the City. This has led to many undersized pipes and irregular configurations. The majority of the City uses the surface water 30 minutes at a time, five (5) months of the year (May through September). The City Water and Irrigation Budget provided by the City is presented in Appendix K.

System maintenance is complicated by the fact that the effectiveness of repairs cannot be evaluated when the system is dry (off season). It is also not possible to by-pass a section of the system in order to make any repairs. In many cases a large section of the system must be shut down for several days to make one repair.

Figure 5-8 summarizes the average water costs for 12 residential customers without access to the gravity irrigation system and 12 residential customers who have access to the irrigation system. There is a dramatic difference between the usage patterns of the two user types. Comparison of the potable water system with the surface water system is also presented in Section 5.2.1.

Figure 5-8 Average Water Cost Comparison

Table 5-8 Irrigation Piping Inventory

Conduit	Material	Diameter (in)	Length (ft)
Pipe	Concrete	12	31,328
Pipe	Concrete	18	4,786
Pipe	Concrete	24	5,368
Pipe	Galvanized Iron	12	32,568
Pipe	Galvanized Iron	24	10,150
Pipe	PVC	24	2,658
Ditch	Concrete		9,708
Ditch	Earthen		13,287
		Total	**109,851**

The City reported that it takes five (5) seasonal workers to run irrigation routes for five (5) months. Additionally, six (6) workers from various departments are frequently utilized for repairs and maintenance (Personal Communication, Todd Bunn, Public Works Director, August 13, 2012). The City also reported that operation of the gravity irrigation system takes between 12-17 hours per day, six days per week. Because this position requires a lot of part time help, the City finds it difficult to hire qualified and dependable staff to operate the system effectively.

5.3.2 System Limitations

The irrigation system limitations can be summarized as follows:

1. Operational Limitations
   a. Finite water resources
   b. Excessive logistical requirements
   c. The system is difficult to repair
2. System Architectural Limitations
   a. The system was not designed for optimizations
   b. The system configuration is limited by the gradient of the ground
   c. Re-routing of conduits is practically impossible without pumping

Other limitations of the irrigation system that are making it increasingly expensive and difficult to operate and maintain the system are:

1. To maintain a gravity irrigation system, each system user must maintain their lots to provide the correct grading to allow water to reach all areas. Throughout the years additional soils have been imported making gravity irrigation a limited use option to maintain a complete healthy landscape. Therefore many users must implement supplemental irrigation through the potable water system.
2. Proper use and maintenance of each user's individual portion of the gravity system are not being practiced. This is due to lack of knowledge, time and effort of each individual user. This lack of maintenance is being passed on to the ditch riders of the system (Figure 5-9, Figure 5-10).
3. Because the position of a ditch rider is a part-time position, the trained and dependable staff finds it hard to keep good people trained. To properly train

an individual takes approximately 4 weeks. The City experiences significant shortfalls in other areas City Departments because their staff has found that to keep the irrigation system operable is increasingly time consuming and thereby expensive.

Figure 5-9 Irrigation System Degraded Piping

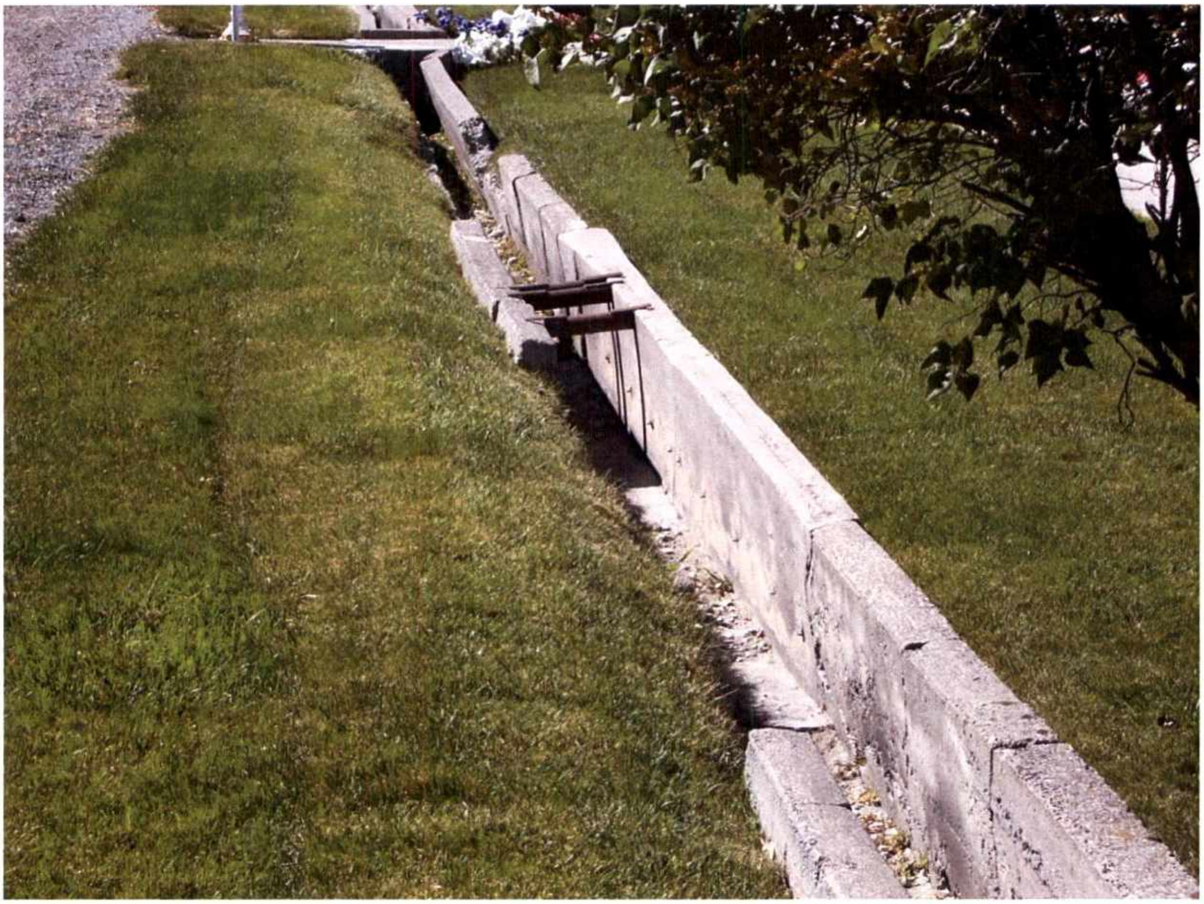


Figure 5-10 Irrigation System Gravity Ditches

5.4 Summary of Current Issues

The review provided by Keller Associates, Inc. and the Sanitary Survey performed by DEQ in 2010 (Appendix L) allow to conclude that the City's system is in overall good operating condition and is up-to-date on current IRPDWS and SDWA rules and regulations. Issues and advised remedial actions are summarized below:

- Fire flow test results indicate that sections of the City are unable to meet fire flow requirements (IDAPA 58.01.08, §552.01).
- It is recommended that the City replace water distribution lines less than 6 inches in diameter.
- It is recommended that the City establish a valve-check routine on a two year rotation to identify closed, paved-over, or broken valves in the system.
- It is recommended that the City consider updating or abandoning their gravity irrigation system.

Chapter 6 Evaluation of Improvements

The City of Gooding is in need of several upgrades to their water system. Upgrades will improve the operation of the system, increase reliability, protect water quality, reach compliance with all State and Federal standards, and meet the future demands of the end user. In order to do this, a thorough discussion of system improvements, estimated costs including available grant monies, timelines, and evaluation of all upgrades is required. Improvements will address excessive water use, system losses and inefficiencies, compliance with State and Federal standards, efficient system operation, and recommendations to improve the health and safety of the water system.

6.1 General Discussion

Several alternatives, as possible solutions to the system's deficiencies, were evaluated. Isolated areas of Gooding were considered in identifying alternatives in the project area. There are no isolated areas around the community that would require special consideration. A summary of each alternative and anticipated costs are presented in this section. Compliance with the Davis-Bacon Act was insured by incorporating Davis Bacon wages in all cost estimates presented in this study. In order to address the limitations of the irrigation system, costs will be incurred. These costs will be recovered by increasing user charges. It is important to consider that the cost of not taking action will also be borne by users. The alternatives that have been evaluated include Alternatives 1 through 3c, where alternatives 3a through 3c are to be considered with abandoning the existing irrigation system.

Alternative	Description
No Action	No action
1	Maintain Existing Gravity Irrigation System
2	Install Pressurized Irrigation System
3a	Augment Potable Water System by Drilling Three Additional Wells
3b	Augment Potable Water System by Constructing Potable Water Treatment Plant to treat surface water rights
3c	Augment Potable Water System by Constructing Potable Water Treatment Plant to treat surface water and by Drilling Additional Well

6.2 No Action Alternative

The No Action alternative entails no improvements to the existing water distribution system of Gooding. This alternative will not address any of the deficiencies of the current system discussed in previous sections. The gravity irrigation system will continue to deteriorate and the pressurized ground water distribution system is in need of updates to meet increasing demands. Based on the information presented above, the system is in urgent need of action. Because the No Action alternative does not address public health and safety concerns and does not promote the City's compliance with DEQ regulations, the City did not take this alternative into consideration.

6.3 Alternative 1: Maintain Existing Gravity Irrigation System

This alternative considers maintaining the existing irrigation system as it currently stands. The City would repair and upgrade those areas that are failing and provide the necessary staffing levels to ensure that the irrigation system provides a reliable and acceptable level of service. The City would have to pass the system repair, operation, and maintenance costs to the users in order to ensure sustainability of the system. A review of water irrigation rates is necessary for this alternative.

The advantages of this alternative are that the City will not require as large a capital expenditure as other alternatives.

The disadvantages of this alternative are that the City will spend a substantial amount of money periodically for maintenance. The City will most likely need to increase budget to pay for irrigators and ditch riders in order to retain their services. User rates for irrigation water will certainly increase substantially for users under this alternative.

Potable water demand for each type of user was calculated based on water billing data received from the City. According to the data, during peak summer months, potable water irrigators (PWI) use 3.2 times more water than surface water irrigators (SWI). And people who irrigate with both systems (gravity irrigation system and potable water distribution system) use twice as much water as those who irrigate with potable water only. Based on the average occupancy of each house (2.4 people per house), the MDD of 1,900 gpm, the value determined from summer well data, and the fact that potable water is used by each type of water consumer, potable water demand of 0.94 gpcm was calculated. There is no historical data in the City of Gooding where the entire system uses potable water for household and irrigation needs. This explains the need of 25% safety factor for determination of the final value of potable water demand in gallon per capita per minute (gpcm). This value is equal to 1.2 gpcm and is used in this chapter for calculation of potable water surplus/deficiency.

Assuming the existing surface water irrigation system remains in place, and all future units are required to irrigate with potable water, it is anticipated that by 2017, the City will be 239 gpm shy of being able to supply the maximum day demand under redundant water supply considerations (Table 6-1).

Table 6-1 Potable Supply and Demand Overview with Secondary Irrigation System

Year	Pop ulation	Average Summer Day Demand (gpm)	Max Day Demand (gpm)	Max Day + Fire Flow (gpm)	Peak Hour Demand (gpm)	Redundant Well Supply (gpm)	Surplus / Deficiency (gpm)
2010	3,567	1,140	1,900	6,900	2,850	2,025	125
2012	3,653	1,168	2,001	7,001	3,001	2,025	24
2017	3,878	1,239	2,264	7,264	3,396	2,025	-239
2032	4,637	1,482	3,154	8,154	4,731	2,025	-1,129
2042	5,225	1,670	3,842	8,842	5,763	2,025	-1,817
2052	5,887	1,881	4,617	9,617	6,926	2,025	-2,592

1. Population based on 2010 US Census Data.
2. Population projections based on a 1.2% growth rate.
3. Assumes commercial and industrial demands grow proportionately with domestic demands.

Conclusions:
When considering DEQ's redundant water supply requirement, existing potable water supply is not anticipated to be sufficient beyond 2012 even with the usage of secondary irrigation system. Additional wells will be needed in order to make full use of the groundwater rights under redundant supply conditions. The labor costs associated with this system will continue to increase as the system continues to disintegrate as illustrated by the pictures in Chapter 5. However, as discussed previously, the irrigation system is disintegrating and is in need of substantial upgrades if it were continued to be operated. The estimated capital costs for this alternative are outlined in Table 6-2.

Table 6-2 Alternative 1 Estimated Capital Costs

	Unit	Quantity	Unit Price	Total Price
Culvert Ditch Replacement	LF	140,000	$50	$7,000,000
Excavation/Backfill	LF	120,000	$20	$2,400,000
Gates	LF	110,000	$10	$1,100,000
Asphalt Repair	LF	110,000	$10	$1,100,000
Pump station upgrades	EA	3	$115,000	$345,000
Subtotal Construction				$11,945,000
Project Contingency/Inflation (2.56%)				$305,792
Engineering, Legal, Misc. (16%)				$1,911,200
Total Project				$14,162,000

6.4 Alternative 2: Install Pressure Irrigation System

This alternative considers the replacement of all of the irrigation system with a pressurized piping system that will enable irrigation water to be pumped through a new distribution system throughout the City. This would allow the City to continue to operate the city-wide irrigation system due to the possibilities of automation as well as self-operation by users. This will require approximately 21 miles of underground piping with pump stations and control buildings.

One of the advantages of this alternative is conservation of ground water for potable uses. Other advantages include optimization of water use by reducing losses in the system and effectively increasing the water available to irrigate. In addition, the quantification of water delivered and water used will allow for more equitable distribution. This alternative will offer much higher levels of service and reliability to the irrigation system. The staffing levels required to operate the system would be reduced. Virtually all areas of the City would be serviceable by the conceived pressurized irrigation system.

The disadvantages of this alternative are the increased capital cost of new pipes and installation of ancillary equipment. Operating costs would also increase due to the system having more electrical and mechanical components, as well as the increased energy costs of operating the system. A cross connection program would also be required so that no accidental connections between sewer, drinking water, and irrigation water pipes occur. These costs would necessitate a rate review and would translate to higher user rates. The City would also require more skilled labor resources.

The capital costs for this alternative are summarized by Table 6-3. It is anticipated that a separate pressurized irrigation system would continue to be operated as a separate City utility and would require separate budgeting, additional employees, etc.

Table 6-3 Alternative 2 Estimated Capital Costs

	Unit	Quantity	Unit Price	Total Price
Pipe	LF	155,000	$25	$3,875,000
Excavation/Backfill	LF	140,000	$20	$2,800,000
Fittings, Valves	LF	140,000	$10	$1,400,000
Asphalt Repair	LF	140,000	$10	$1,400,000
Pump Station Upgrades	EA	6	$115,000	$690,000
Subtotal Construction				$10,165,000
Project Contingency/Inflation (2.56%)				$260,224
Engineering, Legal, Misc. (16%)				$1,626,400
Total Project				$12,052,000

6.5 Alternative 3: Abandon Existing Irrigation System and Augment Potable Water System

Alternative 3 considers abandoning of the entire irrigation system and replacing the water supply shortfall with additional wells and/or a surface water treatment facility. In this scenario the City would provide irrigation water through the drinking water infrastructure. If the irrigation system is abandoned, the existing water system will be significantly undersized as shown in Table 6-4. Potable water demand of 1.2 gpcm was used to calculate anticipated maximum day demand and deficiency (Table 6-4).

Table 6-4 Redundant Supply Deficiency if Irrigation System is Abandoned

Year	Population[2]	Max Day Demand[3] (gpm)	Redundant Well Supply (gpm)	Deficiency (gpm)
2010[1]	3,567	4,178	2,025	-2,153
2012	3,653	4,279	2,025	-2,254
2017	3,878	4,542	2,025	-2,517
2032	4,637	5,431	2,025	-3,406
2042	5,225	6,120	2,025	-4,095
2052	5,887	6,895	2,025	-4,870

1. Population based on 2010 US Census Data.
2. Population projections based on a 1.2% growth rate.
3. Assumes commercial and industrial demands grow proportionately with domestic demands.

As shown in Table 6-4, the anticipated deficiency in 2017 will be 2,517 gpm when considering maximum day demand and redundant well supply scenarios. When considering total supply capability of 3,543 gpm, the current water system would have the deficiencies as shown in Table 6-5.

Table 6-5 Total Supply Deficiency if Irrigation System is Abandoned

Year	Population[2]	Max Day Demand[3] (gpm)	Total Well Supply (gpm)	Deficiency (gpm)
2010[1]	3,567	4,178	3,543	**-635**
2012	3,653	4,279	3,543	**-736**
2017	3,878	4,542	3,543	**-998**
2032	4,637	5,431	3,543	**-1,888**
2042	5,225	6,120	3,543	**-2,576**
2052	5,887	6,895	3,543	**-3,352**

1. Population based on 2010 US Census Data.
2. Population projections based on a 1.2% growth rate.
3. Assumes commercial and industrial demands grow proportionately with domestic demands.

The surface water rights that the City currently possesses could be leased to farmers and other potential users and/or be converted to additional groundwater rights. The revenue derived from the leased water rights would be used to upgrade and maintain the drinking water system.

The groundwater recharge potential that may occur from the land application of irrigation water is conserved in this potential because the surface water is merely applied by others, rather than by the current irrigation system users. Furthermore, the contribution to groundwater recharge by the system users is insignificant in comparison to agricultural activities outside the study area.

It is vital for water rates to be revised so that the City is able to operate the drinking water system sustainably with respect to maintenance of the infrastructure, groundwater rights, financing future growth, utilization of system capacity and water conservation. Conservation is important because it permits the maximum tenure of existing resources and defers investment in expansion and therefore keeps costs to the consumers at a minimum.

This alternative requires a thorough public education initiative to explain to the public the advantages and rationale for this alternative.

The drinking water system will require optimization to ensure that all users can have access to irrigation water as well as flows required to suppress fire. Some pipe sections may require upgrading to larger diameters. Drinking water consumption data presented in Chapter 5 suggests that the drinking water system consumption would be affected by this alternative as the peak demands throughout the City would increase. Due to the current pumping and piping deficiencies (4" and 2" pipe throughout town), it is conceivable that additional pumping and distribution system improvements would be necessary. The City may also need additional wells.

The advantages of this alternative to the City would be the cost savings that would arise from maintaining and operating one system instead of two systems. Although water bills may rise for some users, the actual cost of water per unit will be less than with the two systems operating. In the long run, the combination of increased revenues and conservation will reduce user rate increases, and afford the City and the citizens an improved water system.

The disadvantages of this alternative derive from the capital costs required to upgrade the existing drinking water system to accommodate the demand placed on it by residences currently using the irrigation system.

6.5.1 Alternative 3a: Augment Potable Water System by Drilling New Wells

This alternative considers abandoning the existing irrigation system and augmenting the potable water system by drilling two (2) new wells immediately similar in size to the Senior Avenue Well (1,518 gpm). This will increase a redundant water supply by 3,036 gpm (6.8 cfs). A third well will be added in the future for a combined redundant water supply increase of 6,579 gpm (14.7 cfs) (Table 6-6).

Table 6-6 Demand/Supply Balance for Alternative 3a

Year	Population[2]	Max Day Demand[3] (gpm)	Redundant Well Supply (gpm)	Surplus/Deficiency (gpm)
2010[1]	3,567	4,178	5,061	**883**
2012	3,653	4,279	5,061	**782**
2017	3,878	4,542	6,579	**2,037**
2032	4,637	5,431	6,579	**1,148**
2042	5,225	6,120	6,579	**459**
2052	5,887	6,895	6,579	**-316**

1. Population based on 2010 US Census Data.
2. Population projections based on a 1.2% growth rate.
3. Assumes commercial and industrial demands grow proportionately with domestic demands.

Based on this scenario, the City would need to immediately acquire an additional groundwater right of 1,897 gpm (the difference between the redundant well supply and total allowed ground water rights) or find a way to use their surface water rights in a managed recharge and withdrawal project. The City has been working with Brockway Engineering, PLLC investigating the most feasible and environmentally conscious way to address the City's water deficiency issue.

The estimated costs for this alternative are shown in Table 6-7.

Table 6-7 Estimated Construction Costs for Alternative 3a

	Unit	Quantity	Unit Price	Total Price
Distribution Lines	LF	62,200	$25	$1,555,000
Excavation/Backfill	LF	62,200	$20	$1,244,000
Fittings, Valves	LF	62,200	$10	$622,000
Asphalt Repair	LF	62,200	$10	$622,000
Water Rights	EA	1	$2,004,000	$2,004,000
Pump station upgrades	EA	3	$115,000	$345,000
Well Construction	EA	3	$525,000	$1,575,000
Subtotal Construction				$7,967,000
Project Contingency/Inflation (2.56%)				$203,955
Engineering, Legal, Misc. (16%)				$1,274,720
Total Project				$9,450,000

6.5.2 Alternative 3b: Augment Potable Water System by Constructing Surface Water Treatment Plant (WTP)

This alternative considers abandoning the existing irrigation system, augmenting the potable water system and constructing a surface water treatment plant to treat water to drinking water standards. Treated water would be pumped directly into the existing distribution system in order to meet the peak summer demands. It is anticipated that the treatment plant would be shut down during the low demand periods (October – April) during which time the existing City wells would provide the water supply. As mentioned previously, the City of Gooding maintains the surface water rights for 9 cubic feet per second (cfs). As shown in Figure 5-3, the average monthly residential water usage is approximately 26,000 gallons per month and the peak month water usage is approximately 50,000 gallons per month.

Water Treatment Plant project costs typically range from $1.00 to $2.50 per gallon per day depending on water quality and needed treatment processes. For example, the construction of a plant to treat 1,000,000 gallons per day would cost between $1 million and $2.5 million. More accurate costs could be further developed in the planning process which includes actual water quality sampling and further process analysis.

This alternative considers constructing a WTP to meet projected maximum day demand in 2032 (Table 6-8). Utilizing the existing redundant water supply scenario, the plant could eventually treat up to 3,768 gpm (5.43 million gallons per day). This scenario would utilize 3,768 gpm of the 4,039 gpm (93%) of the existing City owned surface water rights.

Table 6-8 Demand/Supply Balance for Alternative 3b

Year	Population[2]	Max Day Demand[3] (gpm)	Redundant Supply (gpm)	Construct WTP (8.4 cfs/3,768 gpm)	Surplus/Deficiency (gpm)
2010[1]	3,567	4,178	2,025	3,768	**1,615**
2012	3,653	4,279	2,025	3,768	**1,514**
2017	3,878	4,542	2,025	3,768	**1,251**
2032	4,637	5,431	2,025	3,768	**362**
2042	5,225	6,120	2,025	3,768	**-327**
2052	5,887	6,895	2,025	3,768	**-1,102**

1. Population based on 2010 US Census Data.
2. Population projections based on a 1.2% growth rate.
3. Assumes commercial and industrial demands grow proportionately with domestic demands.

The estimated costs for this alternative are shown in Table 6-9. It was assumed that treatment plant construction costs are $1.50 per gallon treated.

Table 6-9 Estimated Costs for Alternative 3b

	Unit	Quantity	Unit Price	Total Price
Distribution Lines	LF	62,200	$25	$1,555,000
Excavation/Backfill	LF	62,200	$20	$1,244,000
Fittings, Valves	LF	62,200	$10	$622,000
Asphalt Repair	LF	62,200	$10	$622,000
Water Treatment Plant	Gal	7,950,000	$1.50	$11,925,000
Pump station upgrades	EA	1	$115,000	$115,000
Subtotal Construction				$16,083,000
Project Contingency/Inflation (2.56%)				$411,725
Engineering, Legal, Misc. (16%)				$2,573,280
Total Project				$19,068,000

6.5.3 Alternative 3c: Augment Potable Water System by Constructing Surface Water Treatment Plant and New Well

This alternative considers abandoning the existing irrigation system and constructing one new well and a surface water treatment plant to meet the anticipated 2052 water demands. By constructing a new well, the City's redundant water supply will increase from 2,025 gpm to 3,543 gpm. A water treatment facility would need to be constructed to treat 2,250 gpm (3.24 million gallons per day) as shown in Table 6-10.

Table 6-10 Demand/Supply Balance for Alternative 3c

Year	Population[2]	Max Day Demand[3] (gpm)	Redundant Supply (gpm)	Construct WTP (5.0 cfs/2,250 gpm)	Surplus/Deficiency (gpm)
2010[1]	3,567	4,178	3,543	2,250	**1,615**
2012	3,653	4,279	3,543	2,250	**1,514**
2017	3,878	4,542	3,543	2,250	**1,251**
2032	4,637	5,431	3,543	2,250	**362**
2042	5,225	6,120	3,543	2,250	**-327**
2052	5,887	6,895	3,543	2,250	**-1,102**

1. Population based on 2010 US Census Data.
2. Population projections based on a 1.2% growth rate.
3. Assumes commercial and industrial demands grow proportionately with domestic demands.

The estimated costs for this alternative are shown in Table 6-11. It was assumed that treatment plant construction costs are $1.50 per gallon treated.

Table 6-11 Estimated Costs for Alternative 3c

	Unit	Quantity	Unit Price	Total Price
Distribution Lines	LF	62,200	$25	$1,555,000
Excavation/Backfill	LF	62,200	$20	$1,244,000
Fittings, Valves	LF	62,200	$10	$622,000
Asphalt Repair	LF	62,200	$10	$622,000
Water Treatment Plant	Gal	5,200,000	$1.50	$7,800,000
Pump station upgrades	EA	1	$115,000	$115,000
Well Construction	EA	1	$500,000	$500,000
Subtotal Construction				$12,458,000
Project Contingency/Inflation (2.56%)				$318,925
Engineering, Legal, Misc. (16%)				$1,993,280
Total Project				$14,770,000

6.6 Alternative Cost Evaluation

The alternatives discussed in this Chapter have initial estimated costs (Capital Costs). Costs presented herein are order of magnitude type costs for comparisons and should not be considered as actual project costs. The City would want to prepare more detailed cost estimates when actual facility quantities and sizes are determined.

6.7 Financial Considerations

A concept level financial analysis for the first two alternatives is presented in Table 6-12. Annual loan payments were determined utilizing terms of a 30 year payback period and an annual interest rate of 4.0%. Annual operational costs were assumed which allowed for a total annual cost to be calculated. This can then be calculated on a per user basis for each alternative. The annual costs per lot were calculated for each of the 2,900 lots, average monthly water fee per lot for Alternative 1 and Alternative 2 were also determined (Table 6-12).

Table 6-12 Per Lot Concept Level Financial Impact Analysis for Secondary Irrigation System - Alternatives 1 and 2

Alt.	No. of Lots	Costs for Secondary Irrigation System: Capital Costs	Annual Loan Payment (30-year, 4%)	Annual Operation Costs	Total Annual Cost	Annual Cost per Lot	Monthly Cost per Lot
1	2,900	$14,162,000	$818,990	$150,000	$968,990	$334	$28
2	2,900	$12,052,000	$696,968	$100,000	$796,968	$275	$23

As shown in Table 6-12, the estimated annual costs per lot are approximately $334 and $275 for Alternatives 1 and 2, respectively. Table 6-13 shows a concept level financial analysis for Alternatives 3a, 3b, and 3c.

Table 6-13 Per User Concept Level Financial Impact Analysis for New Facilities - Alternatives 3a, 3b, & 3c

Alt.	No. of Con-nections	Costs for New Water System Facilities						Existing Facilities		Total Average Water Bill
		Capital Costs	Annual Loan Payment (20 year, 1%)	Annual Operation Costs	Total Annual Cost	Annual Cost per Con-nection	Monthly Cost per Con-nection	Annual Operation Costs	Monthly Potable Water Cost	
3a	**1,609**	**$9,450,000**	**$523,675**	**$200,000**	**$723,675**	**$449.77**	**$37.48**	**$350,000**	**$32.06**	**$69.54**
3b	1,609	$19,068,000	$1,056,659	$200,000	$1,256,659	$781.02	$65.08	$350,000	$32.06	$97.14
3c	1,609	$14,770,000	$818,484	$200,000	$1,018,484	$632.99	$52.75	$350,000	$32.06	$84.81

Based on the financial impact analysis presented in Table 6-12 and Table 6-13, it is recommended that the City consider Alternative 3a. The total average monthly water bill for this alternative would be approximately $70.

6.8 Additional Considerations

There are several items that could be further investigated and considered. Because the redundant water supply rule is relatively new in the State of Idaho, practical implementation is still being considered. Conversations with DEQ representatives have indicated that there may be the potential for a waiver of this rule, if an emergency plan is in place to reduce demand on peak day scenarios. This could reduce the number of wells that would need to be constructed or the size of the water treatment facilities. However, if the existing irrigation system is abandoned, additional water supply facilities will need to be constructed.

Because the water supply systems need to be sized to meet maximum day demand, reduction of this demand will offer significant changes in required supply facilities. Additional mechanisms to reduce maximum day demands include mandatory watering days; water fees that escalate rapidly based on increased water usage, and improved management for large quantity users such as parks and school yards.

Chapter 7 Implementation and Funding Analysis

7.1 Priority Ranking

All options and improvements presented in Chapter 6 were ranked based upon current Idaho Rules for Public Drinking Water Systems (IDAPA 58.01.08) violations, potential IDAPA violations, cost, public sentiment, maintenance needs, and feedback from City leaders and employees. It was necessary to evaluate the proposed improvements based upon all of these criteria to ensure that the needs of the City's water system are met as a whole rather than simply addressing one aspect of the water system's needs.

In May 2010 Keller Associates, Inc. completed a document for the City of Gooding to analyze their gravity irrigation system, City of Gooding Irrigation System Study. The City hosted a Community Open House on May 13, 2009 to receive public input on the preliminary findings of the study prior to its completion. From this meeting and the community member interest, a committee was formed to evaluate all of the options proposed in Chapter 6. The alternatives and their respective costs are summarized in Table 7-1 and described in detail in Chapter 6.

Table 7-1 Evaluated Alternatives

Utilize Surface Water for Irrigation		
Alternative	Description	Estimated Cost
1	Maintain existing gravity irrigation system	$14,162,000
2	Install pressurized irrigation system	$12,052,000
Augment Potable Water System		
Alternative	**Description**	**Estimated Cost**
3a	Drill additional wells & upgrade distribution system	$9,450,000
3b	Construct surface water treatment plant & upgrade distribution system	$19,068,000
3c	Construct surface water treatment plant & a new well & upgrade distribution system	$14,770,000

Present worth analysis (Table 7-2) was performed for each alternative for a 20-year loan at 1.0% interest rate and the EPA required discount rate of 4.625%.

Table 7-2 Present Worth Analysis

Alternative	Cost	Annual O&M cost	Total cost	Payment	Present value
1	$14,162,000	$150,000	$14,312,000	$793,104	$10,205,805
2	$12,052,000	$100,000	$12,152,000	$673,407	$8,665,521
3a	$9,450,000	$200,000	$9,650,000	$534,758	$6,881,359
3b	$19,068,000	$200,000	$19,268,000	$1,067,742	$13,739,900
3c	$14,770,000	$200,000	$14,970,000	$829,567	$10,675,021

7.2 Selected Alternative & Recommended Solutions

Each alternative was formulated to address deficiencies of the existing potable water distribution system. However, based on the analyses presented in this Study, only one alternative, Alternative 3a, offers minimal cost, minimal environmental effects, and consequently, minimal costs of mitigation. Table 7-3 compares environmental impacts by each alternative, including the "No Action" Alternative.

Table 7-3 Cursory Environmental Impacts

Environmental Criteria	No Action Alt	Alt 1	Alt 2	Alt 3a	Alt 3b	Alt 3c
	No Action	Maintain Existing Irrigation System	Install Pressurized Irrigation System	Drill Three Additional Wells	Construct PW Treatment Plant	Construct PW Treatment Plant & Drill Additional Well
Climate/Physical Aspects (topography, geology, soils)	No impact	No impact	Minimal impact	Minimal impact	Some impact	Some impact
Population, Economics, Social Profile	No impact	Minimal impact	Minimal impact	Minimal impact	Some impact	Some impact
Land Use	No impact	Minimal impact	Minimal impact	Minimal impact	Some impact	Some impact
Floodplain Development	No impact	No impact	Minimal impact	Minimal impact	Minimal impact	Minimal impact
Wetlands and Water Quality	No impact	No impact	Optimize water use	Optimize water use	Optimize water use	Optimize water use
Wild and Scenic Rivers	No impact	No impact	Minimal impact	Minimal impact	Minimal impact	Minimal impact
Cultural Resources	No impact	No impact	Minimal impact	Minimal impact	Minimal impact	Minimal impact
Flora and Fauna	No impact	No impact	Minimal impact	Minimal impact	Some impact	Some impact
Recreation & Open Space	No impact	No impact	Minimal impact	Minimal impact	Some impact	Some impact
Air Quality	No impact	No impact	Minimal impact	Minimal impact	Minimal impact	Minimal impact
Energy	No impact	No impact	Increased energy consumption	Increased energy consumption	Increased energy consumption	Increased energy consumption
Public Health	Does not meet	Does not meet	Does not meet	Eliminates public health	Eliminates public health	Eliminates public health

	MDD, potential backflow contam.	MDD, potential backflow contam.	MDD, potential backflow contam.	concerns	concerns	concerns

The irrigation committee decided to pursue Alternative 3a (Appendix M). City Council confirmed that this decision reflects informed public opinion in implementation of the selected alternative, Alternative 3a. Keller Associates, Inc. concurred with the irrigation committee and City Council and recommended to the City that Alternative 3a be the selected alternative. Alternative 3a is summarized as follows:

1. Abandon existing gravity irrigation system
2. Drill three new wells
3. Acquire water rights for new wells
4. Upsize critical portions of the drinking water distribution system
5. Seek option to utilize (not sell) City's surface water rights

Implementation of the selected alternative will eliminate major deficiencies of the existing water system. Specifically, construction of new wells will increase redundant well pumping capacity and satisfy existing water demand of the City. Implementation of the project will also meet requirements of the system's fire flow capacity necessary to meet regulations regarding fire suppression storage and fire flow demands. Upgrades of transmission lines will eliminate the problem with low pressures in the distribution system thus eliminating public health concerns associated with it.

The City of Gooding, as the system owner, has certified that the City is capable of financing and managing the building and operation of the new project. The City is not able to use capital improvement funds for the project but is seeking alternative funds to ensure completion of the improvements under selected alternative. In particular, the City of Gooding is seeking the Idaho Department of Commerce Community Development Block Grant, a DEQ loan, and possibly, a private loan for acquisition of water rights.

Elimination of the gravity irrigation system will remove the burden of managing the failing system. Augmenting the potable water distribution system with three new wells and upgrading undersized portions of the piping network will increase the size of the existing potable water distribution system but will not add unfamiliar levels of complexity to the system's operation and management.

One of the criteria used for selecting approximate locations of new ground water well sites was availability of land owned by the City. The sites are situated on the land owned and controlled by the City (Personal Communication, Todd Bunn, Public Works Director, May 3, 2013). Impacts to the water supply system were considered. The City is working with Brockway Engineering to ensure minimal impacts to the sole source aquifer in a managed aquifer recharge and withdrawal project.

The new sources of drinking water under selected alternative are ground water wells. The existing wells supply the City with water of good quality, as indicated by the water quality records presented in Appendix C. This allows to conclude that new wells constructed in relatively close proximity to the existing wells will provide potable water of good quality.

7.2.1 Detailed Analysis of Selected Alternative 3a

The selected alternative, Alternative 3a, consists of a number of improvements. These improvements were initially prioritized into Priority 1, Priority 2, and Priority 2.5 improvements as presented below. A detailed cost analysis of each priority is provided in Appendix N. The total cost of Alternative 3a, in addition to the cost of three priorities, includes financial and audit expenses ($15,000), interim interest expenses ($200,000), and administrative services ($91,500) (Table 1-2).

Priority 1 Improvements: Figure 7-1 describes the basic improvements to water system required to meet water demands without gravity irrigation system. A detailed cost breakdown is provided in Appendix N.

- Purchase 6.68 cfs of water rights
- Construct two new wells (Wells No. 5 & 6)
- Install 7,000 feet of piping (8", 10", 12")
- SCADA base setup
- **Priority 1 Cost Estimate: $4,430,298**

Priority 2 Improvements: Figure 7-2 describes the improvements to meet future water demands as City growth occurs. These improvements are estimated to be needed in 2017. A detailed cost breakdown is provided in Appendix N.

- Purchase 3.34 cfs of water rights
- Construct one new well (Well No. 7)
- Install 3,200 feet of piping (12")
- **Priority 2 Cost Estimate: $2,083,611**

Priority 2.5 Improvements: Figure 7-3 describes the improvements to meet fire flow requirements throughout the City by increasing pipe sizes. A detailed cost breakdown is provided in Appendix N.

- Install 24,500 feet of piping (8", 10", 12")
- **Priority 2.5 Cost Estimate: $2,629,591**

Three ranking criteria were used to classify the importance of the system improvements. Priority 1 improvements are improvements that are vital to reliable operation of the water system and improvements that will improve the long term and short term operation of the system. The water right purchase, new well construction, and additional piping are necessary to abandon the gravity irrigation system and allow all of the residents to begin using the potable water system for all their water needs.

Priority 2 improvements are improvements to allow for future growth of the City. These improvements are not necessary to address immediate reliability issues in the water system, but are necessary for short-term improvements.

Priority 2.5 improvements are those improvements that are going to be necessary for Gooding to meet future demands and regulatory requirements (fire flow and MDD), but at this time, the City effectively operates without these improvements.

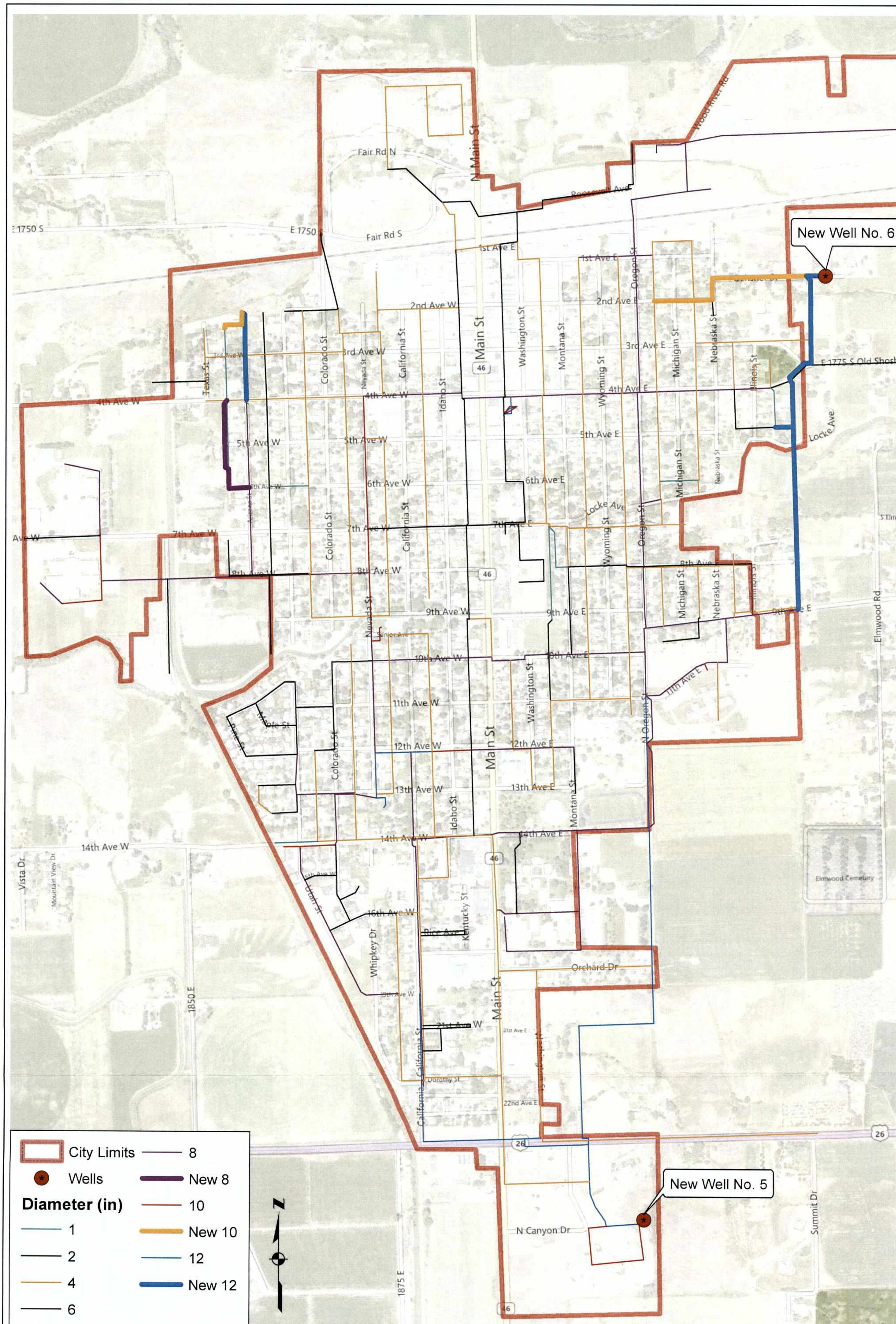


FIGURE NO. 7-1	Gooding WFPS Priority 1 Supply and Transmission Improvements	City of Gooding, Idaho	KELLER associates 305 N. 3rd Avenue Pocatello, ID 83201 208.238.2146 www.kellerassociates.com	PROJECT NO. 212004 FILENAME Fig 7-1

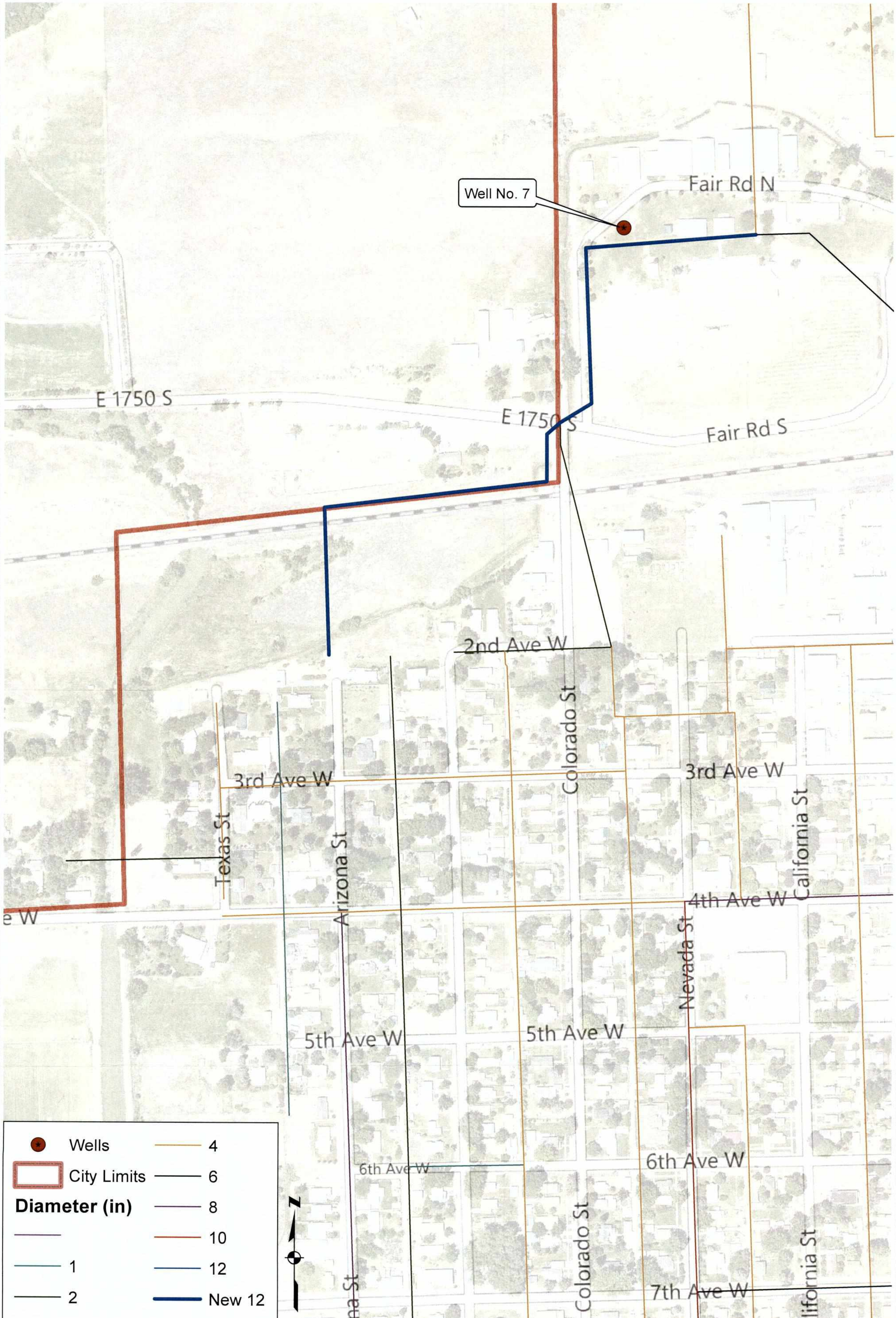


FIGURE NO. 7-2	Gooding WFPS Priority 2 Additional Supply and Transmission Improvements	City of Gooding, Idaho	KELLER associates 305 N. 3rd Avenue Pocatello, ID 83201 208.238.2146 www.kellerassociates.com	PROJECT NO. 212004 FILENAME Fig 7-2

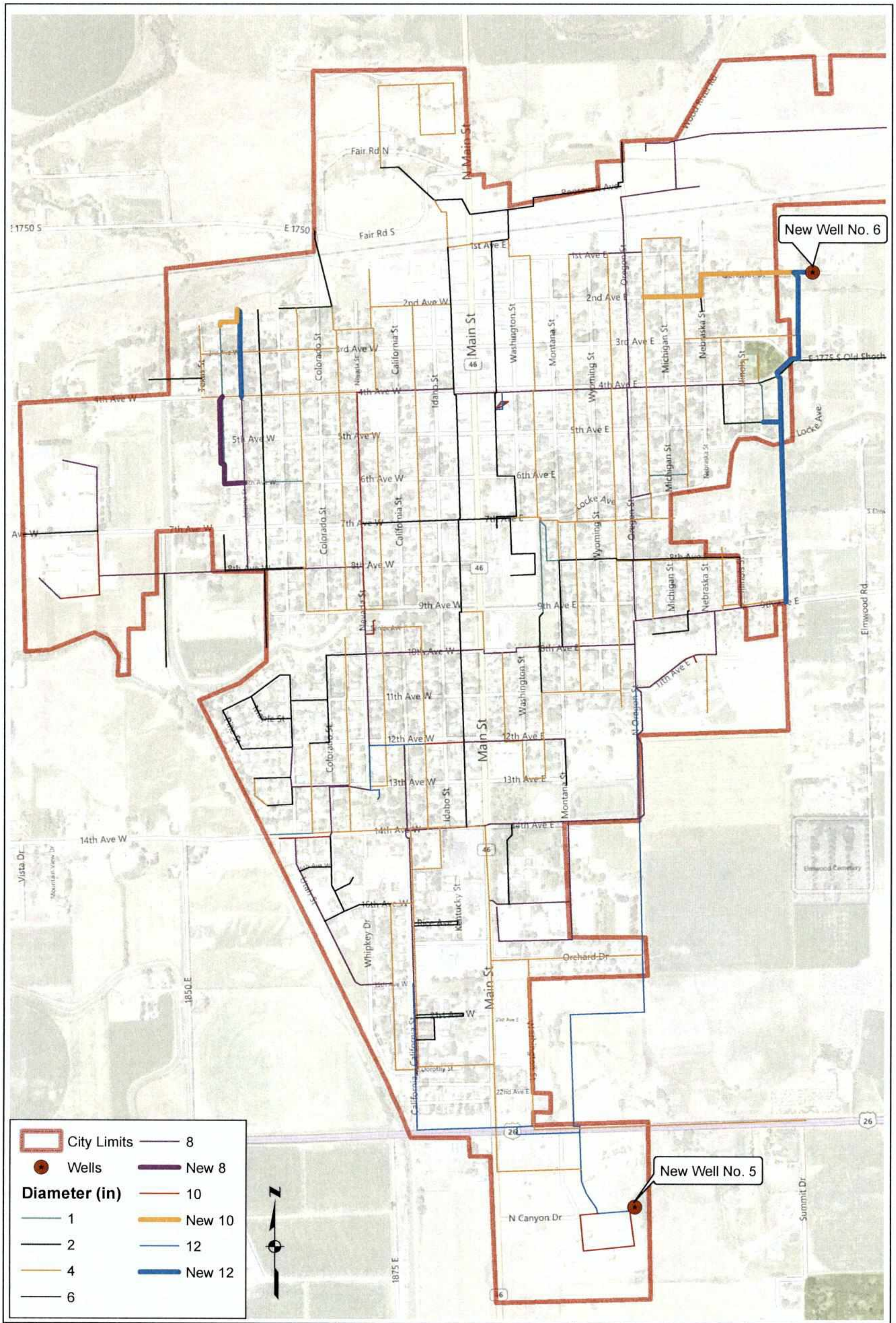


FIGURE NO. 7-1	Gooding WFPS	City of Gooding, Idaho	KELLER associates — 305 N. 3rd Avenue, Pocatello, ID 83201, 208.238.2146, www.kellerassociates.com	PROJECT NO. 212004
	Priority 1 Supply and Transmission Improvements			FILENAME Fig 7-1

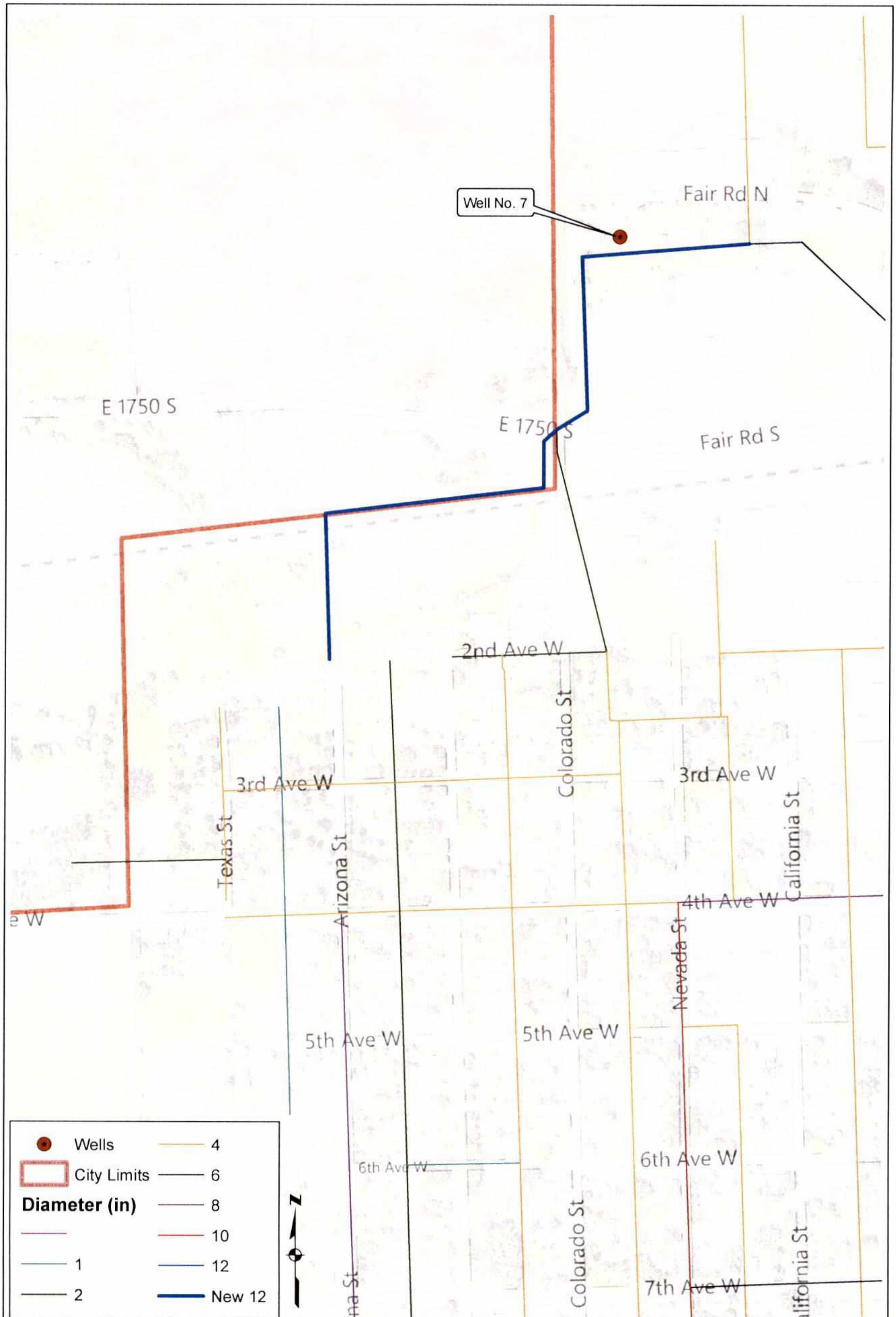


FIGURE NO. 7-2	Gooding WFPS Priority 2 Additional Supply and Transmission Improvements	City of Gooding, Idaho	KELLER associates 305 N. 3rd Avenue Pocatello, ID 83201 208.238.2146 www.kellerassociates.com	PROJECT NO. 212004 FILENAME Fig 7-2

7.3 Funding Analysis

There are several grant funding sources available to municipalities to assist in offsetting capital costs associated with water improvements. The main grant sources include USDA-Rural Development (RD), the Community Development Block Grant (CDBG), and Special Congressional Appropriations. In addition, low interest loans are available through both the Idaho Department of Environmental Quality (DEQ) and RD.

Each of the funding sources listed are competitive. For CDBG, grants up to $500,000 are available to those municipalities that have a low to moderate income (LMI) of 51% or greater. The LMI is based on the 2000 Census; however, cities can perform door-to-door surveys on an annual basis to reassess the LMI status.

Qualification for the RD grant is based upon median household income (MHI). MHI values are based on the 2000 Census for the 2012 fiscal year. The MHI threshold for qualification typically changes on an annual basis. According to RD, the City of Gooding's year 2000 MHI is $29,316 and they are eligible for RD grants, however the percentage is unclear until the City submits further information to RD.

Congressional Appropriations are grants awarded by the appropriations committee of congress through lobbying of the state's congressional delegation. These grants are tied to the federal budget and are awarded based on need. These grants are the most competitive of the grants listed.

Low interest loans are available through RD and DEQ. For these loans, applicants are prioritized based on need and loan monies are granted from highest priority to lowest priority until available funds are exhausted. The RD loans are based on a 30 year amortization schedule and the DEQ loans are based on a 20 and 30 year amortization schedule.

The Safe Drinking Water Act, as amended in 1996, established the Drinking Water State Revolving Fund to make funds available to drinking water systems to finance infrastructure improvements. The program also emphasizes providing funds to small and disadvantaged communities and to programs that encourage pollution prevention as a tool for ensuring safe drinking water.

Drinking Water State Revolving Loan Funds (DWSRF) are state loan funds backed up by cash reserves provided by the Environmental Protection Agency. The interest rates for these loans are much lower than commercial rates. Recipients are required to comply with EPA's terms of the loan, which may require an environmental assessment by Idaho Department of Environmental Quality.

The City can also fund this project internally by revising drinking water rates or irrigation user rates to raise the required funds.

7.4 Rate Analysis

There are approximately 1,378 residential connections and 231 commercial connections within City limits. Every connection pays the same base rate of $7.80 per month for up to 1,200 gallons. For 1,200 gallons to 1,300 gallons the user pays an additional 0.80 cents. For each additional 100 gallons, beyond the first 1,300 gallons, the user pays $0.10. Users that use above 75,000 gallons pay an additional $0.25 per thousand. In order to afford the proposed water improvement projects the City will need to increase water usage rates. Water rates should be set based upon the loan amounts that the City will receive and operation and maintenance costs. Section 7.2.1 summarizes the costs of each priority and Table 7-4 through Table 7-5 illustrate the funding sources and associated user rates to fund the project. Estimated rate impact under the assumption that the City would not receive grants is presented in Table 7-4.

Table 7-4 Estimated Rate Impact without Grants

Priority	Project Costs	Estimated Monthly User Rate Increase	Cumulative Monthly Rate
Existing Rate			$32.06
Alternative 3a	$9,450,000	$34.44	$66.50
Total	**$9,450,000**	**$34.44**	**$66.50**

Payment terms: 3.5%, 20 years, 1609 connections

Further analysis was performed based on the anticipated grant and loans listed in Table 7-5 and the assumption that the users will maintain the same water use characteristics. The analysis was performed assuming the Idaho Department of Commerce Community Development Block Grant of $350,000, a 1% DEQ loan of $7,100,000, and a 3.5% private loan of $2,000,000 (Table 7-5). To complete the project under Alternative 3a the City will need to raise water user rates from the current average rate of $32.06 to 63.88.

Table 7-5 Anticipated Increase of Monthly User Rates

Anticipated rate	Funding Amount	Monthly Rate Impact for Users
Block Grant	$350,000	$0.00
DEQ Loan	$7,100,000	$20.38
Private Loan (water rights)	$2,000,000	$7.29
Total	**$9,450,000**	**$27.67**
	Reserve (10%)	**$2.77**
	Increased O&M (5%)	**$1.38**
	Total	**$31.82**

DEQ loan: 1%, 20 years, 1609 connections
Private loan: 3.5%, 20 years, 1609 connections

The rate increases shown in Table 7-4 and Table 7-5 illustrate projected user rates without grant participation and with receipt of anticipated grants and loans, respectively. It is Keller Associates' recommendation that the user rate without incorporated grant funding be used for planning purposes. As construction of these improvements approaches, Keller Associates recommends that a detailed rate analysis be performed to ensure that monthly user rates are appropriate.

In order for the City to be able to complete all the projects under Priorities 1, 2, and 2.5, as described in Section 7.2.1, the City would need to raise monthly user rates by approximately $31.80, assuming the City receives the grant and loans listed in Table 7-5, to a cumulative monthly rate of $62.88. This is assuming that the average existing user rate is $32.06 as described in Figure 5-8. A more detailed and comprehensive demonstration of the user rate fluctuation with regards to project completion is described in Figure 7-4 and Figure 7-5, where Priorities 1, 2, and 2.5 have been shown. Furthermore, the City would need to raise monthly rates on an annual basis to reflect inflationary changes (approximately 3% annually) so that the City will be able to complete other needed system improvements that tend to become apparent through the use of the system.

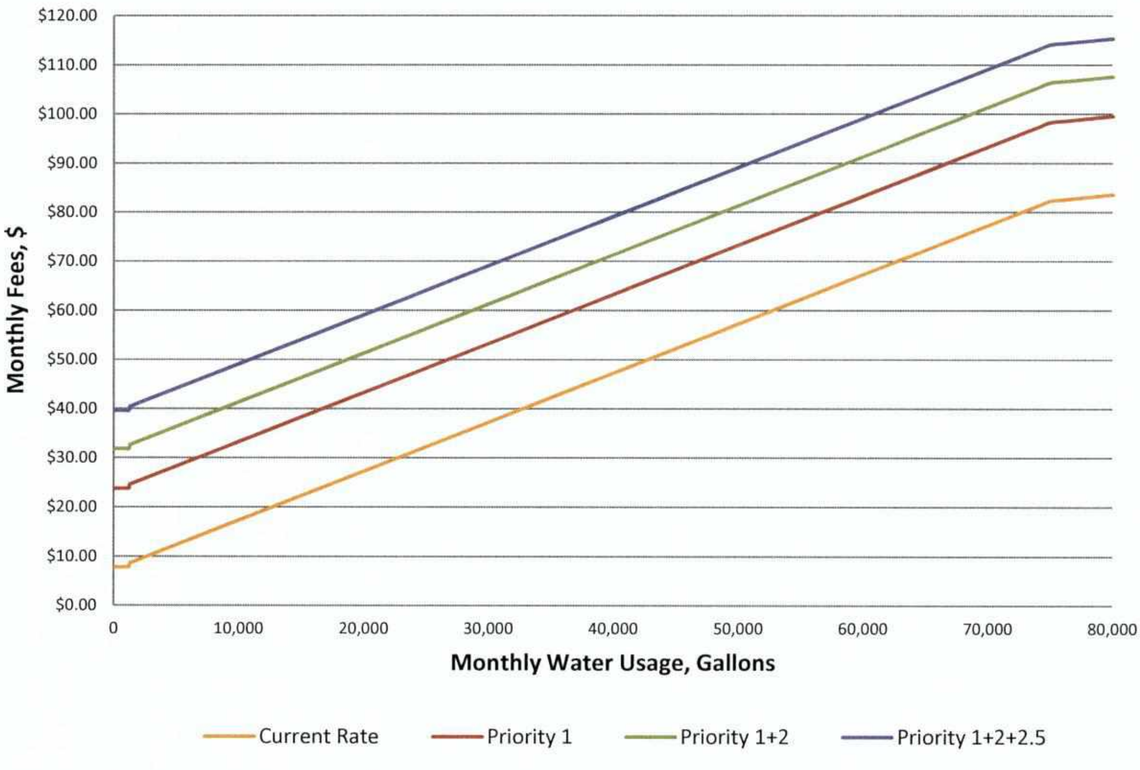


Figure 7-4 Approximate Water Charges vs. Usage

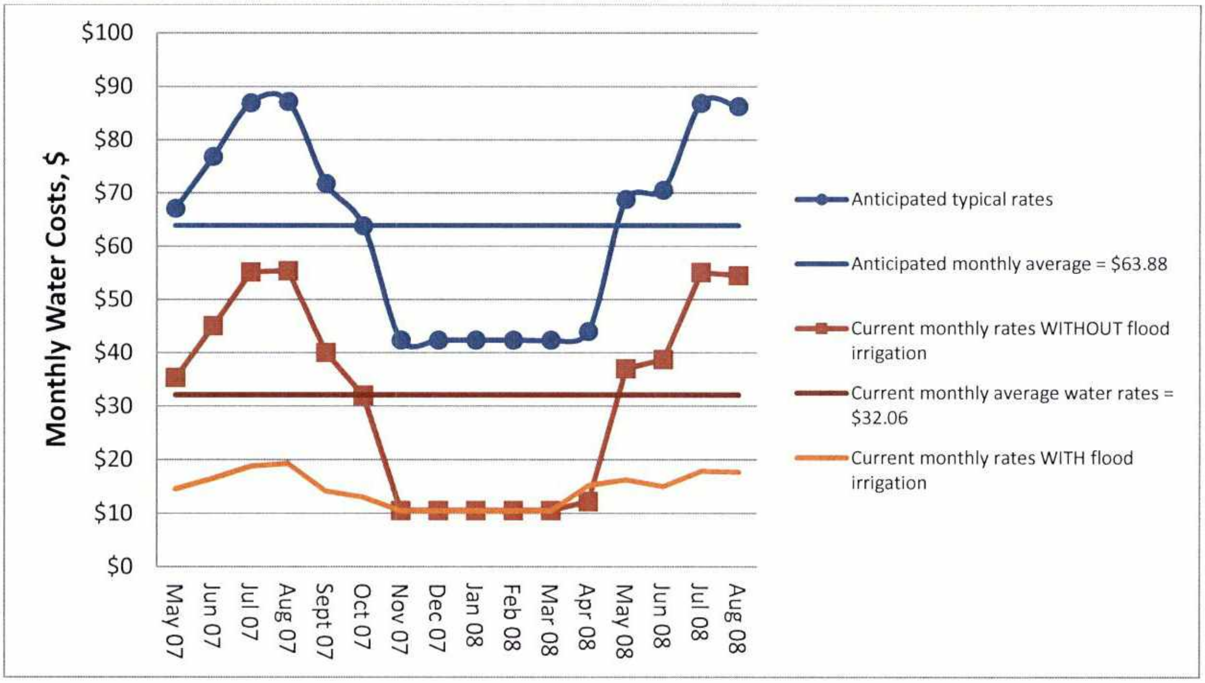


Figure 7-5 Current and Projected Water Rates

7.5 Project Implementation and Schedule

Developing a schedule to implement system improvements provides a timeline that will help motivate project development, find funding sources, educate the general public, and establish deadlines for major project milestones.

Informed community consent is an important part of finalizing the WFPS. City Council meetings are open to the public and held in the City Hall on a biweekly basis. As part of the study process, direct materials (a notice of town hall meetings and a notice of hearing) were sent out to notify the public of the upcoming events (Appendix O). Numerous public open houses and meetings were held to inform the public of the findings of this study. The focus was on educating the public about the costs of operating the water system, maintaining the water system, system deficiencies identified in the study, and the cost to remedy system deficiencies. Public information handouts, comment sheets, sign-up sheets, and public comments published in the local newspaper can be found in Appendix O.

As part of the 14-day public comment period, the City held a public hearing on April 15th, 2013. The purpose of the public hearing was to present City of Gooding Water Facility Planning Study. Written comments were collected during the public comment period (Appendix O). Upon completion of the public comment period the City Council officially selected Alternative 3a as the preferred alternative. A public hearing notice, the meeting minutes and public comments are presented in Appendix O.

Additional three public meetings were held in September and October of 2013. All materials used or the meetings, including advertising materials and presentation slides are included in Appendix P.

Keller Associates staff have worked closely with City maintenance staff and elected officials in analyzing the water system and developing improvements that will have lasting impacts on the City. A complete project schedule is presented in Table 7-6.

Table 7-6 Preliminary Project Schedule

Project Activity	Date (to be) Completed
Design Professional Procurement	October 2010
Design Professional Contract Executed	January 2013
Grant Administration Procurement	November 2012
Grant Administration Contract Executed	May 2013
Judicial Confirmation	February 2013
Environmental Release	May 2013
Bid Document Approval	August 2013
Bid Opening	September 2013
Construction Contact Executed	October 2013
Pre-Construction Conference	October 2013
Start Construction	November 2013
Construction 25%	February 2014
Construction 50%	June 2014
Second Public hearing	April 2013
Construction 75%	August 2014
Substantial Completion	September 2014
Construction Complete	October 2014
Fair Housing Update	Completed
504 Update	Completed
Final Closeout	January 2015
Audit	March 2015

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Appendix A Needed Fire Flows

Oksana Roth

From:	Brandon Covey [brandoncovey@cableone.net]
Sent:	Tuesday, November 13, 2012 9:12 AM
To:	Oksana Roth
Subject:	FW: Gooding NFF and flows.
Attachments:	Gooding 2007 flows.pdf; GoodingNeeded Fire Flow Report.pdf

Brandon Covey
Fire Chief
Gooding Fire/Rescue
208-934-8348

-----Original Message-----
From: Douglas H. Young [mailto:dyoung@isrb.com]
Sent: Tuesday, November 13, 2012 8:54 AM
To: Brandon Covey (brandoncovey@cableone.net)
Subject: Gooding NFF and flows.

Brandon,

Here are the need fire flow for the city of Gooding as well as the hydrant test that we witnessed during our last survey.

Fire flow duration that we use is from the Fire Suppression Rating Schedule as published by ISO.

2 hours for needed fire flows up to 2500 gpm
3 hours for needed fire flows for ver 2500 gpm to 2500 gpm
4 hours for needed fire flows greater than 3500 gpm.

Hope this helps.

Doug Young
ISRB
208-343-5483 x 21

1

Needed Fire Flows for P Code 149 GOODING

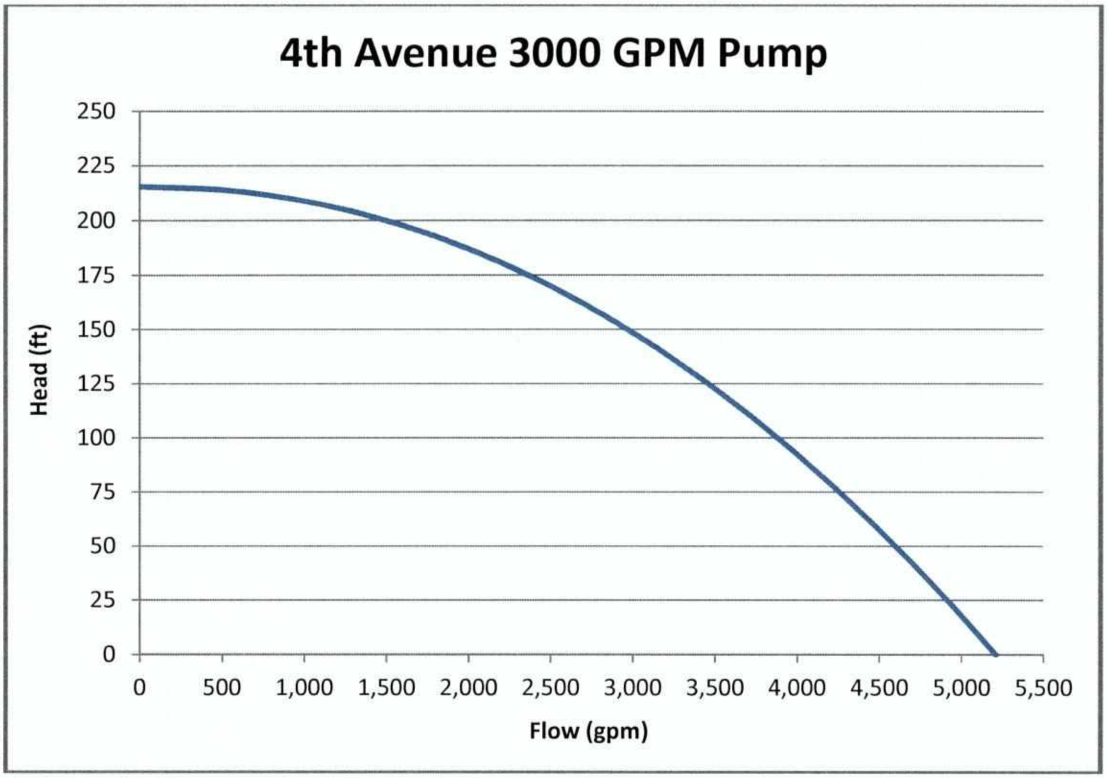
Stories	N.F.F.	PPC & W	OWNER	Address	
1	5,000	08 I-1,P-1	SCHOOL DIST 231	1050 7TH AVE WEST	GOODING
2	5,000	08 I-1	City of Gooding	AGRI LN	GOODING
There are(is) 2 in this group					
2	3,000	03	SCHOOL DIST 465	906 MAIN ST	GOODING
1	3,000	03 S-5	HELENA CHEMICAL	109 1ST AVE EAST	GOODING
There are(is) 2 in this group					
3	2,500	03 S-5	HELENA CHEMICAL	103 MAIN ST	GOODING
2	2,500	03	WILSON BATES FURNITURE	318 328 MAIN ST	GOODING
1	2,500	03	KEVIN KOONE	530 534 MAIN ST	GOODING
1	2,500	03	WILBUR ELLIS	410 1ST AVE EAST	GOODING
1	2,500	03	GOODING CO MEMORIAL HOSPITAL	1120 MONTANA ST	GOODING
There are(is) 5 in this group					
2	2,000	03	LINCOLN INN MOTEL & RESTAURAN	405 MAIN ST	GOODING
1	2,000	03	GOODING COUNTY	624 MAIN ST	GOODING
1	2,000	03	WOOD RIVER ENGINE SERVICE	126 4TH AVE EAST	GOODING
There are(is) 3 in this group					
1	1,750	03	WOOD RIVER VENEER	919 921 7TH AVE W	GOODING
1	1,750	03	ZEPPES PIZZA & SUBS INC	215 MAIN ST	GOODING
There are(is) 2 in this group					
1	1,500	03	WOOD RIVER VENEER	919 921 7TH AVE W	GOODING
2	1,500	03	CRM FARMS	203 N MAIN ST	GOODING
There are(is) 2 in this group					
1	1,250	04	STOCKHAM CUSTOM MEATS	150 COLORADO ST	GOODING
1	1,250	03	RANCH BOWL	1730 MAIN ST	GOODING
1	1,250	03	STEIN METAL FAB	145 MONTANA ST	GOODING
1	1,250	03	PIONEER BODY & PAINT	150 MAIN ST	GOODING
There are(is) 4 in this group					
1	1,000	03	TONYS AUTOMOTIVE	318 IDAHO ST	GOODING
1	1,000	03	LEW WHITE	230 12TH AVE WEST	GOODING
1	1,000	03 S-5	HELENA CHEMICAL	209 1ST AVE EAST	GOODING
1	1,000	03 S-5	HELENA CHEMICAL	208 1ST AVE EAST	GOODING
1	1,000	03 S-5	HELENA CHEMICAL	301 1ST AVE EAST	GOODING
There are(is) 5 in this group					
1	750	03 S-5	HELENA CHEMICAL	210 1ST AVE EAST	GOODING
1	750	03 S-5	HELENA CHEMICAL	102 MAIN ST	GOODING
1	750	03	STAMPEDE BURGER	701 MAIN ST	GOODING
1	750	03	NEW CHINA HOUSE RESTAURANT	222 4TH AVE EAST	GOODING
1	750	03	LM DAVENPORT	ROOSEVELT ST	GOODING
1	750	03	ROWDYS	227 MAIN ST	GOODING
There are(is) 6 in this group					
1	0	03 P-1	HELPING HANDS OF GOODING	1220 MONTANA AVE	GOODING
2	0	03 P-1	COOKS FOOD TOWN	501 MAIN ST	GOODING
1	0	03 P-1	WALKER CENTER	605 11TH AVE EAST	GOODING
1	0	03 P-1	GOODING MEMRL HOSPITAL	1120 MONTANA ST	GOODING
2	0	03 P-1	RIDLEYS IGA	1427 S MAIN ST	GOODING
1	0	03 P-1	MH KING CO	1455 MAIN ST	GOODING
There are(is) 6 in this group					

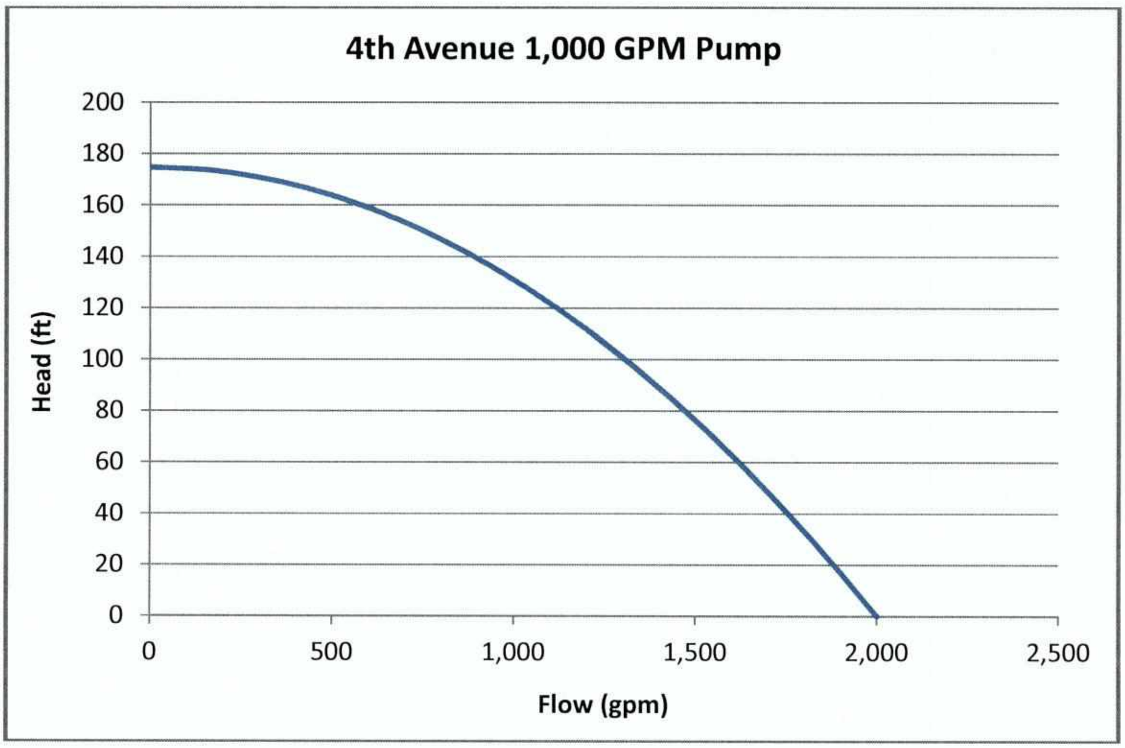
Tuesday, November 13, 2012

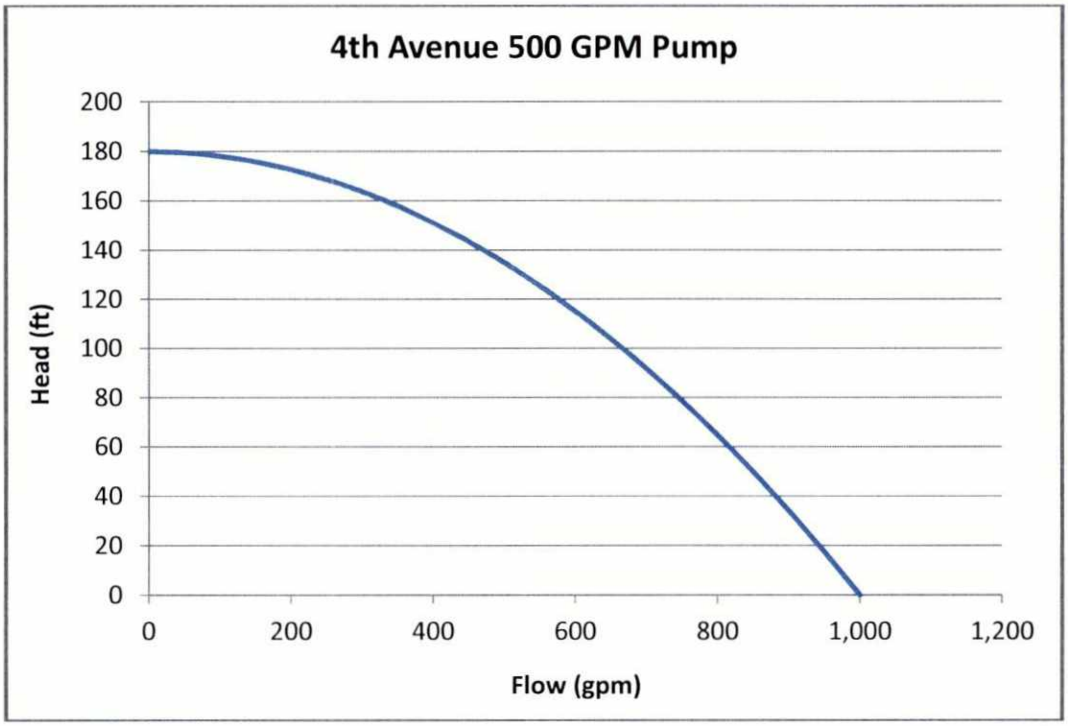
Needed Fire Flows for P Code 149 | GOODING

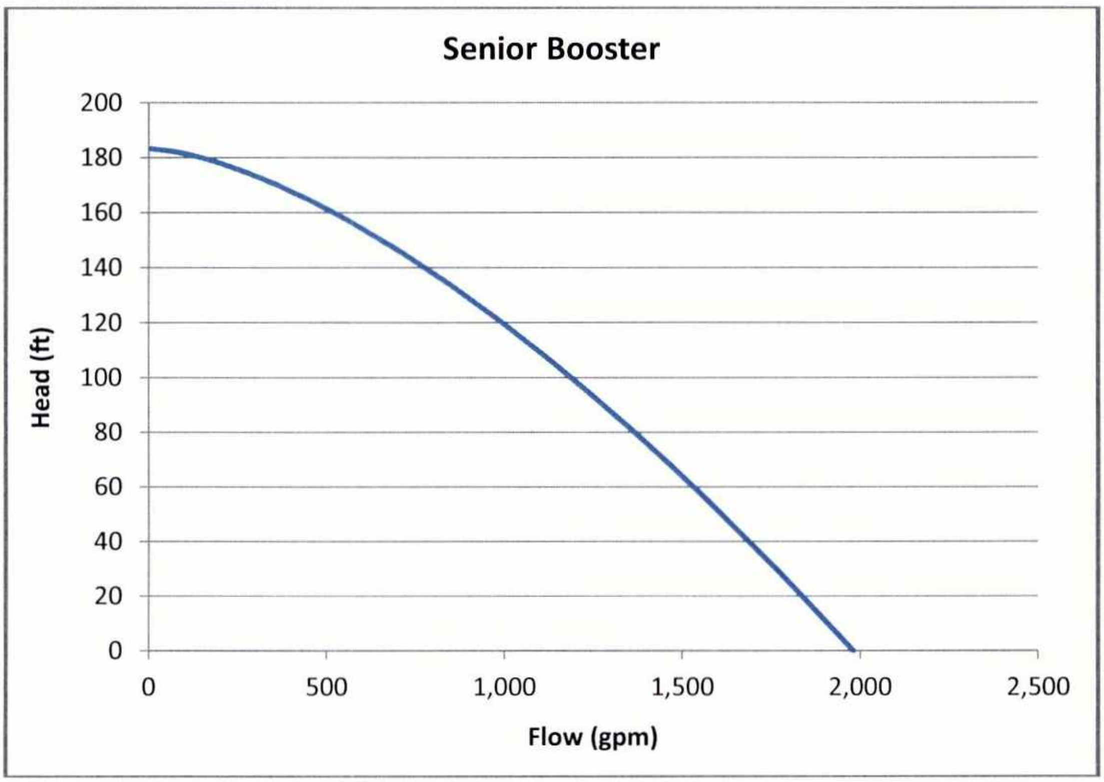
Stories	N.F.F.	PPC & W	OWNER	Address
Average Needed Fire Flow is			1,500	

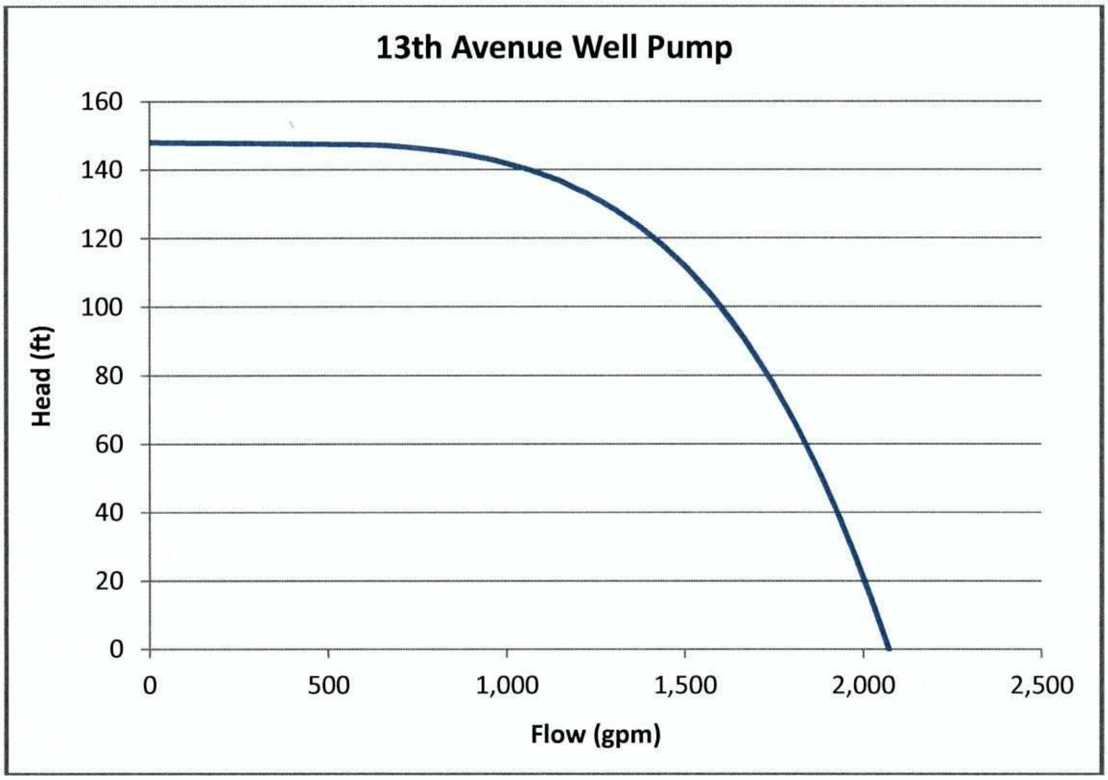
Tuesday, November 13, 2012


4th Avenue 3000 GPM Pump
Head (ft)
250
225
200
175
150
125
100
75
50
25
0
0
500
1,000
1,500
2,000
2,500
3,000
3,500
4,000
4,500
5,000
5,500
Flow (gpm)


4th Avenue 1,000 GPM Pump
Head (ft)
200
180
160
140
120
100
80
60
40
20
0
0
500
1,000
1,500
2,000
2,500
Flow (gpm)

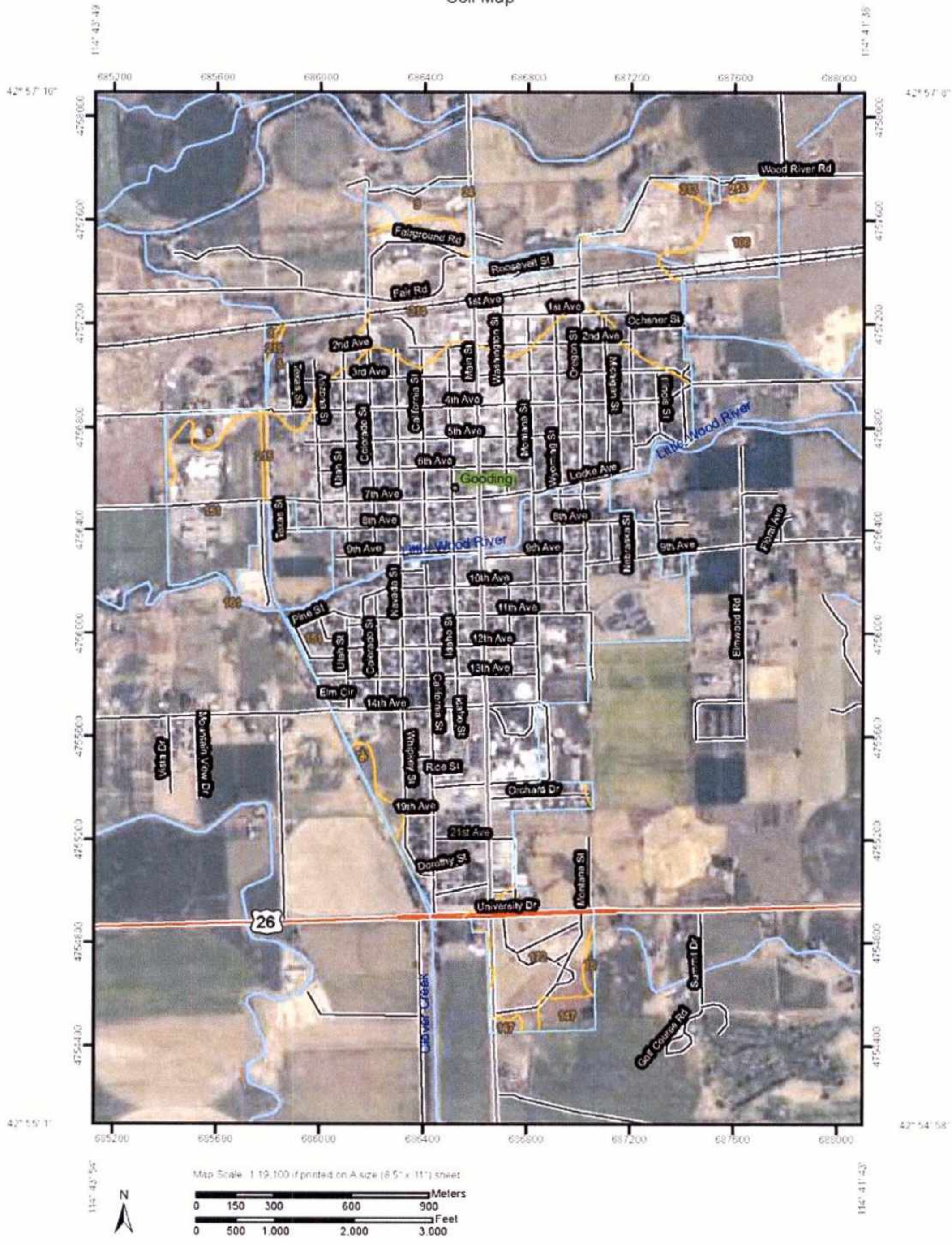

4th Avenue 500 GPM Pump
Head (ft)
200
180
160
140
120
100
80
60
40
20
0
0
200
400
600
800
1,000
1,200
Flow (gpm)


Senior Booster
Head (ft)
200
180
160
140
120
100
80
60
40
20
0
0
500
1,000
1,500
2,000
2,500
Flow (gpm)


13th Avenue Well Pump
Head (ft)
160
140
120
100
80
60
40
20
0
0
500
1,000
1,500
2,000
2,500
Flow (gpm)

Appendix B NRCS Soil Survey

Custom Soil Resource Report
Soil Map



Custom Soil Resource Report

MAP LEGEND

Area of Interest (AOI)
- Area of Interest (AOI)

Soils
- Soil Map Units

Special Point Features
- Blowout
- Borrow Pit
- Clay Spot
- Closed Depression
- Gravel Pit
- Gravelly Spot
- Landfill
- Lava Flow
- Marsh or swamp
- Mine or Quarry
- Miscellaneous Water
- Perennial Water
- Rock Outcrop
- Saline Spot
- Sandy Spot
- Severely Eroded Spot
- Sinkhole
- Slide or Slip
- Sodic Spot
- Spoil Area
- Stony Spot
- Very Stony Spot
- Wet Spot
- Other

Special Line Features
- Gully
- Short Steep Slope
- Other

Political Features
- Cities

Water Features
- Streams and Canals

Transportation
- Rails
- Interstate Highways
- US Routes
- Major Roads
- Local Roads

MAP INFORMATION

Map Scale: 1:19,100 if printed on A size (8.5" × 11") sheet.

The soil surveys that comprise your AOI were mapped at 1:24,000.

Please rely on the bar scale on each map sheet for accurate map measurements.

Source of Map: Natural Resources Conservation Service
Web Soil Survey URL: http://websoilsurvey.nrcs.usda.gov
Coordinate System: UTM Zone 11N NAD83

This product is generated from the USDA-NRCS certified data as of the version date(s) listed below.

Soil Survey Area: Wood River Area, Idaho, Gooding County and Parts of Blaine, Lincoln, and Minidoka Counties
Survey Area Data: Version 9, Aug 26, 2010

Date(s) aerial images were photographed: 9/9/2004

The orthophoto or other base map on which the soil lines were compiled and digitized probably differs from the background imagery displayed on these maps. As a result, some minor shifting of map unit boundaries may be evident.

Map Unit Legend

Wood River Area, Idaho, Gooding County and Parts of Blaine, Lincoln, and Minidoka Counties (ID681)			
Map Unit Symbol	Map Unit Name	Acres in AOI	Percent of AOI
3	Ackelton-Jestrick-Rock outcrop complex, 2 to 12 percent slopes	51.5	5.7%
24	Burch-Quencheroo-Dryck complex, 0 to 2 percent slopes	0.0	0.0%
76	Harsan-Schnipper complex, 1 to 4 percent slopes	6.9	0.8%
106	Lava flows-Lithic Torriorthents complex, 2 to 8 percent slopes	27.1	3.0%
147	Power silt loam, 0 to 3 percent slopes	8.5	0.9%
151	Quencheroo-Loupence complex, 0 to 1 percent slopes	624.3	69.3%
161	Schnipper-Bruncan complex, 2 to 8 percent slopes	0.0	0.0%
172	Snowmore-Idow-Bruncan complex, 2 to 8 percent slopes	41.3	4.6%
213	Wendell-Wako-Ackelton complex, 2 to 8 percent slopes	6.1	0.7%
214	Wendell-Wako-Rekima complex 1 to 4 percent slopes	132.2	14.7%
215	Water	2.3	0.3%
Totals for Area of Interest		**900.3**	**100.0%**

Appendix C Water Quality Records

Drinking Water Branch

Sample Schedules

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989

TCR Schedules

Sample Count	Sample Type	Sample Frequency	Effective Begin Date	Effective End Date	Seasonal Start MM/DD	Seasonal End MM/DD	Analyte Code	Analyte Name
3	RT	MN	11-01-2009		1/1	12/31	3100	COLIFORM (TCR)

Total Number of Records Fetched = 1

Facility Analyte Field Sample Schedules

Water System Facility State Asgn ID	Water System Facility Name	Analyte Code	Analyte Name	Days to Monitor per month	Samples Required per day	Effective Begin Date	Effective End Date	Summary Type

Total Number of Records Fetched = 0

Non-TCR Group Schedules

Water System Facility State Asgn ID	Water System Facility Name	Analyte Group Code	Analyte Group Name	Sample Count	Sample Type	Sample Frequency	Effective Begin Date	Effective End Date
A0004271	SENIOR AVE WELL	SODI	IOC - SODIUM	1	RT	3Y	01-01-2008	
A0004271	SENIOR AVE WELL	ZIOC	IOCS - PHASE 2 AND 5	1	RT	9Y	01-01-2002	
A0004271	SENIOR AVE WELL	ZNO3	NITRATE	1	RT	YR	01-01-2000	
A0004271	SENIOR AVE WELL	ZNO2	NITRITE	1	RT	9Y	01-01-2005	
A0004271	SENIOR AVE WELL	ALFA	RADS - GROSS ALPHA	1	RT	6Y	01-01-2008	
A0004271	SENIOR AVE WELL	R6&8	RADS - R 226 & 228	1	RT	9Y	01-01-2008	
A0004271	SENIOR AVE WELL	R226	RADS - RADIUM	1	RT	9Y	01-01-2008	

			226					
A0004271	SENIOR AVE WELL	R228	RADS - RADIUM 228	1	RT	9Y	01-01-2008	
A0004271	SENIOR AVE WELL	URAN	RADS - URANIUM	1	RT	6Y	01-01-2008	
A0004271	SENIOR AVE WELL	VOCS	VOCS - GROUP	1	RT	6Y	01-01-2011	
A0004273	13TH & NEVADA	SODI	IOC - SODIUM	1	RT	3Y	01-01-2008	
A0004273	13TH & NEVADA	ZIOC	IOCS - PHASE 2 AND 5	1	RT	9Y	01-01-2002	
A0004273	13TH & NEVADA	ZNO3	NITRATE	1	RT	YR	01-01-2000	
A0004273	13TH & NEVADA	ZNO2	NITRITE	1	RT	9Y	01-01-2005	
A0004273	13TH & NEVADA	ALFA	RADS - GROSS ALPHA	1	RT	6Y	01-01-2008	
A0004273	13TH & NEVADA	R6&8	RADS - R 226 & 228	1	RT	9Y	01-01-2008	
A0004273	13TH & NEVADA	R226	RADS - RADIUM 226	1	RT	9Y	01-01-2008	
A0004273	13TH & NEVADA	R228	RADS - RADIUM 228	1	RT	9Y	01-01-2008	
A0004273	13TH & NEVADA	URAN	RADS - URANIUM	1	RT	6Y	01-01-2008	
A0004273	13TH & NEVADA	VOCS	VOCS - GROUP	1	RT	6Y	01-01-2011	
E0008011	4TH & WASHINGTON	SODI	IOC - SODIUM	1	RT	3Y	01-01-2008	
E0008011	4TH & WASHINGTON	ZIOC	IOCS - PHASE 2 AND 5	1	RT	9Y	01-01-2011	
E0008011	4TH & WASHINGTON	ZNO3	NITRATE	1	RT	YR	01-01-2000	
E0008011	4TH & WASHINGTON	ZNO2	NITRITE	1	RT	9Y	01-01-2005	
E0008011	4TH & WASHINGTON	ALFA	RADS - GROSS ALPHA	1	RT	6Y	01-01-2008	
E0008011	4TH & WASHINGTON	R6&8	RADS - R 226 & 228	1	RT	3Y	01-01-2008	
E0008011	4TH & WASHINGTON	R226	RADS - RADIUM 226	1	RT	3Y	01-01-2008	
E0008011	4TH & WASHINGTON	R228	RADS - RADIUM 228	1	RT	3Y	01-01-2008	
E0008011	4TH & WASHINGTON	URAN	RADS - URANIUM	1	RT	6Y	01-01-2008	

E0008011	4TH & WASHINGTON	VOCS	VOCS - GROUP	1	RT	6Y	01-01-2011	
T5240009DS1	DISTRIBUTION SYSTEM	ZDBP	DBP - TTHM AND HAA5	2	RT	YR	01-01-2004	
T5240009DS1	DISTRIBUTION SYSTEM	PBCU	LCR - LEAD COPPER	10	RT	3Y	01-01-1996	

Total Number of Records Fetched = 32

Non-TCR Individual Schedules

Water System Facility State Asgn ID	Water System Facility Name	Analyte Code	Analyte Name	Sample Count	Sample Type	Sample Frequency	Effective Begin Date	Effective End Date
A0004271	SENIOR AVE WELL	1005	ARSENIC	1	RT	9Y	01-01-2011	
A0004271	SENIOR AVE WELL	1025	FLUORIDE	1	RT	9Y	01-01-2011	
A0004273	13TH & NEVADA	1005	ARSENIC	1	RT	9Y	01-01-2011	
A0004273	13TH & NEVADA	1025	FLUORIDE	1	RT	9Y	01-01-2011	
E0008011	4TH & WASHINGTON	1005	ARSENIC	1	RT	9Y	01-01-2011	
E0008011	4TH & WASHINGTON	1025	FLUORIDE	1	RT	9Y	01-01-2011	

Total Number of Records Fetched = 6

Coliform Sample Results

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989

Type	Lab Sample No.	Collection Date & Time	Sampling Point	Sample Location	Presence/Absence Indicator	Analyte Code	Analyte Name	Monitoring Period Begin Date	Monitoring Period End Date	Laboratory
RT	3011118991	10-18-2012	1	GENERIC	A	3100	COLIFORM (TCR)	10-01-2012	10-31-2012	MAGIC VALLEY

		09:00:00		SAMPLING POI						LABS TWIN FALLS
RT	3011117041	10-10-2012 09:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	10-01-2012	10-31-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011114571	10-01-2012 09:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	10-01-2012	10-31-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011113121	09-26-2012 09:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	09-01-2012	09-30-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011111081	09-18-2012 09:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	09-01-2012	09-30-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011109121	09-12-2012 09:45:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	09-01-2012	09-30-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011107921	09-07-2012 09:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	09-01-2012	09-30-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011104121	08-21-2012 09:15:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	08-01-2012	08-31-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011102551	08-15-2012 10:45:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	08-01-2012	08-31-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011100611	08-08-2012 09:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	08-01-2012	08-31-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011098931	08-01-2012 11:15:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	08-01-2012	08-31-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011097321	07-24-2012	1	GENERIC	A	3100	COLIFORM (TCR)	07-01-2012	07-31-2012	MAGIC VALLEY

		09:45:00		SAMPLI NG POI						LABS TWIN FALLS
RT	3011096461	07-19-2012 11:45:00	1	GENERIC SAMPLI NG POI	A	3100	COLIFORM (TCR)	07-01-2012	07-31-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011092011	07-02-2012 13:45:00	1	GENERIC SAMPLI NG POI	A	3100	COLIFORM (TCR)	07-01-2012	07-31-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011088821	06-19-2012 09:00:00	1	GENERIC SAMPLI NG POI	A	3100	COLIFORM (TCR)	06-01-2012	06-30-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011087571	06-13-2012 13:30:00	1	GENERIC SAMPLI NG POI	A	3100	COLIFORM (TCR)	06-01-2012	06-30-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011085791	06-06-2012 09:30:00	1	GENERIC SAMPLI NG POI	A	3100	COLIFORM (TCR)	06-01-2012	06-30-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011084471	05-31-2012 09:15:00	1	GENERIC SAMPLI NG POI	A	3100	COLIFORM (TCR)	05-01-2012	05-31-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011083611	05-24-2012 09:15:00	1	GENERIC SAMPLI NG POI	A	3100	COLIFORM (TCR)	05-01-2012	05-31-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011081271	05-15-2012 09:15:00	1	GENERIC SAMPLI NG POI	A	3100	COLIFORM (TCR)	05-01-2012	05-31-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011079981	05-09-2012 09:00:00	1	GENERIC SAMPLI NG POI	A	3100	COLIFORM (TCR)	05-01-2012	05-31-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011077061	04-25-2012 09:00:00	1	GENERIC SAMPLI NG POI	A	3100	COLIFORM (TCR)	04-01-2012	04-30-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011076181	04-19-2012	1	GENERIC	A	3100	COLIFORM (TCR)	04-01-2012	04-30-2012	MAGIC VALLEY

		10:30:00		SAMPLING POI						LABS TWIN FALLS
RT	3011074601	04-12-2012 09:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	04-01-2012	04-30-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011072551	04-03-2012 09:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	04-01-2012	04-30-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011071591	03-28-2012 09:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	03-01-2012	03-31-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011070021	03-20-2012 09:15:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	03-01-2012	03-31-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011068751	03-14-2012 09:10:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	03-01-2012	03-31-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011066471	03-05-2012 09:15:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	03-01-2011	03-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	3011065941	03-01-2012 10:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	03-01-2012	03-31-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011064531	02-22-2012 09:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	02-01-2012	02-29-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011062721	02-13-2012 10:45:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	02-01-2012	02-29-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011062101	02-09-2012 15:35:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	02-01-2012	02-29-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011060481	02-02-2012	1	GENERIC	A	3100	COLIFORM (TCR)	02-01-2012	02-29-2012	MAGIC VALLEY

		11:00:00		SAMPLING POI						LABS TWIN FALLS
RT	3011058341	01-25-2012 08:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	01-01-2012	01-31-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011057311	01-19-2012 09:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	01-01-2012	01-31-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011055091	01-10-2012 09:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	01-01-2012	01-31-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011053191	01-03-2012 11:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	01-01-2012	01-31-2012	MAGIC VALLEY LABS TWIN FALLS
RT	3011052391	12-28-2011 10:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	12-01-2011	12-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	3011051461	12-21-2011 09:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	12-01-2011	12-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	3011049711	12-14-2011 10:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	12-01-2011	12-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	3011047491	12-07-2011 09:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	12-01-2011	12-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	3011046311	11-29-2011 11:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	11-01-2011	11-30-2011	MAGIC VALLEY LABS TWIN FALLS
RT	3011045121	11-21-2011 10:20:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	11-01-2011	11-30-2011	MAGIC VALLEY LABS TWIN FALLS
RT	3011044501	11-16-2011	1	GENERIC	A	3100	COLIFORM (TCR)	11-01-2011	11-30-2011	MAGIC VALLEY

		09:15:00		SAMPLI NG POI						LABS TWIN FALLS
RT	30110426 11	11-08-2011 10:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	11-01-2011	11-30-2011	MAGIC VALLEY LABS TWIN FALLS
RT	30110415 71	11-03-2011 09:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	11-01-2011	11-30-2011	MAGIC VALLEY LABS TWIN FALLS
RT	30110392 51	10-24-2011 11:15:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	10-01-2011	10-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	30110385 61	10-19-2011 09:15:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	10-01-2011	10-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	30110368 31	10-11-2011 10:45:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	10-01-2011	10-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	30110352 71	10-05-2011 09:00:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	10-01-2011	10-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	30110326 11	09-22-2011 10:45:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	09-01-2011	09-30-2011	MAGIC VALLEY LABS TWIN FALLS
RT	30110303 91	09-15-2011 09:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	09-01-2011	09-30-2011	MAGIC VALLEY LABS TWIN FALLS
RT	30110273 71	09-07-2011 11:00:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	09-01-2011	09-30-2011	MAGIC VALLEY LABS TWIN FALLS
RT	30110255 11	08-29-2011 15:40:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	08-01-2011	08-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	30110219 01	08-10-2011	1	GENERI C	A	3100	COLIFOR M (TCR)	08-01-2011	08-31-2011	MAGIC VALLEY

		09:15:00		SAMPLI NG POI						LABS TWIN FALLS
RT	30110209 01	08-04-2011 13:45:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	08-01-2011	08-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	30110183 21	07-25-2011 09:15:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	07-01-2011	07-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	30110157 81	07-14-2011 10:15:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	07-01-2011	07-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	30110135 71	07-06-2011 14:00:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	07-01-2011	07-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	30110115 41	06-27-2011 11:00:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	06-01-2011	06-30-2011	MAGIC VALLEY LABS TWIN FALLS
RT	30110091 71	06-20-2011 10:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	06-01-2011	06-30-2011	MAGIC VALLEY LABS TWIN FALLS
RT	30110073 81	06-09-2011 09:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	06-01-2011	06-30-2011	MAGIC VALLEY LABS TWIN FALLS
RT	30110053 01	06-01-2011 09:00:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	06-01-2011	06-30-2011	MAGIC VALLEY LABS TWIN FALLS
RT	30110047 21	05-26-2011 09:00:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	05-01-2011	05-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	30110027 81	05-18-2011 09:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	05-01-2011	05-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	30110016 11	05-12-2011	1	GENERI C	A	3100	COLIFOR M (TCR)	05-01-2011	05-31-2011	MAGIC VALLEY

		13:30:00		SAMPLING POI						LABS TWIN FALLS
RT	301999951	05-05-2011 09:15:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	05-01-2011	05-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	301998171	04-27-2011 09:15:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	04-01-2011	04-30-2011	MAGIC VALLEY LABS TWIN FALLS
RT	301996431	04-18-2011 14:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	04-01-2011	04-30-2011	MAGIC VALLEY LABS TWIN FALLS
RT	301995421	04-12-2011 09:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	04-01-2011	04-30-2011	MAGIC VALLEY LABS TWIN FALLS
RT	301994691	04-06-2011 09:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	04-01-2011	04-30-2011	MAGIC VALLEY LABS TWIN FALLS
RT	301993061	03-30-2011 11:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	03-01-2011	03-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	301991891	03-23-2011 11:15:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	03-01-2011	03-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	301990631	03-16-2011 09:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	03-01-2011	03-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	301989381	03-10-2011 10:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	03-01-2011	03-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	301987891	03-02-2011 10:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	03-01-2011	03-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	301986791	02-24-2011	1	GENERIC	A	3100	COLIFORM (TCR)	02-01-2011	02-28-2011	MAGIC VALLEY

		13:15:00		SAMPLING POI						LABS TWIN FALLS
RT	301985591	02-16-2011 11:15:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	02-01-2011	02-28-2011	MAGIC VALLEY LABS TWIN FALLS
RT	301983511	02-08-2011 09:15:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	02-01-2011	02-28-2011	MAGIC VALLEY LABS TWIN FALLS
RT	301982591	02-03-2011 09:15:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	02-01-2011	02-28-2011	MAGIC VALLEY LABS TWIN FALLS
RT	301980871	01-26-2011 09:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	01-01-2011	01-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	301978991	01-18-2011 09:15:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	01-01-2011	01-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	301977681	01-11-2011 10:45:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	01-01-2011	01-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	301976041	01-06-2011 09:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	01-01-2011	01-31-2011	MAGIC VALLEY LABS TWIN FALLS
RT	312972801	12-20-2010 10:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	12-01-2010	12-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	312971571	12-14-2010 10:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	12-01-2010	12-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	312970151	12-08-2010 09:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	12-01-2010	12-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	312968761	11-30-2010	1	GENERIC	A	3100	COLIFORM (TCR)	11-01-2010	11-30-2010	MAGIC VALLEY

		09:15:00		SAMPLING POI						LABS TWIN FALLS
RT	311967071	11-16-2010 09:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	11-01-2010	11-30-2010	MAGIC VALLEY LABS TWIN FALLS
RT	311964691	11-03-2010 09:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	11-01-2010	11-30-2010	MAGIC VALLEY LABS TWIN FALLS
RT	310961371	10-19-2010 10:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	10-01-2010	10-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	310959871	10-13-2010 13:45:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	10-01-2010	10-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	310958751	10-07-2010 09:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	10-01-2010	10-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	309953741	09-21-2010 10:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	09-01-2010	09-30-2010	MAGIC VALLEY LABS TWIN FALLS
RT	309952531	09-15-2010 09:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	09-01-2010	09-30-2010	MAGIC VALLEY LABS TWIN FALLS
RT	309950121	09-08-2010 09:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	09-01-2010	09-30-2010	MAGIC VALLEY LABS TWIN FALLS
RT	309949251	09-02-2010 10:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	09-01-2010	09-30-2010	MAGIC VALLEY LABS TWIN FALLS
RT	308947691	08-26-2010 11:45:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	08-01-2010	08-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	308946341	08-19-2010	1	GENERIC	A	3100	COLIFORM (TCR)	08-01-2010	08-31-2010	MAGIC VALLEY

		10:30:00		SAMPLING POI						LABS TWIN FALLS
RT	308944261	08-12-2010 09:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	08-01-2010	08-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	308941851	08-04-2010 14:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	08-01-2010	08-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	307940411	07-28-2010 09:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	07-01-2010	07-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	307939071	07-23-2010 09:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	07-01-2010	07-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	307935631	07-08-2010 11:15:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	07-01-2010	07-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	307934241	07-01-2010 07:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	07-01-2010	07-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	306932451	06-24-2010 09:15:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	06-01-2010	06-30-2010	MAGIC VALLEY LABS TWIN FALLS
RT	306930821	06-16-2010 09:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	06-01-2010	06-30-2010	MAGIC VALLEY LABS TWIN FALLS
RT	306929001	06-10-2010 09:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	06-01-2010	06-30-2010	MAGIC VALLEY LABS TWIN FALLS
RT	306927311	06-03-2010 09:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	06-01-2010	06-30-2010	MAGIC VALLEY LABS TWIN FALLS
RT	305925201	05-24-2010	1	GENERIC	A	3100	COLIFORM (TCR)	05-01-2010	05-31-2010	MAGIC VALLEY

		09:30:00		SAMPLI NG POI						LABS TWIN FALLS
RT	30592307 1	05-13-2010 09:00:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	05-01-2010	05-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	30592134 1	05-06-2010 10:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	05-01-2010	05-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	30491967 1	04-29-2010 09:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	04-01-2010	04-30-2010	MAGIC VALLEY LABS TWIN FALLS
RT	30491851 1	04-22-2010 10:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	04-01-2010	04-30-2010	MAGIC VALLEY LABS TWIN FALLS
RT	30491678 1	04-14-2010 14:00:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	04-01-2010	04-30-2010	MAGIC VALLEY LABS TWIN FALLS
RT	30491577 1	04-08-2010 10:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	04-01-2010	04-30-2010	MAGIC VALLEY LABS TWIN FALLS
RT	30491409 1	03-31-2010 09:15:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	03-01-2010	03-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	30391332 1	03-25-2010 09:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	03-01-2010	03-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	30391207 1	03-18-2010 08:45:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	03-01-2010	03-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	30391103 1	03-11-2010 09:15:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	03-01-2010	03-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	30390945 1	03-04-2010	1	GENERI C	A	3100	COLIFOR M (TCR)	03-01-2010	03-31-2010	MAGIC VALLEY

		11:00:00		SAMPLING POI						LABS TWIN FALLS
RT	302907061	02-24-2010 11:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	02-01-2010	02-28-2010	MAGIC VALLEY LABS TWIN FALLS
RT	302904851	02-17-2010 09:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	02-01-2010	02-28-2010	MAGIC VALLEY LABS TWIN FALLS
RT	301903981	02-11-2010 15:15:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	02-01-2010	02-28-2010	MAGIC VALLEY LABS TWIN FALLS
RT	301900931	02-02-2010 10:20:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	02-01-2010	02-28-2010	MAGIC VALLEY LABS TWIN FALLS
RT	301899421	01-26-2010 10:25:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	01-01-2010	01-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	301897371	01-19-2010 09:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	01-01-2010	01-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	301895331	01-11-2010 08:45:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	01-01-2010	01-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	301894911	01-07-2010 11:05:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	01-01-2010	01-31-2010	MAGIC VALLEY LABS TWIN FALLS
RT	312893141	12-29-2009 09:15:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	12-01-2009	12-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	312892041	12-21-2009 09:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	12-01-2009	12-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	312891531	12-17-2009	1	GENERIC	A	3100	COLIFORM (TCR)	12-01-2009	12-31-2009	MAGIC VALLEY

		09:20:00		SAMPLING POI						LABS TWIN FALLS
RT	312890461	12-10-2009 09:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	12-01-2009	12-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	312888741	12-02-2009 10:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	12-01-2009	12-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	311886641	11-23-2009 11:15:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	11-01-2009	11-30-2009	MAGIC VALLEY LABS TWIN FALLS
RT	311885801	11-18-2009 10:15:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	11-01-2009	11-30-2009	MAGIC VALLEY LABS TWIN FALLS
RT	311884481	11-12-2009 10:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	11-01-2009	11-30-2009	MAGIC VALLEY LABS TWIN FALLS
RT	311882451	11-03-2009 09:00:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	11-01-2009	11-30-2009	MAGIC VALLEY LABS TWIN FALLS
RT	310879801	10-21-2009 09:15:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	10-01-2009	10-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	310878241	10-14-2009 09:15:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	10-01-2009	10-31-2009	MAGIC VALLEY LABS TWIN FALLS
RP	310875971	10-05-2009 13:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	09-01-2009	09-30-2009	MAGIC VALLEY LABS TWIN FALLS
RP	310875981	10-05-2009 13:30:00	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	09-01-2009	09-30-2009	MAGIC VALLEY LABS TWIN FALLS
RP	310875991	10-05-2009	1	GENERIC	A	3100	COLIFORM (TCR)	09-01-2009	09-30-2009	MAGIC VALLEY

		13:45:00		SAMPLI NG POI						LABS TWIN FALLS
RP	31087600 1	10-05- 2009 13:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	09-01-2009	09-30-2009	MAGIC VALLEY LABS TWIN FALLS
RT	31087502 1*	09-30- 2009 09:30:00	1	GENERI C SAMPLI NG POI	P	3100	COLIFOR M (TCR)	09-01-2009	09-30-2009	MAGIC VALLEY LABS TWIN FALLS
RT	31087502 1*	09-30- 2009 09:30:00	1	GENERI C SAMPLI NG POI	A	3014	E. COLI	09-01-2009	09-30-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30987303 1	09-22- 2009 09:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	09-01-2009	09-30-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30987222 1	09-17- 2009 11:00:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	09-01-2009	09-30-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30987118 1	09-14- 2009 15:00:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	09-01-2009	09-30-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30886670 1	08-31- 2009 09:00:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	08-01-2009	08-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30886566 1	08-25- 2009 09:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	08-01-2009	08-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30886294 1	08-17- 2009 09:15:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	08-01-2009	08-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30886245 1	08-13- 2009 09:00:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	08-01-2009	08-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30886061 1	08-06- 2009	1	GENERI C	A	3100	COLIFOR M (TCR)	08-01-2009	08-31-2009	MAGIC VALLEY

		13:30:00		SAMPLI NG POI						LABS TWIN FALLS
RT	30785873 1	07-30-2009 09:00:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	07-01-2009	07-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30785625 1	07-21-2009 11:00:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	07-01-2009	07-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30785499 1	07-15-2009 13:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	07-01-2009	07-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30785382 1	07-09-2009 09:00:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	07-01-2009	07-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30785176 1	07-01-2009 09:00:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	07-01-2009	07-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30685013 1	06-24-2009 09:15:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	06-01-2009	06-30-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30684858 1	06-17-2009 10:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	06-01-2009	06-30-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30684695 1	06-10-2009 09:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	06-01-2009	06-30-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30584334 1	05-28-2009 09:15:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	05-01-2009	05-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30584164 1	05-20-2009 09:15:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	05-01-2009	05-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30584064 1	05-14-2009	1	GENERI C	A	3100	COLIFOR M (TCR)	05-01-2009	05-31-2009	MAGIC VALLEY

		10:30:00		SAMPLI NG POI						LABS TWIN FALLS
RT	30583899 1	05-07-2009 11:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	05-01-2009	05-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30583723 1	04-30-2009 09:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	04-01-2009	04-30-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30483603 1	04-23-2009 13:00:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	04-01-2009	04-30-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30483397 1	04-13-2009 11:10:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	04-01-2009	04-30-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30483330 1	04-09-2009 09:10:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	04-01-2009	04-30-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30383075 1	03-30-2009 09:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	03-01-2009	03-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30383046 1	03-27-2009 09:00:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	03-01-2009	03-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30382793 1	03-16-2009 10:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	03-01-2009	03-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30382717 1	03-11-2009 09:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	03-01-2009	03-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30282467 1	02-26-2009 10:30:00	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	02-01-2009	02-28-2009	MAGIC VALLEY LABS TWIN FALLS
RT	30282291 1	02-18-2009	1	GENERI C	A	3100	COLIFOR M (TCR)	02-01-2009	02-28-2009	MAGIC VALLEY

		null		SAMPLING POI						LABS TWIN FALLS
RT	302820911	02-09-2009 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	02-01-2009	02-28-2009	MAGIC VALLEY LABS TWIN FALLS
RT	302820481	02-05-2009 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	02-01-2009	02-28-2009	MAGIC VALLEY LABS TWIN FALLS
RT	301818471	01-27-2009 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	01-01-2009	01-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	301816651	01-20-2009 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	01-01-2009	01-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	301815191	01-13-2009 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	01-01-2009	01-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	301813371	01-06-2009 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	01-01-2009	01-31-2009	MAGIC VALLEY LABS TWIN FALLS
RT	312811971	12-29-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	12-01-2008	12-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	312811441	12-23-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	12-01-2008	12-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	312810701	12-16-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	12-01-2008	12-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	312809671	12-11-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	12-01-2008	12-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	312807591	12-02-2008	1	GENERIC	A	3100	COLIFORM (TCR)	12-01-2008	12-31-2008	MAGIC VALLEY

		null		SAMPLI NG POI						LABS TWIN FALLS
RT	31180665 1	11-25-2008 null	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	11-01-2008	11-30-2008	MAGIC VALLEY LABS TWIN FALLS
RT	31180496 1	11-18-2008 null	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	11-01-2008	11-30-2008	MAGIC VALLEY LABS TWIN FALLS
RP	31180394 1	11-13-2008 null	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	11-01-2008	11-30-2008	MAGIC VALLEY LABS TWIN FALLS
RP	31180395 1	11-13-2008 null	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	11-01-2008	11-30-2008	MAGIC VALLEY LABS TWIN FALLS
RP	31180396 1	11-13-2008 null	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	11-01-2008	11-30-2008	MAGIC VALLEY LABS TWIN FALLS
RP	31180397 1	11-13-2008 null	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	11-01-2008	11-30-2008	MAGIC VALLEY LABS TWIN FALLS
RT	31180223 1*	11-05-2008 null	1	GENERI C SAMPLI NG POI	P	3100	COLIFOR M (TCR)	11-01-2008	11-30-2008	MAGIC VALLEY LABS TWIN FALLS
RT	31180223 1*	11-05-2008 null	1	GENERI C SAMPLI NG POI	A	3014	E. COLI	11-01-2008	11-30-2008	MAGIC VALLEY LABS TWIN FALLS
RT	31080054 1	10-29-2008 null	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	10-01-2008	10-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	31079897 1	10-21-2008 null	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	10-01-2008	10-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	31079766 1	10-14-2008	1	GENERI C	A	3100	COLIFOR M (TCR)	10-01-2008	10-31-2008	MAGIC VALLEY

		null		SAMPLING POI						LABS TWIN FALLS
RT	310796741	10-08-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	10-01-2008	10-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	310794791	10-01-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	10-01-2008	10-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	309793491	09-25-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	09-01-2008	09-30-2008	MAGIC VALLEY LABS TWIN FALLS
RT	309790891	09-15-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	09-01-2008	09-30-2008	MAGIC VALLEY LABS TWIN FALLS
RP	309789871	09-10-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	09-01-2008	09-30-2008	MAGIC VALLEY LABS TWIN FALLS
RP	309789881	09-10-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	09-01-2008	09-30-2008	MAGIC VALLEY LABS TWIN FALLS
RP	309789891	09-10-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	09-01-2008	09-30-2008	MAGIC VALLEY LABS TWIN FALLS
RP	309789901	09-10-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	09-01-2008	09-30-2008	MAGIC VALLEY LABS TWIN FALLS
RT	309788671*	09-08-2008 null	1	GENERIC SAMPLING POI	P	3100	COLIFORM (TCR)	09-01-2008	09-30-2008	MAGIC VALLEY LABS TWIN FALLS
RT	309788671*	09-08-2008 null	1	GENERIC SAMPLING POI	A	3014	E. COLI	09-01-2008	09-30-2008	MAGIC VALLEY LABS TWIN FALLS
RT	309787381	09-02-2008	1	GENERIC	A	3100	COLIFORM (TCR)	09-01-2008	09-30-2008	MAGIC VALLEY

		null		SAMPLING POI						LABS TWIN FALLS
RT	308785701	08-25-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	08-01-2008	08-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	308783751	08-18-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	08-01-2008	08-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	308781851	08-11-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	08-01-2008	08-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	308779851	08-04-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	08-01-2008	08-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	307779081	07-29-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	07-01-2008	07-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	307777181	07-21-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	07-01-2008	07-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	307776951	07-18-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	07-01-2008	07-31-2008	MAGIC VALLEY LABS TWIN FALLS
RP	307774821	07-10-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	07-01-2008	07-31-2008	MAGIC VALLEY LABS TWIN FALLS
RP	307774831	07-10-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	07-01-2008	07-31-2008	MAGIC VALLEY LABS TWIN FALLS
RP	307774841	07-10-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	07-01-2008	07-31-2008	MAGIC VALLEY LABS TWIN FALLS
RP	307774851	07-10-2008	1	GENERIC	A	3100	COLIFORM (TCR)	07-01-2008	07-31-2008	MAGIC VALLEY

		null		SAMPLING POI						LABS TWIN FALLS
RT	307773471*	07-07-2008 null	1	GENERIC SAMPLING POI	P	3100	COLIFORM (TCR)	07-01-2008	07-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	307773471*	07-07-2008 null	1	GENERIC SAMPLING POI	A	3014	E. COLI	07-01-2008	07-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	307772391	06-30-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	06-01-2008	06-30-2008	MAGIC VALLEY LABS TWIN FALLS
RT	306769501	06-17-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	06-01-2008	06-30-2008	MAGIC VALLEY LABS TWIN FALLS
RT	306767611	06-09-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	06-01-2008	06-30-2008	MAGIC VALLEY LABS TWIN FALLS
RT	306766141	06-02-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	06-01-2008	06-30-2008	MAGIC VALLEY LABS TWIN FALLS
RT	305764861	05-27-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	05-01-2008	05-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	305763731	05-20-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	05-01-2008	05-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	305761591	05-12-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	05-01-2008	05-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	305760741	05-07-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	05-01-2008	05-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	304758891	04-28-2008	1	GENERIC	A	3100	COLIFORM (TCR)	04-01-2008	04-30-2008	MAGIC VALLEY

		null		SAMPLING POI						LABS TWIN FALLS
RT	304756611	04-14-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	04-01-2008	04-30-2008	MAGIC VALLEY LABS TWIN FALLS
RT	304755641	04-09-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	04-01-2008	04-30-2008	MAGIC VALLEY LABS TWIN FALLS
RT	304753331	03-31-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	03-01-2008	03-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	303751881	03-24-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	03-01-2008	03-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	303750401	03-17-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	03-01-2008	03-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	303749441	03-12-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	03-01-2008	03-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	303747271	03-03-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	03-01-2008	03-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	302746141	02-26-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	02-01-2008	02-29-2008	MAGIC VALLEY LABS TWIN FALLS
RT	302745081	02-20-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	02-01-2008	02-29-2008	MAGIC VALLEY LABS TWIN FALLS
RT	302742831	02-12-2008 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	02-01-2008	02-29-2008	MAGIC VALLEY LABS TWIN FALLS
RT	302741901	02-07-2008	1	GENERIC	A	3100	COLIFORM (TCR)	02-01-2008	02-29-2008	MAGIC VALLEY

		null		SAMPLI NG POI						LABS TWIN FALLS
RT	30173979 1	01-29-2008 null	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	01-01-2008	01-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	30173835 1	01-22-2008 null	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	01-01-2008	01-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	30173763 1	01-17-2008 null	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	01-01-2008	01-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	30173605 1	01-10-2008 null	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	01-01-2008	01-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	30173444 1	01-02-2008 null	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	01-01-2008	01-31-2008	MAGIC VALLEY LABS TWIN FALLS
RT	31273374 1	12-26-2007 null	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	12-01-2007	12-31-2007	MAGIC VALLEY LABS TWIN FALLS
RT	31273075 1	12-10-2007 null	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	12-01-2007	12-31-2007	MAGIC VALLEY LABS TWIN FALLS
RT	31272922 1	12-03-2007 null	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	12-01-2007	12-31-2007	MAGIC VALLEY LABS TWIN FALLS
RT	31172885 1	11-29-2007 null	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	11-01-2007	11-30-2007	MAGIC VALLEY LABS TWIN FALLS
RT	31172817 1	11-26-2007 null	1	GENERI C SAMPLI NG POI	A	3100	COLIFOR M (TCR)	11-01-2007	11-30-2007	MAGIC VALLEY LABS TWIN FALLS
RT	31172723 1	11-19-2007	1	GENERI C	A	3100	COLIFOR M (TCR)	11-01-2007	11-30-2007	MAGIC VALLEY

		null		SAMPLING POI						LABS TWIN FALLS
RT	311726121	11-13-2007 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	11-01-2007	11-30-2007	MAGIC VALLEY LABS TWIN FALLS
RT	311724541	11-05-2007 null	1	GENERIC SAMPLING POI	A	3100	COLIFORM (TCR)	11-01-2007	11-30-2007	MAGIC VALLEY LABS TWIN FALLS

Total Number of Records Fetched = 256

Drinking Water Branch

Lead and Copper Sample Summary Results

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989

Data Quality Code	Monitoring Period Begin Date	Monitoring Period End Date	Number of Samples	Measure (mg/l)	Water System Facility State Asgn ID No.	Date Summary Received	Analyte
A	01-01-2008	12-31-2010	10	0.200000000	T5240009DS1		Copper
A	01-01-2008	12-31-2010	10	0.001960000	T5240009DS1		Lead
A	01-01-2005	12-31-2007	20	0.320000000	T5240009DS1		Copper
A	01-01-2005	12-31-2007	20	0E-9	T5240009DS1		Lead
A	01-01-2002	12-31-2004	20	0.440000000	T5240009DS1		Copper
A	01-01-2002	12-31-2004	20	0E-9	T5240009DS1		Lead

Total Number of Records Fetched = 6

Non-Coliform Samples

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989

SUMMARY TABLE

Lab Sample No.	Type	Collection Date & Time	Sampling Point	Sample Location	Laboratory
N1140581	RT	08-16-2011 10:50:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
N1140511	RT	08-16-2011 10:30:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
N1140461	RT	08-16-2011 11:10:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
I1140551	RT	08-16-2011 10:50:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
I1140431	RT	08-16-2011 11:10:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
I1140481	RT	08-16-2011 10:30:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
S1140421	RT	08-16-2011 11:10:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
S1140541	RT	08-16-2011 10:50:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
S1140471	RT	08-16-2011 10:30:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
V1140571	RT	08-16-2011 10:50:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
V1140451	RT	08-16-2011 11:10:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
V1140501	RT	08-16-2011 10:30:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
D1140521	RT	08-16-2011	1	GENERIC	MAGIC VALLEY

		11:30:00		SAMPLING POI	LABS TWIN FALLS
D1140531	RT	08-16-2011 11:20:00	1	GENERIC SAMPLING POI	MAGIC VALLEY LABS TWIN FALLS
R1140561	RT	08-16-2011 10:50:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
R1140491	RT	08-16-2011 10:30:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
R1140441	RT	08-16-2011 11:10:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
N1050321	RT	08-26-2010 10:30:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
N1050261	RT	08-26-2010 10:15:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
N1050211	RT	08-26-2010 10:00:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
D1050191	RT	08-26-2010 11:40:00	1	GENERIC SAMPLING POI	MAGIC VALLEY LABS TWIN FALLS
D1050181	RT	08-26-2010 11:25:00	1	GENERIC SAMPLING POI	MAGIC VALLEY LABS TWIN FALLS
V1050311	RT	08-26-2010 10:30:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
V1050271	RT	08-26-2010 10:15:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
V1050221	RT	08-26-2010 10:00:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
I1050301	RT	08-26-2010 10:30:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
I1050251	RT	08-26-2010 10:15:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
I1050201	RT	08-26-2010 10:00:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN

					FALLS
R1050291	RT	08-26-2010 10:30:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
S1050281	RT	08-26-2010 10:30:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
S1050241	RT	08-26-2010 10:15:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
S1050231	RT	08-26-2010 10:00:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
N951711	RT	08-31-2009 09:25:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
N951701	RT	08-31-2009 09:20:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
N951691	RT	08-31-2009 09:15:00	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
D951681	RT	08-31-2009 09:35:00	1	GENERIC SAMPLING POI	MAGIC VALLEY LABS TWIN FALLS
D951671	RT	08-31-2009 09:00:00	1	GENERIC SAMPLING POI	MAGIC VALLEY LABS TWIN FALLS
N88719	RT	12-18-2008 null	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
N88720	RT	12-18-2008 null	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
N88721	RT	12-18-2008 null	1	ENTRY POINT	MAGIC VALLEY LABS TWIN FALLS
D859241	RT	08-28-2008 null	1	GENERIC SAMPLING POI	MAGIC VALLEY LABS TWIN FALLS
D859251	RT	08-28-2008 null	1	GENERIC SAMPLING POI	MAGIC VALLEY LABS TWIN FALLS

Total Number of Records Fetched = 42

Drinking Water Branch

Non-Coliform Sample Results

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	N1140581	**Collection Date :**	08-16-2011

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
1038	NITRATE-NITRITE	null	null		null null	1.65 MG/L		
1040	NITRATE	null	N		0E-9	1.65 MG/L	01-01-2011	12-31-2011
1041	NITRITE	null	Y	MDL	0E-9		01-01-2005	12-31-2013

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	N1140511	**Collection Date :**	08-16-2011

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
1038	NITRATE-NITRITE	null	null		null null	1.65 MG/L		
1040	NITRATE	null	N		0E-9	1.65 MG/L	01-01-2011	12-31-2011
1041	NITRITE	null	Y	MDL	0E-9		01-01-2005	12-31-2013

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	N1140461	**Collection Date :**	08-16-2011

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
1038	NITRATE-NITRITE	null	null		null null	1.66 MG/L		
1040	NITRATE	null	N		0E-9	1.66 MG/L	01-01-2011	12-31-2011

1041	NITRITE	null	Y	MDL	0E-9		01-01-2005	12-31-2013

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	I1140551	**Collection Date :**	08-16-2011

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
1005	ARSENIC	null	N		0E-9	0.00182 MG/L	01-01-2011	12-31-2019
1052	SODIUM	null	N		0E-9	25.6 MG/L	01-01-2011	12-31-2013

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	I1140431	**Collection Date :**	08-16-2011

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
1005	ARSENIC	null	N		0E-9	0.00219 MG/L	01-01-2011	12-31-2019
1052	SODIUM	null	N		0E-9	25.0 MG/L	01-01-2011	12-31-2013

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	I1140481	**Collection Date :**	08-16-2011

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
1005	ARSENIC	null	N		0E-9	0.00212 MG/L	01-01-2011	12-31-2019
1052	SODIUM	null	N		0E-9	26.2 MG/L	01-01-2011	12-31-2013

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	S1140421	**Collection Date :**	08-16-2011

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
2931	1,2-DIBROMO-3-CHLOROPROPANE	null	Y	MDL	0.000020000 MG/L			
2946	ETHYLENE DIBROMIDE	null	Y	MDL	0.000010000 MG/L			

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	S1140541	**Collection Date :**	08-16-2011

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
2931	1,2-DIBROMO-3-CHLOROPROPANE	null	Y	MDL	0.000020000 MG/L			
2946	ETHYLENE DIBROMIDE	null	Y	MDL	0.000010000 MG/L			

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	S1140471	**Collection Date :**	08-16-2011

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
2931	1,2-DIBROMO-3-CHLOROPROPANE	null	Y	MDL	0.000020000 MG/L			
2946	ETHYLENE DIBROMIDE	null	Y	MDL	0.000010000 MG/L			

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	V1140571	**Collection Date :**	08-16-2011

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
2378	1,2,4-TRICHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2380	CIS-1,2-DICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2950	TTHM	null	N		0E-9	2.38 UG/L		
2955	XYLENES, TOTAL	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2964	DICHLOROMETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2968	O-DICHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2969	P-DICHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2976	VINYL CHLORIDE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2977	1,1-DICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2979	TRANS-1,2-DICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2980	1,2-DICHLOROETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2981	1,1,1-TRICHLOROETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2982	CARBON TETRACHLORIDE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2983	1,2-DICHLOROPROPANE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2984	TRICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2985	1,1,2-TRICHLOROETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2987	TETRACHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2989	CHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2990	BENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2991	TOLUENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2992	ETHYLBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2996	STYRENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County	GOODING	**Primary Source :**	GW

Served :			
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	V1140451	**Collection Date :**	08-16-2011

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
2378	1,2,4-TRICHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2380	CIS-1,2-DICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2950	TTHM	null	N		0E-9	5.19 UG/L		
2955	XYLENES, TOTAL	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2964	DICHLOROMETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2968	O-DICHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2969	P-DICHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2976	VINYL CHLORIDE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2977	1,1-DICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2979	TRANS-1,2-DICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2980	1,2-DICHLOROETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2981	1,1,1-TRICHLOROETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2982	CARBON TETRACHLORIDE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2983	1,2-DICHLOROPROPANE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2984	TRICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2985	1,1,2-TRICHLOROETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2987	TETRACHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2989	CHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2990	BENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2991	TOLUENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2992	ETHYLBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2996	STYRENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	V1140501	**Collection Date :**	08-16-2011

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
2378	1,2,4-TRICHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2380	CIS-1,2-DICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2955	XYLENES, TOTAL	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2964	DICHLOROMETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2968	O-DICHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2969	P-DICHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2976	VINYL CHLORIDE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2977	1,1-DICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2979	TRANS-1,2-DICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2980	1,2-DICHLOROETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2981	1,1,1-TRICHLOROETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2982	CARBON TETRACHLORIDE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2983	1,2-DICHLOROPROPANE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2984	TRICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2985	1,1,2-TRICHLOROETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2987	TETRACHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2989	CHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2990	BENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2991	TOLUENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2992	ETHYLBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2011	12-31-2016
2996	STYRENE	null	Y	MDL	0.000500000 M		01-01-2011	12-31-2016

					G/L			

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	D1140521	**Collection Date :**	08-16-2011

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
2456	TOTAL HALOACETIC ACIDS (HAA5)	null	N		0E-9	0.0020 MG/L	01-01-2011	12-31-2011
2950	TTHM	null	N		0E-9	0.00733 MG/L	01-01-2011	12-31-2011

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	D1140531	**Collection Date :**	08-16-2011

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
2456	TOTAL HALOACETIC ACIDS (HAA5)	null	N		0E-9	0.0020 MG/L	01-01-2011	12-31-2011
2950	TTHM	null	N		0E-9	0.00720 MG/L	01-01-2011	12-31-2011

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	R1140561	**Collection Date :**	08-16-2011

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
4000	GROSS ALPHA, EXCL. RADON & U	null	null		null null	1.42 PCI/L	01-01-2008	12-31-2013

4002	GROSS ALPHA, INCL. RADON & U	null	N		0E-9	4.46 PCI/L		
4006	COMBINED URANIUM	null	N		0E-9	4.53 UG/L	01-01-2008	12-31-2013

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	R1140491	**Collection Date :**	08-16-2011

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
4000	GROSS ALPHA, EXCL. RADON & U	null	null		null null	0.14 PCI/L	01-01-2008	12-31-2013
4002	GROSS ALPHA, INCL. RADON & U	null	N		0E-9	3.06 PCI/L		
4006	COMBINED URANIUM	null	N		0E-9	4.36 UG/L	01-01-2008	12-31-2013

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	R1140441	**Collection Date :**	08-16-2011

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
4000	GROSS ALPHA, EXCL. RADON & U	null	null		null null	3.22 PCI/L	01-01-2008	12-31-2013
4002	GROSS ALPHA, INCL. RADON & U	null	N		0E-9	6.85 PCI/L		
4006	COMBINED	null	N		0E-9	5.42 UG/L	01-01-2008	12-31-2013

	URANIUM							
4010	COMBINED RADIUM (-226 & -228)	null	null		null null	0.79 PCI/L	01-01-2011	12-31-2013
4020	RADIUM-226	null	N		0E-9	0.16 PCI/L	01-01-2011	12-31-2013
4030	RADIUM-228	null	N		0E-9	0.63 PCI/L	01-01-2011	12-31-2013

Water System No. :	ID5240009	Federal Type :	C
Water System Name :	GOODING CITY OF	State Type :	C
Principal County Served :	GOODING	Primary Source :	GW
Status :	A	Activity Date :	02-21-1989
Lab Sample No. :	N1050321	Collection Date :	08-26-2010

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
1040	NITRATE	null	N		0E-9	1.76 MG/L	01-01-2010	12-31-2010

Water System No. :	ID5240009	Federal Type :	C
Water System Name :	GOODING CITY OF	State Type :	C
Principal County Served :	GOODING	Primary Source :	GW
Status :	A	Activity Date :	02-21-1989
Lab Sample No. :	N1050261	Collection Date :	08-26-2010

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
1040	NITRATE	null	N		0E-9	2.07 MG/L	01-01-2010	12-31-2010

Water System No. :	ID5240009	Federal Type :	C
Water System Name :	GOODING CITY OF	State Type :	C
Principal County Served :	GOODING	Primary Source :	GW
Status :	A	Activity Date :	02-21-1989
Lab Sample No. :	N1050211	Collection Date :	08-26-2010

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
1040	NITRATE	null	N		0E-9	1.75 MG/L	01-01-2010	12-31-2010

Water System No. :	ID5240009	Federal Type :	C
Water System Name :	GOODING CITY OF	State Type :	C
Principal County Served :	GOODING	Primary Source :	GW
Status :	A	Activity Date :	02-21-1989
Lab Sample No. :	D1050191	Collection Date :	08-26-2010

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
2456	TOTAL HALOACETIC ACIDS (HAA5)	null	N		0E-9	0.0021 MG/L	01-01-2010	12-31-2010
2950	TTHM	null	N		0E-9	0.00866 MG/L	01-01-2010	12-31-2010

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	D1050181	**Collection Date :**	08-26-2010

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
2456	TOTAL HALOACETIC ACIDS (HAA5)	null	N		0E-9	0.00240 MG/L	01-01-2010	12-31-2010
2950	TTHM	null	N		0E-9	0.00763 MG/L	01-01-2010	12-31-2010

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	V1050311	**Collection Date :**	08-26-2010

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
2378	1,2,4-TRICHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2380	CIS-1,2-DICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2955	XYLENES, TOTAL	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2964	DICHLOROMETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2968	O-DICHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010

2969	P-DICHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2976	VINYL CHLORIDE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2977	1,1-DICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2979	TRANS-1,2-DICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2980	1,2-DICHLOROETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2981	1,1,1-TRICHLOROETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2982	CARBON TETRACHLORIDE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2983	1,2-DICHLOROPROPANE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2984	TRICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2985	1,1,2-TRICHLOROETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2987	TETRACHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2989	CHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2990	BENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2991	TOLUENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2992	ETHYLBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2996	STYRENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	V1050271	**Collection Date :**	08-26-2010

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
2378	1,2,4-TRICHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2380	CIS-1,2-DICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2955	XYLENES, TOTAL	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2964	DICHLOROMETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010

2968	O-DICHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2969	P-DICHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2976	VINYL CHLORIDE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2977	1,1-DICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2979	TRANS-1,2-DICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2980	1,2-DICHLOROETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2981	1,1,1-TRICHLOROETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2982	CARBON TETRACHLORIDE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2983	1,2-DICHLOROPROPANE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2984	TRICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2985	1,1,2-TRICHLOROETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2987	TETRACHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2989	CHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2990	BENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2991	TOLUENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2992	ETHYLBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2996	STYRENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	V1050221	**Collection Date :**	08-26-2010

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
2378	1,2,4-TRICHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2380	CIS-1,2-DICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2955	XYLENES, TOTAL	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010

2964	DICHLOROMETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2968	O-DICHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2969	P-DICHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2976	VINYL CHLORIDE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2977	1,1-DICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2979	TRANS-1,2-DICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2980	1,2-DICHLOROETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2981	1,1,1-TRICHLOROETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2982	CARBON TETRACHLORIDE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2983	1,2-DICHLOROPROPANE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2984	TRICHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2985	1,1,2-TRICHLOROETHANE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2987	TETRACHLOROETHYLENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2989	CHLOROBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2990	BENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2991	TOLUENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2992	ETHYLBENZENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010
2996	STYRENE	null	Y	MDL	0.000500000 MG/L		01-01-2008	12-31-2010

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	I1050301	**Collection Date :**	08-26-2010

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
1005	ARSENIC	null	N		0E-9	0.00105 MG/L	01-01-2008	12-31-2010
1052	SODIUM	null	N		0E-9	34.4 MG/L	01-01-2008	12-31-2010

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C

Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	I1050251	**Collection Date :**	08-26-2010

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
1005	ARSENIC	null	N		0E-9	0.00160 MG/L	01-01-2008	12-31-2010
1052	SODIUM	null	N		0E-9	36.8 MG/L	01-01-2008	12-31-2010

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	I1050201	**Collection Date :**	08-26-2010

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
1005	ARSENIC	null	N		0E-9	0.00150 MG/L	01-01-2008	12-31-2010
1052	SODIUM	null	N		0E-9	36.6 MG/L	01-01-2008	12-31-2010

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	R1050291	**Collection Date :**	08-26-2010

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
4010	COMBINED RADIUM (-226 & -228)	null	null		null null	0.46 PCI/L	01-01-2008	12-31-2010
4020	RADIUM-226	null	N		0E-9	0.04 PCI/L	01-01-2008	12-31-2010
4030	RADIUM-228	null	N		0E-9	0.42 PCI/L	01-01-2008	12-31-2010

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	S1050281	**Collection Date :**	08-26-2010

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
2931	1,2-DIBROMO-3-CHLOROPROPANE	null	Y	MDL	0.000020000 MG/L		01-01-2008	12-31-2010
2946	ETHYLENE DIBROMIDE	null	Y	MDL	0.000010000 MG/L		01-01-2008	12-31-2010

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	S1050241	**Collection Date :**	08-26-2010

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
2931	1,2-DIBROMO-3-CHLOROPROPANE	null	Y	MDL	0.000020000 MG/L		01-01-2008	12-31-2010
2946	ETHYLENE DIBROMIDE	null	Y	MDL	0.000010000 MG/L		01-01-2008	12-31-2010

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	S1050231	**Collection Date :**	08-26-2010

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
2931	1,2-DIBROMO-3-CHLOROPROPANE	null	Y	MDL	0.000020000 MG/L		01-01-2008	12-31-2010
2946	ETHYLENE DIBROMIDE	null	Y	MDL	0.000010000 MG/L		01-01-2008	12-31-2010

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	N951711	**Collection Date :**	08-31-2009

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
1040	NITRATE	null	N		0E-9	1.61 MG/L	01-01-2009	12-31-2009

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	N951701	**Collection Date :**	08-31-2009

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
1040	NITRATE	null	N		0E-9	1.91 MG/L	01-01-2009	12-31-2009

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	N951691	**Collection Date :**	08-31-2009

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
1040	NITRATE	null	N		0E-9	1.43 MG/L	01-01-2009	12-31-2009

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	D951681	**Collection Date :**	08-31-2009

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
2456	TOTAL HALOACETIC ACIDS (HAA5)	null	N		0E-9	1.66 UG/L	01-01-2009	12-31-2009
2950	TTHM	null	N		0E-9	9.40 UG/L	01-01-2009	12-31-2009

Water System No. :	ID5240009	**Federal Type :**	C

Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	D951671	**Collection Date :**	08-31-2009

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
2456	TOTAL HALOACETIC ACIDS (HAA5)	null	N		0E-9	1.17 UG/L	01-01-2009	12-31-2009
2950	TTHM	null	N		0E-9	3.30 UG/L	01-01-2009	12-31-2009

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	N88719	**Collection Date :**	12-18-2008

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
1040	NITRATE	null	N		0E-9 MG/L	1.66 MG/L	01-01-2008	12-31-2008

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	N88720	**Collection Date :**	12-18-2008

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
1040	NITRATE	null	N		0E-9 MG/L	1.74 MG/L	01-01-2008	12-31-2008

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	N88721	**Collection Date :**	12-18-2008

Analyte Code	Analyte Name	Method Code	Less than	Level Type	Reporting Level	Concentration level	Monitoring Period	Monitoring Period End

			Indicator				Begin Date	Date
1040	NITRATE	null	N		0E-9 MG/L	1.53 MG/L	01-01-2008	12-31-2008

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	D859241	**Collection Date :**	08-28-2008

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
2456	TOTAL HALOACETIC ACIDS (HAA5)	null	N		0E-9 MG/L	0.00658 MG/L	01-01-2008	12-31-2008
2950	TTHM	null	N		0E-9 MG/L	0.0120 MG/L	01-01-2008	12-31-2008

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989
Lab Sample No. :	D859251	**Collection Date :**	08-28-2008

Analyte Code	Analyte Name	Method Code	Less than Indicator	Level Type	Reporting Level	Concentration level	Monitoring Period Begin Date	Monitoring Period End Date
2456	TOTAL HALOACETIC ACIDS (HAA5)	null	N		0E-9 MG/L	0.00575 MG/L	01-01-2008	12-31-2008
2950	TTHM	null	N		0E-9 MG/L	0.0059 MG/L	01-01-2008	12-31-2008

Drinking Water Branch

Violations

Water System No. :	ID5240009	**Federal Type :**	C
Water System Name :	GOODING CITY OF	**State Type :**	C
Principal County Served :	GOODING	**Primary Source :**	GW
Status :	A	**Activity Date :**	02-21-1989

****<u>Please note</u>: some of these violations may have been resolved and/or returned to compliance. Please click on the violation to view more information on its compliance status.**

Group Violations

Violation No.	Status	Violation Type	Violation Name	Analyte Group Code	Analyte Group Name	Water System Facility State Asgn ID	Water System Facility Name

Total Number of Records Fetched = 0

Individual Violations

Violation No.	Status	Violation Type	Violation Name	Analyte Code	Analyte Name	Water System Facility State Asgn ID	Water System Facility Name
2010-3211	V	27	MONITORING, ROUTINE (DBP), MAJOR	0999	CHLORINE	T5240009DS1	DISTRIBUTION SYSTEM
2010-3210	V	24	MONITORING (TCR), ROUTINE MINOR	3100	COLIFORM (TCR)	null	null
2009-3209	V	27	MONITORING, ROUTINE (DBP), MAJOR	0999	CHLORINE	T5240009DS1	DISTRIBUTION SYSTEM
2008-3108	V	24	MONITORING (TCR), ROUTINE MINOR	3100	COLIFORM (TCR)	null	null
2005-2705	V	27	MONITORING, ROUTINE (DBP), MAJOR	0999	CHLORINE	T5240009DS1	DISTRIBUTION SYSTEM
2005-2605	V	24	MONITORING (TCR), ROUTINE MINOR	3100	COLIFORM (TCR)	null	null
2005-2405	V	27	MONITORING, ROUTINE (DBP), MAJOR	0999	CHLORINE	T5240009DS1	DISTRIBUTION SYSTEM
2005-2505	V	27	MONITORING, ROUTINE (DBP), MAJOR	0999	CHLORINE	T5240009DS1	DISTRIBUTION SYSTEM
2005-2305	V	24	MONITORING (TCR), ROUTINE MINOR	3100	COLIFORM (TCR)	null	null
2003-2203	V	24	MONITORING (TCR), ROUTINE MINOR	3100	COLIFORM (TCR)	null	null
2002-2002	V	24	MONITORING (TCR), ROUTINE MINOR	3100	COLIFORM (TCR)	null	null
2001-1801	V	24	MONITORING (TCR), ROUTINE	3100	COLIFORM (TCR)	null	null

			MINOR				
1999-599	V	03	MONITORING, ROUTINE MAJOR	1040	NITRATE	E0008011	4TH & WASHINGTON
1999-499	V	24	MONITORING (TCR), ROUTINE MINOR	3100	COLIFORM (TCR)	null	null
1998-198	V	24	MONITORING (TCR), ROUTINE MINOR	3100	COLIFORM (TCR)	null	null
1997-797	V	24	MONITORING (TCR), ROUTINE MINOR	3100	COLIFORM (TCR)	null	null
1995-895	V	24	MONITORING (TCR), ROUTINE MINOR	3100	COLIFORM (TCR)	null	null
1995-995	V	24	MONITORING (TCR), ROUTINE MINOR	3100	COLIFORM (TCR)	null	null
1995-1095	V	22	MCL (TCR), MONTHLY	3100	COLIFORM (TCR)	null	null
1994-1194	V	22	MCL (TCR), MONTHLY	3100	COLIFORM (TCR)	null	null
1994-1294	V	24	MONITORING (TCR), ROUTINE MINOR	3100	COLIFORM (TCR)	null	null
1994-1394	V	25	MONITORING (TCR), REPEAT MAJOR	3100	COLIFORM (TCR)	null	null
1993-1493	V	24	MONITORING (TCR), ROUTINE MINOR	3100	COLIFORM (TCR)	null	null
1992-692	V	24	MONITORING (TCR), ROUTINE MINOR	3100	COLIFORM (TCR)	null	null
1991-291	V	24	MONITORING (TCR), ROUTINE MINOR	3100	COLIFORM (TCR)	null	null
1990-390	V	03	MONITORING, ROUTINE MAJOR	3000	COLIFORM (PRE-TCR)	null	null
1980-1680	V	02	MCL, AVERAGE	3000	COLIFORM (PRE-TCR)	null	null
1980-1580	V	02	MCL, AVERAGE	3000	COLIFORM (PRE-TCR)	null	null

Total Number of Records Fetched = 28

Appendix D Endangered Species

United States Department of the Interior

Fish and Wildlife Service

Idaho Fish And Wildlife Office
1387 S. Vinnell Way, Room 368
Boise, Idaho 83709
Telephone (208) 378-5243
http://www.fws.gov/idaho

U.S. Fish and Wildlife Service - Idaho Fish and Wildlife Office
Endangered, Threatened, Proposed, and Candidate Species
With Associated Proposed and Critical Habitats in Idaho

Last Accessed: September 7, 2012

This Letter and Species List

The U.S. Fish and Wildlife Service (Service) is providing this letter in response to your inquiry regarding federally listed, proposed, and candidate species, and proposed and designated critical habitats that may occur in Idaho. Use the attached Species List to ensure compliance with Sections 7 and 9 of the Endangered Species Act (Act). As a federal agent or designated non-federal representative, use this list in conjunction with best available information to assess whether a proposed action may affect these species or their habitats. If you determine a proposed action may affect a species or their habitats, contact the Service to initiate informal or formal consultation. This list is only valid for a period of 90 days. An updated list can be obtained by downloading the PDF file: www.fws.gov/idaho/species/IdahoSpeciesList.pdf.

Candidate Species Conservation

Though Candidate species have no protection under the Act, they are included in the Species List for early planning consideration. Candidate species could be proposed or listed during the project planning period. The Service advises project proponents to evaluate potential effects to Candidate species that may occur in the project area. Should the species be listed, this may expedite Section 7 consultation under the Act.

Effects Beyond Idaho

If the anticipated effects of an action extend beyond the range of Idaho, please contact the appropriate Service Contact for lists of species and habitats occurring in those adjacent states.

U.S. Fish and Wildlife Service Contacts

Idaho - Idaho Fish and Wildlife Office, Bob Kibler, bob_kibler@fws.gov, (208) 378-5255
Montana - Montana Ecological Services Field Office, (406) 449-5225
Nevada - Nevada Fish and Wildlife Office, (775) 861-6300
Oregon - LaGrande Field Office, (541) 962-8584
Utah - Utah Ecological Service Field Office, (801) 975-3330
Washington - Eastern Washington Field Office, (509) 891-6839
Wyoming - Wyoming Ecological Services Field Office, (307) 772-2374

NOAA Fisheries Species

Listed or proposed species that are under National Marine Fisheries Service's (NOAA Fisheries) jurisdiction do NOT appear on the Service's Species Lists. In Idaho, please contact NOAA Fisheries at (208) 378-5696 or visit NOAA Fisheries' webpage at http://www.nwr.noaa.gov/Species-Lists.cfm for consultation information.

Additional Information

To obtain additional information about the Act, please visit one of the Service's internet sites at http://www.fws.gov/endangered/laws-policies/index.html; http://www.fws.gov/idaho/agencies.htm; or speak with a Service Contact.

This species list was revised on 09/06/2012, and is valid for 90 days after

U.S. Fish and Wildlife Service • Idaho Fish and Wildlife Office

CANDIDATE, PROPOSED AND LISTED SPECIES & PROPOSED AND DESIGNATED CRITICAL HABITAT IN IDAHO

	Herps	Birds		Mammals						Fish		Mollusks				Plants							
Common Name	Columbia Spotted Frog (Great Basin Population)	Greater Sage Grouse	Yellow Billed Cuckoo	Canada Lynx	Grizzly Bear	Northern Idaho Ground Squirrel	Selkirk Mountains Woodland Caribou	Southern Idaho Ground Squirrel	North American Wolverine	Bull Trout	Kootenai River White Sturgeon	Banbury Springs Lanx	Bliss Rapids Snail	Bruneau Hot Springsnail	Snake River Physa	Christ's Paintbrush	Goose Creek Milkvetch	MacFarlane's Four O'Clock	Packard's Milkvetch	Spalding's Catchfly	Ute Ladies' Tresses	Water Howellia	Whitebark Pine
Scientific Name	*Rana luteiventris*	*Centrocercus urophasianus*	*Coccyzus americanus*	*Lynx canadensis*	*Ursus arctos horribilis*	*Spermophilus brunneus brunneus*	*Rangifer tarandus caribou*	*Spermophilus brunneus endemicus*	*Gulo gulo luscus*	*Salvelinus confluentus*	*Acipenser transmontanus*	*Lanx sp.*	*Taylorconcha serpenticola*	*Pyrgulopsis bruneauensis*	*Haitia (Physa) natricina*	*Castilleja christii*	*Astragalus anserinus*	*Mirabilis macfarlanei*	*Astragalus cusickii var. packardiae*	*Silene spaldingii*	*Spiranthes diluvialis*	*Howellia aquatilis*	*Pinus albicaulis*
Ada		C	C						C	T					E								
Adams		C		T		T		C	C	T-DCH													C
Bannock		C	C						C														
Bear Lake		C		T					C														C
Benewah				T					C	T-DCH										T		T	
Bingham		C	C						C												T		
Blaine		C	C	T					C	T-DCH													C
Boise			C	T					C	T-DCH													C
Bonner				T	T		E		C	T-DCH													C
Bonneville		C	C	T	T				C												T		C
Boundary				T-DCH	T		E		C	T-DCH	E-DCH												C
Butte		C		T					C	T-DCH													C
Camas		C		T					C	T-DCH													C
Canyon			C						C						E								
Caribou		C		T					C														C
Cassia		C	C												E	C	C						
Clark		C	C	T	T				C														C
Clearwater				T					C	T-DCH													C
Custer		C	C	T					C	T-DCH													C
Elmore		C	C	T					C	T-DCH			T		E								C
Franklin		C		T					C														
Fremont		C	C	T	T				C												T		C
Gem		C						C	C	T-DCH													C

Table Key: C - Candidate Species P - Proposed Species T - Threatened Species E - Endangered Species PCH - Proposed Critical Habitat DCH - Designated Critical Habitat

Page 1 of 2

This species list was revised on 09/06/2012, and is valid for 90 days after

U.S. Fish and Wildlife Service • Idaho Fish and Wildlife Office

CANDIDATE, PROPOSED AND LISTED SPECIES & PROPOSED AND DESIGNATED CRITICAL HABITAT IN IDAHO

	Herps	Birds		Mammals						Fish		Mollusks				Plants							
Common Name	Columbia Spotted Frog (Great Basin Population)	Greater Sage Grouse	Yellow-Billed Cuckoo	Canada Lynx	Grizzly Bear	Northern Idaho Ground Squirrel	Selkirk Mountains Woodland Caribou	Southern Idaho Ground Squirrel	North American Wolverine	Bull Trout	Kootenai River White Sturgeon	Banbury Springs Lanx	Bliss Rapids Snail	Bruneau Hot Springsnail	Snake River Physa	Christ's Paintbrush	Goose Creek Milkvetch	MacFarlane's Four-O'Clock	Packard's Milkvetch	Spalding's Catchfly	Ute Ladies' Tresses	Water Howellia	Whitebark Pine
Scientific Name	*Rana luteiventris*	*Centrocercus urophasianus*	*Coccyzus americanus*	*Lynx canadensis*	*Ursus arctos horribilis*	*Spermophilus brunneus brunneus*	*Rangifer tarandus caribou*	*Spermophilus brunneus endemicus*	*Gulo gulo luscus*	*Salvelinus confluentus*	*Acipenser transmontanus*	*Lanx sp.*	*Taylorconcha serpenticola*	*Pyrgulopsis bruneauensis*	*Haitia (Physa) natricina*	*Castilleja christii*	*Astragalus anserinus*	*Mirabilis macfarlanei*	*Astragalus cusickii var. packardiae*	*Silene spaldingii*	*Spiranthes diluvialis*	*Howellia aquatilis*	*Pinus albicaulis*
Gooding		C							C			E	T		E								
Idaho			C	T					C	T-DCH								T		T			C
Jefferson		C	C	T					C												T		
Jerome		C											T		E								
Kootenai			C	T					C	T-DCH										T		T	
Latah			C	T					C											T		T	
Lemhi		C	C	T					C	T-DCH													
Lewis			C						C	T-DCH										T			
Lincoln		C							C														
Madison		C	C	T					C												T		
Minidoka		C	C												E								
Nez Perce				T					C	T-DCH										T			
Oneida		C																					
Owyhee	C	C	C							T-DCH				E	E								
Payette		C						C		T					E				C				
Power		C																					
Shoshone				T					C	T-DCH										T		T	C
Teton				T	T				C														C
Twin Falls	C	C	C						C				T		E								
Valley				T		T			C	T-DCH													C
Washington		C				T		C	C	T-DCH					E								C

Table Key: C = Candidate Species P= Proposed Species T=Threatened Species E=Endangered Species PCH= Proposed Critical Habitat DCH=Designated Critical Habitat

Page 2 of 2

Appendix E Water Rights

IDWR Water Right and Adjudication Search

Note: This search tool identifies active water rights and active transfers. If you want to search both active and inactive water rights, please check the box below.

To view documents related to all existing Transfer applications, see SEARCH Transfers on the Water Right Transfer tab

☐ Search for both active and inactive water right records.

Search Results

Type of Query USAGE INSTRUCTION

☑ All Adjudication & Water Rights

Adjudication	Water Rights
☐ Claims	☐ Applications
☐ Recommendations	☐ Permits
☐ Both	☐ Decrees, Licenses and Statutory Claims
	☐ Transfers
	☐ All of the above

Basin Who What When Where Clear Search Help

Query parameters
OrganizationName = City of Gooding
Search for: active Records

Information for type: Claim

	Record	Basin	Sequence	Suffix	Version	Basis	Status	Priority Date	Diversion Rate	Source List	Water Uses	Owner List
Details Pedigree Related Documents General Provision	1	37	709	A		Decreed	Active	1883-02-22	0.74	LITTLE WOOD RIVER	IRRIGATION	CITY OF GOODING (Current)
Details Pedigree Related Documents General Provision	2	37	960	A		Decreed	Active	1883-04-01	0.57	LITTLE WOOD RIVER	IRRIGATION	CITY OF GOODING (Current)

Information for type: Recommendation

	Record	Basin	Sequence	Suffix	Version	Basis	Status	Priority Date	Diversion Rate	Source List	Water Uses	Owner List
Details Pedigree Related Documents General Provision	3	37	709	A	1	Decreed	Active	1883-02-22	0.74	LITTLE WOOD RIVER	IRRIGATION	CITY OF GOODING (Current)
Details Pedigree Related Documents General Provision	4	37	960	A	1	Decreed	Active	1883-04-01	0.57	LITTLE WOOD RIVER	IRRIGATION	CITY OF GOODING (Current)

Information for type: Statutory Claim, Decree and License

	Record	Basin	Sequence	Suffix	Version	Basis	Status	Priority Date	Diversion Rate	Source List	Water Uses	Owner List
Details Related Documents General Provision	5	37	262	A		Decreed	Active	1883-02-22	3.16	LITTLE WOOD RIVER	IRRIGATION	CITY OF GOODING (Current)
Details Related Documents General Provision	6	37	271	A		Decreed	Active	1882-06-30	0.32	LITTLE WOOD RIVER	IRRIGATION	CITY OF GOODING (Current)
Details Related Documents General Provision	7	37	282			Decreed	Active	1877-04-01	1	LITTLE WOOD RIVER	IRRIGATION	CITY OF GOODING (Current)
Details Related Documents General Provision	8	37	662			Decreed	Active	1885-06-15	1.42	LITTLE WOOD RIVER	IRRIGATION	CITY OF GOODING (Current)
Details Related Documents General Provision	9	37	2761	A		Decreed	Active	1967-07-14	1.64	GROUND WATER	IRRIGATION	CITY OF GOODING (Current)
Details Related Documents General Provision	10	37	4080			Decreed	Active	1928-09-28	2.8	GROUND WATER	MUNICIPAL	CITY OF GOODING (Current)
Details Related Documents General Provision	11	37	4087			Decreed	Active	1948-06-01	0.04	GROUND WATER	DOMESTIC	CITY OF GOODING (Current)
Details Related Documents General Provision	12	37	7597			Decreed	Active	1977-05-05	1.07	GROUND WATER	IRRIGATION	CITY OF GOODING (Current)
Details Related Documents General Provision	13	37	11221			Decreed	Active	1977-04-20	5.9	GROUND WATER	MUNICIPAL	CITY OF GOODING (Current)

Number of records = 13

Appendix F EPA CT Calculator Output

Step 1: Enter the total number of Disinfection Ground Water Treatment Facilities (GWTF) at your water system. (Up to 20 facilities can be calculated using this tool.)	2

	GWTF 1	GWTF 2
Step 2: Number of Complete Sample Sites Per GWTF:	1	1

Step 3: By answering "Yes" or "No" to a series of questions the appropriate fields will appear to allow you to determine your system's volume.

Did the state provide or do you know the total volume of each of your GWTF after disinfection but before the first customer? (Enter Yes or No in the cell to the right (C10))	no	**You will need to calculate either your GWTFs water storage tank or cylindrical pipe volume below.**

		GWTF 1	GWTF 2
Enter the total volume (in gallons) of water storage tank(s) for each GWTF that has a water storage tank after disinfection but prior to your first customer?		50,000.00	1,140,000.00
Enter the length (in feet) and diameter (in inches) for each GWTF that has a cylindrical pipe after disinfection but prior to your first customer?	Enter Length in Feet	510.00	77.00
	Enter Diameter in Inches	10.00	6.00
	Volume of Pipe in Gallons	2,079.60	113.03
Total Volume after disinfection and prior to first customer:		52,079.60	1,140,113.03

Step 4:

To access the GWTF sheets click on the button below. A box will appear asking "Unhide the following sheet? GWTF 1" click yes and the sheet will appear and another box will appear asking to unhide the next GWTF sheet all the way through to GWTF 20. Click no and the sheet will not appear and the program will stop asking to unhide the sheets. Unhide as many GWTF sheets as needed.

If CT is obtained using a length of pipe enter a Baffling Factor of 1.00 below
Otherwise enter the Baffling Factor for your storage tank as approved by the State.
For additional guidance on determining your baffling factor see Appendix G of EPA's Benchmarking and Profiling Guidance Manual (www.epa.gov/safewater)

Enter name of GWTF:
(This is for your records - Provides no input to calculations)

Enter Baffling Factor for GWTF: 1.00

Minimum Log Inactivation Provided: 5.59

Sample Site	Sample Date	Disinfectant	Residual Conc. (C) (mg/L)	pH	Temp. (Celsius)	Peak Flow (GPM)	Volume (gal)	TDT (min)	Contact Time (T) (min)	CT_{calc}	4-log CT_{req}	Log Inactivation (viruses) See Error Messages in Columns S - Y	Additional Log Treatment Needed for 4-Log
1	11/30/2012	Free Chlorine	0.30	7.54	15.4	2,850.0	52,079.6	18.3	18.3	5.5	3.92	5.59	0.00

If CT is obtained using a length of pipe enter a Baffling Factor of 1.00 below
Otherwise enter the Baffling Factor for your storage tank as approved by the State.
For additional guidance on determining your baffling factor see Appendix G of EPA's Benchmarking and Profiling Guidance Manual (www.epa.gov/safewater)

Enter name of GWTF:

(This is for your records - Provides no input to calculations)

Enter Baffling Factor for GWTF: 1.00

Minimum Log Inactivation Provided: 134.47

Sample Site	Sample Date	Disinfectant	Residual Conc. (C) (mg/L)	pH	Temp. (Celsius)	Peak Flow (GPM)	Volume (gal)	TDT (min)	Contact Time (T) (min)	CT_{calc}	4-log CT_{req}	Log Inactivation (viruses) See Error Messages in Columns S - Y	Additional Log Treatment Needed for 4-Log
1	11/30/2012	Free Chlorine	0.40	7.76	14.3	2,850.0	1,140,113.0	400.0	400.0	160.0	4.28	149.55	0.00

Appendix G Well Drillers Logs

C

IDAHO DEPARTMENT OF WATER RESOURCES

WELL DRILLER'S REPORT

Use Typewriter or Ballpoint Pen

Office Use Only			
Inspected by			
Twp	Rge	Sec	
1/4	1/4	1/4	
Lat		Long	

057833

1. DRILLING PERMIT NO. 37-96-S-0006-000
Other IDWR No. 37-04080
Inhalf(?) test well see 37-96-S-0006-801

2. OWNER:
Name City of Gooding
Address 308 5th Ave West
City Gooding State Idaho 83301

3. LOCATION OF WELL by legal description:
Sketch map location must agree with written location.

Twp 5 North or South X
Rge 15 East X or West
Sec. 32 SW 1/4 SW 1/4 SW 1/4
Gov't Lot County Gooding
Lat Long
Address of Well Site ½ block East of 4th Main City Gooding
Lt. Blk. Sub. Name

4. USE:
X Domestic ☐ Municipal ☐ Monitor ☐ Irrigation
☐ Thermal ☐ Injection X Other City Well

5. TYPE OF WORK check all that apply (Replacement etc.)
X New Well ☐ Modify ☐ Abandonment ☐ Other

6. DRILL METHOD
X Air Rotary ☐ Cable ☐ Mud Rotary ☐ Other

7. SEALING PROCEDURES

Seal/Filter Pack Material	From	To	Amount Sacks or Pounds	Method
Bentonite	0	270	3500 lbs 254 Sacks	

Was drive shoe used? ☐ Y X N Shoe Depth(s)
Was drive shoe seal tested? ☐ Y X N How?

8. CASING/LINER:

Diameter	From	To	Gauge	Material	Casing	Liner	Welded	Threaded
16"	+2	188	.38	Steel	X		X	

Length of Headpipe 2 Length of Tailpipe

MICROFILMED FEB 05 1997

9. PERFORATIONS/SCREENS
☐ Perforations Method
☐ Screens Screen Type

From	To	Slot Size	Number	Diameter	Material	Casing	Liner

10. STATIC WATER LEVEL OR ARTESIAN PRESSURE:
159 ft. below ground Artesian pressure lb.
Depth flow encountered ft. Describe access port or control devices Welded Steel Pipe

11. WELL TESTS:
☐ Pump ☐ Bailer ☐ Air ☐ Flowing Artesian

Yield gal./min.	Drawdown	Pumping Level	Time

Water Temp. 85° Bottom hole temp.
Water Quality test or comments
Depth first Water Encountered

12. LITHOLOGIC LOG: (Describe repairs or abandonment)

Bore Dia.	From	To	Remarks: Lithology, Water Quality & Temperature	Water Y	Water N
17½	0	10	Top Soil + Gravel		
	10	19	Bl Lava		
	19	20	Br Sand		
	20	34	Gravel		
	34	39	Cinders		
	39	48	Bl Lava		
	48	60	Br Clay		
	60	69	Soft Silty Clay		
	69	111	Bl Lava		
	111	113	Broken bl Lava		
	113	157	Bl Lava		
	157	159	Broken Bl Lava		
	159	163	Bl Lava		
	163	166	Red Ash		
	166	177	Bl Lava		
	177	181	Bl Cinders	X	
	181	204	Bl Lava		
	204	207	Broken Bl Lava	X	
	207	211	Med Hard Bl Lava		
	211	223	Bl Lava		
	223	224	Broken		
	224	268	Bl Lava		
12	268	276	Bl Lava		
	276	277	Broken	X	
	277	279	Med Hard bl Lava	X	
	279	280	Greenish + Talc	X	
	280	291	Bl Lava		
	291	298	Soft broken Cinders + Talc		
	298	338	Bl Lava		
	338	341	Soft broken Bl Lava		
	341	348	Med Hard bl Lava		
	348	357	Med Hard + breaks		
	357	387	Hard bl Lava		

NOV 22 1996

RECEIVED
DEC 05 1996
Department of Water Resources

Completed Depth 427 (Measurable)
Date: Started 11-4-96 Completed 11-15-96

13. DRILLER'S CERTIFICATION
I/We certify that all minimum well construction standards were complied with at the time the rig was removed.

Firm Name Eaton Drilling Firm No. 26
Firm Official Larry Wilson Date 11-19-96
and
Supervisor or Operator Dave Cody Date 11-16-96
(Sign once if Firm Official & Operator)

FORWARD WHITE COPY TO WATER RESOURCES

Form 238-7 Pg. 1 of 2

IDAHO DEPARTMENT OF WATER RESOURCES
WELL DRILLER'S REPORT

Use Typewriter or Ballpoint Pen

057831

DEC 05 1996

Office Use Only
Inspected by ______
Twp ____ Rge ____ Sec ____
____1/4 ____1/4 ____1/4
Lat: : : Long: : :

1. DRILLING PERMIT NO. 37-96-S-0006-801
Other IDWR No. upgraded see 37-96-S-0006-000 D.K. 37-04050

2. OWNER:
Name City of Gooding
Address 308 5th Ave West
City Gooding State Id Zip 83301

3. LOCATION OF WELL by legal description:
Sketch map location must agree with written location.

Twp. 5 North ☐ or South ☑
Rge. 15 East ☑ or West ☐
Sec. 32 SW 1/4 SW 1/4 SW 1/4
Gov't Lot ____ County ____
Lat: : : Long: : :
Address of Well Site 1/2 block East of 4th & Main City Gooding

Lt. ____ Blk. ____ Sub. Name ____

4. USE:
☐ Domestic ☒ Municipal ☐ Monitor ☐ Irrigation
☐ Thermal ☐ Injection ☒ Other Exploratory

5. TYPE OF WORK check all that apply (Replacement etc.)
☑ New Well ☐ Modify ☐ Abandonment ☐ Other ____

6. DRILL METHOD
☑ Air Rotary ☐ Cable ☐ Mud Rotary ☐ Other ____

7. SEALING PROCEDURES

SEAL/FILTER PACK Material	From	To	AMOUNT Sacks or Pounds	METHOD
None used				

Was drive shoe used? ☐ Y ☐ N Shoe Depth(s) ____
Was drive shoe seal tested? ☐ Y ☐ N How? ____

8. CASING/LINER:

Diameter	From	To	Gauge	Material	Casing	Liner	Welded	Threaded
6"	[illegible]	[illegible]		Steel	☑	☑	☐	☐
None	left	in hole			☐	☐	☐	☐
for 17"	hole				☐	☐	☐	☐

Length of Headpipe ____ Length of Tailpipe ____

MICROFILMED FEB 05 1997

9. PERFORATIONS/SCREENS
☐ Perforations Method ____
☐ Screens Screen Type ____

From	To	Slot Size	Number	Diameter	Material	Casing	Liner
						☐	☐
						☐	☐
						☐	☐

10. STATIC WATER LEVEL OR ARTESIAN PRESSURE:
150 ft. below ground Artesian pressure ____ lb.
Depth flow encountered ____ ft. Describe access port or control devices: —

11. WELL TESTS:
☐ Pump ☐ Bailer ☐ Air ☐ Flowing Artesian

Yield gal./min.	Drawdown	Pumping Level	Time
50/min	none	168	6 hr
(only	for gpm required for test)		

Water Temp. ____ Bottom hole temp. ____
Water Quality test or comments: water test samples taken by EHM Engineers Depth first Water Encountered ____

12. LITHOLOGIC LOG: (Describe repairs or abandonment)

Bore Dia.	From	To	Remarks: Lithology, Water Quality & Temperature	Water Y	Water N
8"	0	10	Top soil & gravel		
	10	19	Bl Lava		
	19	20	Gr Lava		
	20	34	Gravel		
	34	39	Cinders		
6"	39	48	Bl Lava		
	48	60	Gr Clay		
	60	64	soft Silty Clay		
	64	111	Bl. Lava		
	111	113	Broken Bl. Lava		
	113	157	Bl Lava		
	157	159	Broken Bl. Lava		
	159	163	Bl. Lava		
	163	166	Red Ash		
	166	177	Bl lava		
	177	181	Bl. Cinders	X	
	181	204	Bl. Lava		
	204	207	Broken Bl. lava	X	
	207	211	Med hard Bl lava		
	211	223	Bl lava		
	223	224	Broken		
	224	268	Bl Lava med		
	268	276	Bl Lava hard		
	276	277	Broken	X	
	277	279	med Hard Bl. lava	X	
	279	280	Crevices & Talc	X	
	280	291	Bl Lava		
	291	296	Soft broken cinders & Talc		
	296	338	Bl Lava		
	338	341	Soft broken Bl lava		
	341	348	Med. Hard Bl lava		
	348	357	Med Hard & breaks		
	357	389	Hard Bl. lava		

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Completed Depth 407' (Measurable)
Date: Started 3-1-96 Completed 11-4-96

13. DRILLER'S CERTIFICATION
I/We certify that all minimum well construction standards were complied with at the time the rig was removed.

Firm Name Estep Drilling Firm No. 26
Firm Official [signature] Date 12-2-96
and
Supervisor or Operator Dave [signature] Date 12-3-96
(Sign once if Firm Official & Operator)

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App 888910

Form 238-7

IDAHO DEPARTMENT OF WATER RESOURCES

WELL DRILLER'S REPORT

Office Use Only
Inspected by
Twp Rge Sec
1/4 1/4 1/4
Lat: Long:

1. WELL TAG NO. D
DRILLING PERMIT NO. 823853
Other IDWR No. 404407

2. OWNER:
Name: City of Gooding
Address: 308 5th Ave W
City: Gooding State: Id Zip: 83330

3. LOCATION OF WELL by legal description:
Sketch map location must agree with written location.

Twp. 5 North ☐ or South ☒
Rge. 15 East ☒ or West ☐
Sec. 32 1/4 SE 1/4 SW 1/4
Gov't Lot County: Gooding
Lat: Long:
Address of Well Site: 4th Ave & Kress St.
City: Gooding

Lt. Blk. Sub. Name

4. USE:
☐ Domestic ☒ Municipal ☐ Monitor ☐ Irrigation
☐ Thermal ☐ Injection ☐ Other

5. TYPE OF WORK: check all that apply (Replacement etc.)
☐ New Well ☐ Modify ☐ Abandonment ☐ Other

6. DRILL METHOD:
☐ Air Rotary ☐ Cable ☐ Mud Rotary ☐ Other

7. SEALING PROCEDURES:

Seal/Filter Pack Material	From	To	AMOUNT Sacks or Pounds	METHOD
washed gravel	300	210		dry pour
bentonite	210	170	71	" "
washed gravel	170	70		" "
bentonite				" "

Was drive shoe used? ☐ Y ☐ N Shoe Depth(s)
Was drive shoe seal tested? ☐ Y ☐ N How?

8. CASING/LINER:

Diameter	From	To	Gauge	Material	Casing	Liner	Welded	Threaded
					☐	☐	☐	☐
					☐	☐	☐	☐
					☐	☐	☐	☐

Length of Headpipe Length of Tailpipe

9. PERFORATIONS/SCREENS:
☐ Perforations Method
☐ Screens Screen Type

From	To	Slot Size	Number	Diameter	Material	Casing	Liner
						☐	☐
						☐	☐
						☐	☐

10. STATIC WATER LEVEL OR ARTESIAN PRESSURE:
ft. below ground Artesian pressure lb.
Depth flow encountered ft. Describe access port or control devices:

11. WELL TESTS:
☐ Pump ☐ Bailer ☐ Air ☐ Flowing Artesian

Yield gal./min.	Drawdown	Pumping Level	Time

Water Temp. Bottom hole temp.
Water Quality test or comments:
Depth first Water Encounter

12. LITHOLOGIC LOG: (Describe repairs or abandonment)

Bore Dia.	From	To	Remarks: Lithology, Water Quality & Temperature	Water Y	N
			Abandone well		
			AoR: IDWR Agent John Faulky or S.R.		

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NOV 10 2005
Department of Water Resources
Southern Region

Completed Depth (Measurable)
Date: Started 6-8-05 Completed 6-8-05

13. DRILLER'S CERTIFICATION:
I/We certify that all minimum well construction standards were complied with at the time the rig was removed.

Company Name: Egton Drilling Firm No. 26
Firm Official [signature] Date 6/9/05
and
Driller or Operator [signature] Date 6/8/05
(Sign once if Firm Official & Operator)

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Form 238-7
1/97 JOE

IDAHO DEPARTMENT OF WATER RESOURCES
WELL DRILLER'S REPORT

Office Use Only
Inspected by
Twp Rge Sec
1/4 1/4 1/4
Lat: Long:

1. WELL TAG NO. D
DRILLING PERMIT NO. 833565
Other IDWR No. 404411

2. OWNER:
Name City of Gooding
Address 308 5th Ave W.
City Gooding State ID Zip 83330

3. LOCATION OF WELL by legal description:
Sketch map location must agree with written location.

Twp. 5 North ☐ or South ☑
Rge. 15 East ☑ or West ☐
Sec. 32 SE 1/4 SW 1/4
Gov't Lot County Gooding
Lat: Long:
Address of Well Site 4th Ave E of Kirkes St
City Gooding
Lt. Blk. Sub. Name

4. USE:
☐ Domestic ☑ Municipal ☐ Monitor ☐ Irrigation
☐ Thermal ☐ Injection ☐ Other

5. TYPE OF WORK: check all that apply (Replacement etc.)
☐ New Well ☐ Modify ☐ Abandonment ☐ Other

6. DRILL METHOD:
☐ Air Rotary ☐ Cable ☐ Mud Rotary ☐ Other

7. SEALING PROCEDURES:

Seal/Filter Pack Material	From	To	AMOUNT Sacks or Pounds	METHOD
washed gravel	318	120		dry pour
bentonite	120	0	137	

Was drive shoe used? ☐Y ☐N Shoe Depth(s)
Was drive shoe seal tested? ☐Y ☐N How?

8. CASING/LINER:

Diameter	From	To	Gauge	Material	Casing	Liner	Welded	Threaded
					☐	☐	☐	☐
					☐	☐	☐	☐
					☐	☐	☐	☐

Length of Headpipe Length of Tailpipe

9. PERFORATIONS/SCREENS:
☐ Perforations Method
☐ Screens Screen Type

From	To	Slot Size	Number	Diameter	Material	Casing	Liner
						☐	☐
						☐	☐
						☐	☐

10. STATIC WATER LEVEL OR ARTESIAN PRESSURE:
ft. below ground Artesian pressure lb.
Depth flow encountered ft. Describe access port or control devices:

11. WELL TESTS:
☐ Pump ☐ Bailer ☐ Air ☐ Flowing Artesian

Yield gal./min.	Drawdown	Pumping Level	Time

Water Temp. Bottom hole temp.
Water Quality test or comments:
Depth first Water Encounter

12. LITHOLOGIC LOG: (Describe repairs or abandonment)

Bore Dia.	From	To	Remarks: Lithology, Water Quality & Temperature	Water Y	N
			Abandon Well		
			Note: IDWR Agent John Bentley on site		

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NOV 10 2005
Department of Water Resources
Southern Region

Completed Depth (Measurable)
Date: Started 6-8-05 Completed 6-8-05

13. DRILLER'S CERTIFICATION:
I/We certify that all minimum well construction standards were complied with at the time the rig was removed.

Company Name Eston Drilling Firm No. 26
Firm Official [signature] Date 6-9-05
and
Driller or Operator [signature] Date 6/8/05
(Sign once if Firm Official & Operator)

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Appendix H Gooding System Classification

IDAHO DISTRIBUTION SYSTEM CLASSIFICATION WORKSHEET

OFFICE USE ONLY DO NOT WRITE HERE
System Class ____________
Notes:
Approved by ____________
Date ____________

DEQ will use this information to classify your system.

PWS System No. ID5240009
(Example: ID1234567)

Name of Public Water System: City of Gooding

System Address: 308 5th Avenue West

City: Gooding State: ID Zip Code: 83330

Contact Person: Todd Bunn Title: Public Works Director

Business Phone Number: (208)-934-5669 Email: tbunn@goodingidaho.org

Population served by this distribution system: 3,567
(The number of people, not the number of connections)

Name of Water Source(s): 4th Avenue Well, Senior Avenue Well, 13th Avenue Well
(Example: Well #16, Johnson Well or East Fork of Miller Creek, etc.)

Signature ____________ Date ____________

***Please note*: Your PWS may also be a treatment facility* as defined here:**
* **Treatment Facility** - Any place(s) where a public drinking water system or non-transient noncommunity water system alters the physical or chemical characteristics of the drinking water. Chlorination may be considered as a function of a distribution system. (IDAPA 58.01.08.003.74)

If your PWS is also a treatment facility, submit a treatment facility worksheet which can be found at http://www.deq.idaho.gov/media/758669-dw-treatment-plant-classification-worksheet.pdf

Mail the completed, signed form to your regional Department of Environmental Quality or Health District drinking water contact.

Distribution system classification is based on complexity and population served as follows:

Very Small Public Drinking Water System (* see definition below)	
Class I	**1,500 or less**
Class II	**1,501 to 15,000**
Class III	**15,001 to 50,000**
Class IV	**50,001 and greater**

* **Very Small Public Drinking Water System** – A Community or Non-transient Non-community Public Water System that serves five hundred (500) persons or less and has no treatment other than disinfection** or has only treatment which does not require any chemical treatment, process adjustment, backwashing or media regeneration by an operator (e.g. calcium carbonate filters, granular activated carbon filters, cartridge filters, ion exchangers.) (IDAPA 58.01.08.003.79)

** **Disinfection** – Introduction of chlorine or other agent or process approved by the Department of Environmental Quality, in sufficient concentration and for the time required to kill or inactivate pathogenic and indicator organisms. (IDAPA 58.01.08.003.22)

Appendix I Gooding Cross-connection Control Program

CHAPTER 8

CROSS CONNECTION CONTROL

SECTION:

8-8-1: **PURPOSE AND SCOPE:** The purpose of this chapter is to protect the public health of domestic water users receiving their water supply from the city. (Ord. 523, 3-17-1980)

8-8-2: **DEFINITIONS:** As used in this chapter, the following words and terms shall have the meanings ascribed to them in this section:

BACKFLOW: The flow of nonpotable water, liquids, gases or other foreign substances into the pipes of a potable water system from any source or sources.

BACKFLOW PREVENTION DEVICE: The device to counteract back pressure or to prevent back siphonage.

CROSS CONNECTIONS: Any actual or potential connection or structural arrangement between a public or consumers potable water system in any other source or system through which it is possible to introduce into any part of the potable system used water, industrial fluid, gas or substance other than the intended potable water, with which the system is supplied. Bypass arrangements, jumper connections, removable sections, swivel or change-over devices and any other temporary or permanent devices which or because of which "backflow" can or may occur are cross connections. (Ord. 523, 3-17-1980)

8-8-3: **CROSS CONNECTIONS:** No domestic water service connection shall be installed or hereafter maintained unless the water supply is protected by backflow prevention devices as required by the rules and regulations of the Idaho department of health and welfare, as the same now exists or as may be hereafter amended or supplemented. Any cross connection now existing or hereafter installed is hereby declared a public nuisance and shall be abated. (Ord. 523, 3-17-1980)

8-8-4: **SERVICE:** Service to any property, landowner or water consumer receiving a water supply from the city's water supply system shall be contingent upon compliance with all the requirements of the rules and regulations of the Idaho department of health and welfare and of this chapter pertaining to cross connections. Service shall be discontinued to any premises, water consumer or property owner for failure to comply with such regulations of the Idaho department of health and welfare and of this chapter pertaining to cross connections, and any discontinued service will not be reestablished until the city, or its designated agent has approved compliance by that particular premises or water consumer or landowner. (Ord. 523, 3-17-1980)

8-8-5: **VIOLATIONS AND PENALTIES:** Any person who violates, disobeys, omits, neglects, refuses to comply with, or resists the enforcement of any of the provisions of this chapter or the rules and regulations as adopted by the city, in connection herewith, shall be deemed guilty of a misdemeanor. (Ord. 523, 3-17-1980)

8-8-6: **SEVERABILITY:** If any one or more sections, subsections, or sentences of this chapter are for any reason held to be unconstitutional or invalid, such decisions shall not affect the validity of the remaining portions of this chapter and the same shall remain in full force and effect. (Ord. 523, 3-17-1980)

Appendix J Hydraulic Evaluation

2012 Existing System: Maximum Day Demand Plus Fire Largest Pump offline (All Irrigation from potable)				
Junction ID	Static Pressure (psi)	Needed Fire Flow (gpm)	Available Fire Flow (gpm)	Residual Pressure (psi)
608	41	1,000	10	25
637	42	1,000	6	25
488	42	1,000	18	26
482	44	1,000	17	25
634	44	1,000	14	25
1018	44	1,000	23	26
1427	45	1,000	36	27
486	45	1,000	45	25
484	45	1,000	54	28
417	47	2,000	123	25
665	47	1,000	19	26
642	48	1,000	11	27
936	48	2,000	197	26
415	48	2,000	229	26
458	48	1,000	(N/A)	(N/A)
784	49	2,000	875	30
586	49	2,000	875	30
832	49	2,000	875	30
914	49	2,000	875	30
428	49	1,000	288	25
419	49	1,000	297	25
420	49	1,000	543	25
733	49	1,000	789	25
424	49	1,000	384	25
172	49	1,000	838	27
170	49	1,000	838	30
174	49	1,000	836	29
168	49	1,000	838	31
166	49	1,000	839	31
426	49	1,000	833	28
443	49	1,000	838	31
164	49	1,000	838	31
480	49	1,000	66	31
336	49	1,000	161	25
334	49	1,000	164	26
332	49	1,000	169	25
330	49	1,000	179	27
826	49	2,000	875	30
791	49	2,000	875	30
328	50	1,000	179	31
456	50	1,000	59	25
1430	50	1,000	543	25
1433	50	1,000	513	29
227	50	1,000	322	33
1154	50	1,000	333	25
234	50	1,000	230	25
987	50	1,000	256	25
225	50	1,000	441	32
232	50	1,000	494	25

243	50	1,000	227	25
241	50	1,000	243	25
1150	51	1,000	562	25
239	51	1,000	(N/A)	(N/A)
237	51	1,000	(N/A)	(N/A)
120	51	1,000	540	34
612	51	2,000	34	25
118	51	1,000	548	35
116	51	1,000	559	35
627	51	2,000	154	25
326	51	1,000	253	31
114	51	1,000	606	35
176	51	2,000	844	33
178	51	2,000	845	33
599	51	2,000	846	32
600	51	2,000	846	33
1363	51	1,000	512	25
112	51	1,000	687	35
1360	51	1,000	722	33
245	51	1,000	662	25
1357	51	1,000	524	25
28	51	2,000	(N/A)	(N/A)
48	51	1,000	725	35
50	51	1,000	732	35
1146	51	1,000	749	35
1445	51	1,000	760	35
247	51	1,000	772	34
52	51	1,000	775	35
928	51	2,000	875	33
1351	51	2,000	875	33
710	51	2,000	876	33
655	51	2,000	876	33
1142	51	1,000	546	25
1399	51	1,000	207	32
451	51	2,000	40	25
109	51	1,000	751	36
454	51	1,000	96	25
251	52	1,000	421	25
249	52	1,000	690	25
1274	52	1,000	515	25
1270	52	1,000	510	25
439	52	1,000	827	33
162	52	1,000	836	35
54	52	1,000	817	35
56	52	1,000	836	35
409	52	2,000	605	25
60	52	2,000	858	35
1090	52	2,000	859	35
800	52	2,000	861	35
1088	52	2,000	861	35
430	52	1,000	831	31

265	52	1,000	828	34
253	52	1,000	816	27
1442	52	1,000	538	25
58	52	1,000	848	35
1266	52	1,000	720	33
1463	52	1,000	641	25
1262	52	1,000	525	25
159	52	1,000	851	35
318	52	1,000	335	25
316	52	1,000	347	25
436	52	2,000	440	25
434	52	2,000	605	25
229	52	1,000	372	31
314	52	1,000	434	32
263	52	1,000	844	33
220	52	2,000	402	30
261	52	1,000	849	33
1258	52	2,000	533	25
255	52	1,000	844	28
157	52	1,000	859	35
407	52	2,000	877	34
274	52	2,000	733	25
1354	52	2,000	544	25
1439	52	1,000	552	25
257	52	1,000	867	27
155	52	1,000	864	35
338	52	1,000	335	27
339	52	1,000	335	35
342	52	1,000	613	28
1396	52	2,000	584	26
138	52	1,000	547	35
1460	52	1,000	648	25
323	52	1,000	613	31
1490	52	2,000	484	25
39	52	2,000	688	34
37	52	2,000	699	34
45	52	2,000	699	34
41	52	2,000	701	33
1138	52	1,000	574	25
43	52	2,000	705	32
107	52	1,000	817	36
1339	53	2,000	872	34
310	53	2,000	399	26
312	53	1,000	561	30
308	53	1,000	594	26
31	53	2,000	667	25
29	53	2,000	668	27
301	53	2,000	618	25
35	53	2,000	699	27
33	53	2,000	699	28
1195	53	2,000	699	31

1335	53	2,000	472	25
405	53	2,000	668	25
1457	53	1,000	857	32
320	53	1,000	730	31
1408	53	1,000	101	25
414	53	2,000	624	25
403	53	2,000	678	25
490	53	2,000	870	29
1078	53	2,000	869	36
924	53	2,000	867	36
1082	53	2,000	864	36
62	53	2,000	864	36
644	53	1,000	878	35
1168	53	1,000	878	35
836	53	1,000	879	35
961	54	1,000	708	25
181	54	2,000	828	25
303	54	2,000	(N/A)	(N/A)
1493	54	2,000	880	34
64	54	2,000	878	36
182	54	2,000	880	33
187	54	2,000	881	32
185	54	2,000	882	33
259	54	1,000	854	25
1504	54	2,000	544	25
876	54	2,000	883	35
448	54	1,000	870	25
1436	54	1,000	587	25
66	54	2,000	886	36
1134	54	1,000	606	25
271	54	1,000	888	25
1507	54	2,000	721	25
68	54	2,000	891	36
1417	54	1,000	102	25
70	54	2,000	893	36
1402	54	1,000	508	25
105	54	2,000	922	37
1499	54	2,000	883	32
153	54	2,000	875	37
470	54	2,000	46	25
94	54	1,000	879	36
648	54	1,000	879	36
649	54	1,000	879	36
375	54	1,000	881	31
721	54	1,000	880	36
492	54	1,000	876	25
580	54	1,000	880	33
92	54	1,000	880	35
90	54	1,000	880	35
96	54	1,000	969	36
293	54	2,000	773	25

88	54	1,000	880	36
97	54	1,000	979	36
493	54	1,000	579	25
276	54	2,000	663	25
348	54	1,000	857	25
461	54	1,000	102	25
1405	55	1,000	505	25
1378	55	2,000	677	25
99	55	2,000	1,007	36
1496	55	2,000	601	25
297	55	1,000	308	25
1236	55	1,000	385	25
508	55	2,000	895	25
1240	55	2,000	979	32
299	55	2,000	1,020	26
135	55	1,000	955	37
532	55	1,000	964	37
354	55	1,000	969	36
530	55	2,000	608	25
352	55	1,000	985	35
528	55	2,000	730	25
446	55	2,000	966	31
295	55	1,000	1,010	33
1232	55	1,000	657	25
1366	55	2,000	553	25
472	55	2,000	41	25
518	55	2,000	993	36
1300	55	2,000	981	34
525	55	2,000	976	30
730	55	2,000	976	34
1125	55	2,000	619	25
1411	55	1,000	565	38
140	55	1,000	983	37
964	55	2,000	1,021	37
1004	55	2,000	1,019	35
1451	55	2,000	1,007	32
1254	55	2,000	505	25
101	55	2,000	1,021	37
478	55	1,000	72	25
1454	55	1,000	623	25
1375	55	2,000	670	25
1372	55	2,000	1,020	29
377	55	1,000	615	25
379	55	1,000	489	25
1487	55	1,000	942	31
381	55	1,000	628	25
576	55	1,000	943	32
189	55	1,000	944	33
1420	55	1,000	542	25
1202	55	1,000	455	25
589	55	2,000	791	25

574	55	1,000	911	25
590	55	2,000	940	32
572	55	1,000	946	32
278	55	2,000	941	34
288	55	2,000	194	25
280	56	2,000	944	36
569	56	1,000	948	34
191	56	1,000	948	34
970	56	1,000	459	25
1246	56	2,000	551	25
291	56	2,000	856	25
71	56	2,000	900	38
631	56	1,000	951	35
193	56	1,000	951	35
506	56	2,000	905	25
87	56	1,000	906	38
73	56	1,000	905	38
85	56	1,000	907	38
151	56	2,000	904	38
364	56	1,000	871	25
845	56	1,000	909	38
75	56	1,000	908	38
367	56	1,000	850	25
286	56	2,000	509	25
77	56	1,000	911	38
79	56	1,000	911	38
501	56	2,000	446	25
498	56	2,000	490	25
499	56	2,000	493	25
512	56	2,000	632	25
81	56	1,000	912	38
1484	56	1,000	895	37
1481	56	2,000	921	35
1320	56	2,000	1,026	38
1308	56	2,000	691	25
1250	56	2,000	957	25
503	56	2,000	760	25
475	56	1,000	471	26
510	56	2,000	580	25
1208	56	1,000	587	38
1369	56	2,000	1,021	27
131	56	1,000	652	37
1414	56	1,000	616	38
1466	56	2,000	712	25
345	56	1,000	504	25
1289	56	2,000	948	37
958	56	1,000	358	25
137	56	1,000	652	38
1007	56	1,000	653	38
1312	56	2,000	759	25
967	56	1,000	661	25

463	56	1,000	603	25
977	56	2,000	593	25
974	56	2,000	652	30
371	56	1,000	939	30
1130	56	2,000	1,023	34
1011	56	1,000	679	38
1448	56	2,000	1,001	31
851	56	1,000	736	25
1199	56	1,000	967	38
149	56	2,000	923	39
369	57	1,000	938	29
565	57	2,000	566	25
563	57	2,000	653	25
1113	57	2,000	652	27
561	57	2,000	652	31
1024	57	2,000	653	29
127	57	2,000	652	31
103	57	2,000	1,030	39
1227	57	1,000	690	25
1294	57	2,000	844	25
1423	57	1,000	891	39
129	57	2,000	652	34
1015	57	1,000	652	34
813	57	2,000	1,030	39
467	57	1,000	768	37
133	57	1,000	770	39
147	57	2,000	946	39
359	57	2,000	960	36
1469	57	2,000	955	35
522	57	2,000	956	39
124	57	2,000	652	31
125	57	2,000	652	31
1478	57	1,000	933	39
195	57	1,000	953	37
392	57	1,000	955	28
196	57	1,000	954	37
688	57	2,000	1,042	40
387	57	1,000	652	34
145	57	1,000	963	39
356	57	1,000	780	25
361	57	1,000	966	40
83	57	1,000	969	40
549	57	1,000	985	30
551	57	1,000	984	31
547	57	1,000	985	30
557	57	1,000	976	25
614	57	1,000	984	32
559	57	1,000	955	25
212	57	1,000	983	33
210	57	1,000	983	34
390	57	1,000	920	25

544	57	1,000	986	31
143	57	1,000	980	40
208	57	1,000	983	35
400	58	1,000	976	40
398	58	1,000	626	25
396	58	1,000	992	37
1472	58	1,000	734	25
141	58	1,000	998	41
214	58	1,000	982	41
198	58	1,000	979	39
1475	58	1,000	742	25
206	58	1,000	928	25
810	58	1,000	651	25
622	58	1,000	1,027	41
1343	58	1,000	992	40
204	58	1,000	989	41
983	58	1,000	985	25
200	58	1,000	990	41
625	59	1,000	1,047	41
202	59	1,000	994	41
553	59	1,000	985	29
980	59	1,000	985	28
284	60	2,000	208	29

Notes:

1. Junctions with (N/A) are not included in the fire flow evaluation because they are at the end of service lines without hydrants and are not intended to provide fire flow.

2. Junctions with less than the needed fire flow are within 300 ft of another junction with sufficient fire flow.

3. 2012 Maximum day demand with all potable irrigation added is assumed to be 4279 gpm.

4. Fire flow varies for each location in the system. The model checks each location for MDD plus the location fire flow requirement.

All Distribution Improvements Constructed: Maximum Day Demand Plus Fire Largest Pump Offline (All Irrigation from potable)				
Junction ID	Static Pressure (psi)	Needed Fire Flow (gpm)	Available Fire Flow (gpm)	Residual Pressure (psi)
1171	63	1,000	3,000	54
417	64	2,000	179	25
1174	64	2,000	2,500	50
936	65	2,000	297	26
415	65	2,000	352	26
794	65	1,000	(N/A)	(N/A)
917	65	1,000	(N/A)	(N/A)
914	66	2,000	2,500	63
428	66	1,000	446	25
424	66	1,000	617	25
733	66	1,000	2,237	25
420	66	1,000	1,528	25
164	66	1,000	3,000	60
443	66	1,000	3,000	58
426	66	1,000	2,769	25
166	66	1,000	3,000	60
168	66	1,000	3,000	58
174	66	1,000	3,000	39
170	66	1,000	3,000	60
832	66	2,000	2,500	63
172	66	1,000	3,000	60
419	66	1,000	3,000	60
586	66	2,000	2,500	64
784	66	2,000	2,500	64
482	66	1,000	3,000	51
1123	66	1,000	3,000	52
826	67	2,000	2,500	64
791	67	2,000	2,500	67
627	67	2,000	2,500	35
599	67	2,000	2,500	53
600	67	2,000	2,500	54
178	67	2,000	2,500	55
176	67	2,000	2,500	55
458	67	1,000	(N/A)	(N/A)
1158	68	1,000	3,000	64
608	68	1,000	3,000	64
1018	68	1,000	3,000	63
1154	68	1,000	3,000	64
1150	68	1,000	3,000	64
1433	68	1,000	1,394	25
1430	68	1,000	1,362	25
247	68	1,000	3,000	48
243	68	1,000	3,000	34
52	68	1,000	3,000	55
710	68	2,000	2,500	64
655	68	2,000	2,500	65
241	68	1,000	1,558	25
486	68	1,000	148	25

245	68	1,000		1,433	25
1351	68	2,000		2,500	65
928	68	2,000		2,500	65
1445	68	1,000		3,000	56
436	68	2,000		955	25
1463	68	1,000		1,126	25
274	68	2,000		2,500	60
261	68	1,000		3,000	28
434	68	2,000		2,500	62
1146	68	1,000		3,000	65
155	68	1,000		3,000	57
157	68	1,000		3,000	57
263	68	1,000		3,000	35
800	68	2,000		2,500	64
1088	68	2,000		2,500	64
1090	68	2,000		2,500	65
60	68	2,000		2,500	64
159	68	1,000		3,000	59
1142	68	1,000		3,000	65
665	68	1,000		3,000	49
58	68	1,000		3,000	63
257	68	1,000		1,847	25
430	68	1,000		2,694	25
265	68	1,000		3,000	47
56	68	1,000		3,000	63
162	68	1,000		3,000	63
255	68	1,000		2,091	25
237	68	1,000	(N/A)		(N/A)
251	68	1,000		660	25
239	68	1,000	(N/A)		(N/A)
439	68	1,000		3,000	40
253	68	1,000		1,948	25
54	68	1,000		3,000	58
249	68	1,000		1,294	25
114	68	1,000		3,000	56
112	68	1,000		3,000	59
116	68	1,000		3,000	55
50	68	1,000		3,000	63
48	68	1,000		3,000	63
118	68	1,000		3,000	56
232	68	1,000		1,471	25
225	68	1,000		1,607	25
109	68	1,000		3,000	60
301	68	2,000		2,500	63
120	68	1,000		3,000	59
1363	68	1,000		1,126	25
1357	68	1,000		1,119	25
480	68	1,000		3,000	65
107	68	1,000		3,000	57
1360	68	1,000		3,000	56
612	68	2,000		2,207	25

105	68	2,000	2,500	61
987	68	1,000	1,303	25
1442	68	1,000	1,068	25
1439	68	1,000	1,067	25
1162	68	1,000	3,000	65
409	68	2,000	2,500	64
227	68	1,000	3,000	63
484	68	1,000	3,000	63
234	68	1,000	3,000	65
1460	69	1,000	1,117	25
454	69	1,000	142	25
1138	69	1,000	3,000	65
1134	69	1,000	3,000	65
1354	69	2,000	2,165	25
1130	69	2,000	2,500	67
407	69	2,000	2,500	66
1436	69	1,000	1,087	25
342	69	1,000	3,000	44
339	69	1,000	3,000	43
334	69	1,000	1,661	26
336	69	1,000	3,000	61
338	69	1,000	3,000	64
138	69	1,000	3,000	65
323	69	1,000	3,000	65
320	69	1,000	3,000	65
96	69	1,000	3,000	65
330	69	1,000	1,922	25
328	69	1,000	1,640	25
97	69	1,000	3,000	60
314	69	1,000	2,238	25
326	69	1,000	1,636	25
312	69	1,000	3,000	37
28	69	2,000	(N/A)	(N/A)
308	69	1,000	2,111	25
961	69	1,000	2,125	25
99	69	2,000	2,500	62
1457	69	1,000	2,812	25
316	69	1,000	2,307	25
259	69	1,000	1,594	25
303	69	2,000	(N/A)	(N/A)
448	69	1,000	1,648	25
332	69	1,000	3,000	58
1180	69	1,000	3,000	62
634	69	1,000	3,000	61
456	69	1,000	3,000	64
1212	69	1,000	3,000	66
318	69	1,000	3,000	63
271	69	1,000	1,711	25
1004	69	2,000	2,500	67
310	69	2,000	2,500	64
964	69	2,000	2,500	64

488	69	1,000	3,000	68
1490	69	2,000	2,303	25
101	69	2,000	2,500	65
1304	69	2,000	2,500	67
293	69	2,000	2,500	65
1339	69	2,000	2,500	65
446	69	2,000	2,500	33
528	69	2,000	2,500	31
1609	69	1,000	(N/A)	(N/A)
530	69	2,000	2,500	31
1366	69	2,000	2,176	25
525	69	2,000	2,500	37
1298	69	2,000	2,500	55
730	69	2,000	2,500	38
1320	69	2,000	2,500	63
1240	69	2,000	2,500	59
297	69	1,000	736	25
299	69	2,000	2,500	66
1300	69	2,000	2,500	43
1236	69	1,000	3,000	56
1258	69	2,000	2,500	65
1262	69	1,000	3,000	64
1266	69	1,000	3,000	65
518	69	2,000	2,500	56
1270	69	1,000	3,000	64
508	69	2,000	2,500	34
1274	69	1,000	3,000	64
295	69	1,000	3,000	41
1369	69	2,000	2,500	41
1232	69	1,000	3,000	61
352	69	1,000	3,000	48
348	69	1,000	1,948	25
103	69	2,000	2,500	66
135	69	1,000	3,000	64
532	69	1,000	3,000	64
813	69	2,000	2,500	67
1427	69	1,000	3,000	64
688	69	2,000	2,500	67
140	69	1,000	3,000	63
1451	69	2,000	2,500	39
354	69	1,000	3,000	66
1448	69	2,000	2,500	29
1125	69	2,000	2,500	67
405	70	2,000	2,363	25
1335	70	2,000	2,500	61
1372	70	2,000	2,500	43
1254	70	2,000	2,500	66
1250	70	2,000	2,500	67
1316	70	2,000	2,500	67
470	70	2,000	59	25
1454	70	1,000	1,126	25

187	70	2,000	2,500	45
181	70	2,000	2,500	47
185	70	2,000	2,500	49
182	70	2,000	2,500	50
1378	70	2,000	2,500	48
1375	70	2,000	2,500	43
1493	70	2,000	2,500	54
66	70	2,000	2,500	59
68	70	2,000	2,500	59
70	70	2,000	2,500	59
876	70	2,000	2,500	58
574	70	1,000	1,865	25
572	70	1,000	3,000	34
576	70	1,000	3,000	44
64	70	2,000	2,500	63
569	70	1,000	3,000	48
189	70	1,000	3,000	53
191	70	1,000	3,000	56
1487	70	1,000	3,000	50
589	70	2,000	2,500	61
193	70	1,000	3,000	61
590	70	2,000	2,500	63
278	70	2,000	2,500	61
280	70	2,000	2,500	61
642	70	1,000	3,000	56
631	70	1,000	3,000	61
276	70	2,000	2,500	62
62	70	2,000	2,500	65
153	70	2,000	2,500	63
1082	70	2,000	2,500	66
451	70	2,000	2,500	68
924	70	2,000	2,500	65
403	70	2,000	2,500	46
414	70	2,000	2,500	50
490	70	2,000	2,275	25
1078	70	2,000	2,500	65
836	70	1,000	3,000	66
1168	70	1,000	3,000	66
644	70	1,000	3,000	66
1246	70	2,000	2,500	49
43	70	2,000	2,500	55
41	70	2,000	2,500	62
37	70	2,000	2,500	65
45	70	2,000	2,500	65
39	70	2,000	2,500	63
220	70	2,000	1,441	25
506	70	2,000	2,500	49
291	70	2,000	2,500	49
229	70	1,000	3,000	60
1111	70	2,000	2,500	64
1405	70	1,000	1,141	25

1184	70	2,000	2,500	66
1499	70	2,000	2,500	37
1396	70	2,000	2,500	67
1507	70	2,000	2,474	25
1399	70	1,000	3,000	67
1289	70	2,000	2,500	62
1504	70	2,000	2,500	59
967	71	1,000	1,033	25
503	71	2,000	2,500	51
498	71	2,000	2,318	25
499	71	2,000	2,456	25
1312	71	2,000	2,500	68
1195	71	2,000	2,500	62
35	71	2,000	2,500	44
33	71	2,000	2,500	56
1402	71	1,000	1,159	25
501	71	2,000	2,500	63
31	71	2,000	2,500	60
29	71	2,000	2,500	60
510	71	2,000	2,500	61
1308	71	2,000	2,500	68
512	71	2,000	2,500	44
288	71	2,000	2,500	38
1190	71	2,000	2,500	69
1496	71	2,000	966	25
1481	71	2,000	2,500	42
493	71	1,000	995	25
371	71	1,000	3,000	60
88	71	1,000	3,000	67
1466	71	2,000	2,500	54
90	71	1,000	3,000	61
92	71	1,000	3,000	61
580	71	1,000	3,000	53
375	71	1,000	2,706	25
721	71	1,000	3,000	65
94	71	1,000	3,000	65
649	71	1,000	3,000	66
648	71	1,000	3,000	66
151	71	2,000	2,500	61
492	71	1,000	3,000	51
286	71	2,000	2,500	69
970	71	1,000	3,000	63
1408	71	1,000	3,000	53
1202	71	1,000	3,000	63
549	71	1,000	2,300	25
551	71	1,000	2,503	25
1199	71	1,000	3,000	66
547	71	1,000	2,319	25
557	71	1,000	1,796	25
614	71	1,000	2,666	25
559	71	1,000	1,726	25

212	71	1,000	2,970	25
210	71	1,000	3,000	30
390	71	1,000	1,618	25
544	71	1,000	2,536	25
208	71	1,000	3,000	36
387	71	1,000	1,446	25
379	71	1,000	2,466	25
71	71	2,000	2,500	62
73	71	1,000	3,000	60
369	71	1,000	2,632	25
364	71	1,000	1,723	25
851	71	1,000	1,179	25
75	71	1,000	3,000	62
392	71	1,000	1,987	25
196	71	1,000	3,000	62
195	71	1,000	3,000	62
77	71	1,000	3,000	66
381	71	1,000	3,000	38
79	71	1,000	3,000	67
198	71	1,000	3,000	64
845	71	1,000	3,000	67
85	71	1,000	3,000	67
87	71	1,000	3,000	66
81	71	1,000	3,000	68
367	71	1,000	3,000	67
377	71	1,000	3,000	67
768	71	1,000	(N/A)	(N/A)
522	71	2,000	2,500	66
206	71	1,000	3,000	60
361	71	1,000	3,000	67
83	71	1,000	3,000	68
200	71	1,000	3,000	69
400	71	1,000	3,000	68
204	71	1,000	3,000	69
1469	71	2,000	2,500	41
214	71	1,000	3,000	69
149	71	2,000	2,500	62
147	71	2,000	2,500	64
359	71	2,000	2,500	49
398	71	1,000	930	25
145	71	1,000	3,000	59
356	71	1,000	1,244	25
396	71	1,000	3,000	44
1294	71	2,000	2,500	56
143	71	1,000	3,000	63
1420	71	1,000	3,000	61
1423	71	1,000	3,000	62
141	71	1,000	3,000	69
1411	71	1,000	3,000	59
622	72	1,000	3,000	69
1484	72	1,000	3,000	55

1478	72	1,000	3,000	60
1472	72	1,000	1,140	25
1475	72	1,000	1,143	25
810	72	1,000	3,000	56
1343	72	1,000	3,000	62
1227	72	1,000	3,000	39
1417	72	1,000	3,000	61
983	72	1,000	1,789	25
463	72	1,000	1,144	25
958	72	1,000	1,141	25
131	72	1,000	3,000	58
475	72	1,000	3,000	56
1007	72	1,000	3,000	63
137	72	1,000	3,000	63
1225	72	1,000	3,000	49
1011	72	1,000	3,000	64
625	72	1,000	3,000	72
467	72	1,000	3,000	38
133	72	1,000	3,000	60
478	72	1,000	3,000	48
1414	72	1,000	3,000	63
461	72	1,000	3,000	65
1208	72	1,000	3,000	65
637	72	1,000	3,000	55
345	72	1,000	3,000	63
553	72	1,000	2,056	25
980	72	1,000	2,022	25
974	73	2,000	2,500	65
977	73	2,000	2,500	49
1024	73	2,000	2,500	61
127	73	2,000	2,500	66
472	73	2,000	2,500	26
129	73	2,000	2,500	60
1015	73	1,000	3,000	55
561	73	2,000	2,500	66
565	73	2,000	2,500	65
1349	73	2,000	2,500	66
1113	73	2,000	2,500	56
563	73	2,000	2,500	61
1599	73	1,000	(N/A)	(N/A)
125	73	2,000	2,500	67
124	73	2,000	2,500	64
284	75	2,000	2,500	55
1188	77	2,000	2,500	73
1186	78	2,000	2,500	75
1117	89	1,000	3,000	80

Notes:

1. Junctions with (N/A) are not included in the fire flow evaluation because they are at the end of service lines without hydrants and are not intended to provide fire flow.
2. Junctions with less than the needed fire flow are within 300 ft of another junction with sufficient fire flow.

3. Future Maximum day demand with all potable irrigation is assumed to be 5432 gpm.

4. Fire flow varies for each location in the system. The model checks each location for MDD plus the location fire flow requirement.

2012 Existing System: Peak Hour Demands if All irrgation is from Potable	
Junction ID	Pressure (psi)
637	0
608	0
488	0
634	0
1427	0
1018	0
482	0
486	0
484	0
642	0
665	0
458	0
417	5
336	5
334	5
480	5
332	5
330	5
328	6
936	6
415	6
456	7
784	7
586	7
832	7
914	7
428	7
419	7
227	7
420	7
733	7
234	7
424	7
987	7
172	7
170	7
174	7
168	7
166	7
426	7
443	7
164	8
1430	8
1433	8
225	8

232	8
1154	8
612	8
826	8
791	8
243	8
326	8
241	8
1399	8
239	8
237	8
120	8
118	8
116	8
114	9
1150	9
627	9
1363	9
28	9
176	9
451	9
178	9
599	9
600	9
112	9
1360	9
229	9
245	9
220	10
1357	10
48	10
247	10
1146	10
1445	10
50	10
52	10
1274	10
1270	10
928	10
1351	10
710	10
655	10
454	10
1266	10
1262	10
1142	10
251	10

249	10
439	10
162	10
409	10
54	10
56	10
60	10
1090	10
800	10
1088	10
58	10
430	10
265	10
109	10
1463	10
253	10
1442	10
1396	10
159	11
318	11
316	11
39	11
436	11
37	11
45	11
407	11
434	11
41	11
1258	11
43	11
314	11
263	11
31	11
29	11
35	11
33	11
1490	11
1195	11
261	11
1339	11
255	11
1408	11
157	11
274	11
1460	11
1335	11
1354	11

155	11
338	11
339	11
405	11
1439	11
257	12
342	12
138	12
323	12
414	12
403	12
490	12
1078	12
924	12
1082	12
644	12
62	12
1168	12
836	12
1457	12
1417	12
472	12
1138	12
310	12
461	12
1504	12
312	12
470	12
181	12
1493	12
182	12
64	12
187	13
185	13
308	13
1507	13
107	13
876	13
94	13
648	13
649	13
375	13
721	13
492	13
580	13
92	13
90	13

88	13
66	13
493	13
1499	13
68	13
70	13
320	14
1496	14
1402	14
301	14
259	14
153	14
478	14
276	14
448	14
961	14
1411	14
271	14
303	15
377	15
379	15
381	15
1436	15
1405	15
1484	15
71	15
87	15
1420	15
73	15
85	15
977	15
364	15
475	15
974	15
367	15
845	15
75	15
1208	15
77	15
1134	15
79	15
131	15
1414	16
81	16
345	16
1378	16
958	16

348	16
137	16
1007	16
565	16
1487	16
463	16
563	16
1113	16
561	16
1024	16
127	16
1202	16
576	16
189	16
96	16
574	16
572	16
293	16
1240	16
151	16
129	16
1011	16
1015	16
1481	16
97	16
297	16
1236	16
970	16
569	16
191	16
589	16
590	16
278	16
530	16
528	16
124	16
125	16
280	16
446	16
135	16
532	16
354	16
352	16
295	16
631	16
193	16
1466	16

1232	16
518	16
1300	16
371	16
525	17
730	17
105	17
1125	17
99	17
369	17
851	17
508	17
299	17
1454	17
1289	17
140	17
288	17
1366	17
1375	17
149	17
467	17
1451	17
133	17
1254	17
1227	17
1294	17
1478	17
964	18
1004	18
1372	18
967	18
286	18
147	18
501	18
498	18
499	18
1246	18
291	18
359	18
512	18
1469	18
195	18
101	18
1308	18
392	18
522	18
503	18

196	18
510	18
1423	18
506	18
387	18
1199	18
1312	18
145	18
361	18
356	18
83	19
549	19
551	19
557	19
614	19
547	19
559	19
212	19
210	19
390	19
544	19
1472	19
208	19
1250	19
400	19
143	19
398	19
396	19
198	19
1320	19
214	19
810	19
1475	19
983	19
141	19

1369	20
1448	20
206	20
1343	20
553	20
980	20
204	20
200	20
1130	21
202	21
622	21
103	21
813	21
284	21
688	22
625	22

Notes:

1. 2012 Peak Hour demand if all irrigation is from potable is 6419 gpm.

Future System: Peak Hour Demands if All irrgation is from Potable	
Junction ID	Pressure (psi)
417	61
1171	62
936	63
415	63
1174	63
428	64
424	64
733	64
420	64
426	64
164	64
443	64
166	64
168	64
174	64
170	64
794	64
917	64
172	64
419	64
458	65
914	65
832	65
586	65
482	65
1123	65
784	66
627	66
599	66
600	66
178	66
176	66
470	66
247	67
243	67
52	67
241	67
1150	67
1154	67
1018	67
245	67
608	67
1158	67
436	67
826	67

239	67
409	67
116	67
107	67
118	67
232	67
225	67
1357	67
105	67
120	67
1363	67
301	67
480	67
1360	67
1436	67
987	67
1138	68
1457	68
259	68
1162	68
1134	68
448	68
342	68
339	68
407	68
271	68
1130	68
227	68
334	68
336	68
338	68
1180	68
484	68
528	68
1609	68
446	68
530	68
1354	68
525	68
730	68
138	68
323	68
1490	68
320	68
234	68
96	68
1300	68

261	67
257	67
1463	67
263	67
155	67
157	67
274	67
251	67
434	67
430	67
255	67
159	67
800	67
1088	67
1090	67
60	67
265	67
665	67
58	67
56	67
486	67
253	67
162	67
249	67
439	67
710	67
1433	67
655	67
54	67
1430	67
1351	67
612	67
1445	67
928	67
1442	67
1439	67
791	67
1146	67
1142	67
1460	67
454	67
237	67
50	67
109	67
112	67
48	67
114	67

97	68
1298	68
297	68
1240	68
330	68
1339	68
328	68
518	68
314	68
312	68
99	68
1236	68
326	68
295	68
308	68
961	68
1004	68
352	68
1232	68
964	68
101	68
348	68
1304	68
135	68
532	68
1451	68
1320	68
316	68
303	68
140	68
332	68
634	68
318	68
456	68
1212	68
310	68
1448	68
1366	68
103	68
405	68
813	68
1335	68
354	68
688	68
293	68
1369	68
1125	68

299	68
187	68
181	68
185	68
182	68
1493	68
66	68
68	68
876	68
70	68
64	68
574	68
1258	68
1262	68
572	68
589	68
1454	68
1266	68
576	68
569	68
189	68
590	68
191	68
278	68
1270	68
1487	68
280	68
1274	68
193	68
508	68
276	68
642	68
631	68
153	68
62	68
1082	68
924	68
403	68
414	68
490	69
1372	69
1078	69
28	69
836	69
1427	69
1168	69
644	69

1378	69
1375	69
1499	69
1507	69
1254	69
1250	69
1111	69
1316	69
488	69
1289	69
1405	69
1504	69
1496	69
1399	69
1481	69
967	69
1246	69
43	69
1466	69
41	69
493	69
371	69
1402	69
45	69
37	69
88	69
506	69
39	69
220	69
291	69
90	69
151	69
92	69
580	69
375	69
229	69
721	69
94	69
649	69
648	69
549	69
551	69
557	69
547	69
614	69
559	69
492	69

212	69
210	69
390	69
544	69
208	70
387	70
451	70
379	70
71	70
73	70
851	70
369	70
364	70
75	70
970	70
392	70
196	70
195	70
77	70
1408	70
381	70
79	70
845	70
198	70
85	70
87	70
81	70
367	70
377	70
522	70
768	70
206	70
1202	70
361	70
83	70
1199	70
1469	70
400	70
200	70
204	70
1184	70
149	70
214	70
503	70
1312	70
1396	70
147	70

498	70
499	70
1195	70
35	70
33	70
359	70
1294	70
501	70
31	70
510	70
29	70
1308	70
145	70
356	70
398	70
396	70
1420	70
512	70
1423	70
288	70
1484	70
1190	70
143	70
1478	70
1472	70
1411	70
983	70
1475	70
141	70
810	70
1343	70
1227	70
1417	71
286	71
622	71
553	71
980	71
958	71
463	71
131	71
475	71
1007	71
137	71
1225	71
1011	71
467	71
133	71

478	71
1414	71
461	71
1208	71
637	71
345	71
974	71
977	71
1024	72
127	72
472	72
129	72
1015	72
561	72
565	72
1349	72
1113	72
563	72
1599	72
125	72
124	72
625	72
284	74
1188	76
1186	78
1117	87

Notes:

1. Future Peak Hour Demand with all irrigation from potable is 8148 gpm.

Junction Inputs: All Modeled Nodes					
Junction ID	Junction Label	X (ft)	Y (ft)	Elevation (ft)	Notes
28	J-3	1,453,432.93	467,609.47	3,574.00	end of service line
29	J-4	1,451,345.16	467,557.02	3,570.00	
31	J-5	1,451,093.97	467,479.37	3,570.00	
33	J-6	1,451,347.29	467,134.52	3,570.00	
35	J-7	1,451,547.39	467,151.55	3,570.00	
37	J-8	1,450,876.42	466,598.03	3,571.00	
39	J-9	1,451,032.25	466,597.66	3,571.00	
41	J-10	1,450,732.42	466,598.73	3,571.00	
43	J-11	1,450,394.72	466,600.17	3,571.00	
45	J-12	1,450,880.40	466,598.56	3,571.00	
48	J-13	1,450,880.49	465,417.83	3,575.00	
50	J-14	1,450,860.50	465,417.50	3,575.00	
52	J-15	1,450,862.44	464,460.11	3,575.00	
54	J-16	1,450,863.76	463,915.96	3,574.00	
56	J-17	1,450,866.02	463,382.88	3,574.00	
58	J-18	1,450,849.74	463,178.74	3,574.00	
60	J-19	1,450,846.38	462,801.46	3,574.00	
62	Flow Hydrant 6	1,450,838.78	461,661.57	3,570.00	
64	J-21	1,450,217.00	461,657.51	3,570.00	
66	J-22	1,449,726.37	461,654.79	3,570.00	
68	J-23	1,449,546.95	461,658.35	3,570.00	
70	J-24	1,449,495.81	461,645.10	3,570.00	
71	J-25	1,449,334.50	461,640.74	3,567.00	
73	J-26	1,449,102.34	461,636.27	3,567.00	
75	J-27	1,448,997.93	461,631.86	3,567.00	
77	J-28	1,448,847.09	461,627.66	3,567.00	
79	J-29	1,448,817.18	461,622.25	3,567.00	
81	J-30	1,448,817.06	461,642.38	3,567.00	
83	J-31	1,448,816.59	462,378.00	3,567.00	
85	J-32	1,448,817.39	461,561.34	3,567.00	
87	J-33	1,448,832.93	461,554.49	3,567.00	
88	J-34	1,448,831.87	460,296.03	3,568.00	
90	J-35	1,448,832.87	459,990.31	3,568.00	
92	J-36	1,448,832.32	459,798.67	3,568.00	
94	J-37	1,448,832.18	459,490.78	3,568.00	
96	J-38	1,448,501.82	465,464.22	3,573.00	
97	J-39	1,448,676.32	465,464.82	3,573.00	
99	J-40	1,449,020.91	465,465.18	3,573.00	
101	J-41	1,449,356.47	465,417.67	3,573.00	
103	J-42	1,449,724.15	465,418.15	3,573.00	
105	J-43	1,450,043.46	465,417.91	3,575.00	
107	J-44	1,450,394.44	465,419.81	3,575.00	
109	J-45	1,450,733.30	465,417.86	3,575.00	
112	J-46	1,451,028.13	465,418.09	3,575.00	
114	J-Hyd 32	1,451,365.29	465,418.22	3,575.00	FT: 1,007 gpm

116	J-48	1,451,691.69	465,418.26	3,575.00	
118	J-49	1,451,867.28	465,418.09	3,575.00	
120	J-Hyd 33	1,452,004.55	465,419.37	3,575.00	FT: 68/60
124	J-52	1,445,919.02	463,696.46	3,562.00	
125	J-53	1,446,254.19	463,695.77	3,562.00	
127	J-54	1,446,253.11	463,938.56	3,563.00	
129	J-55	1,446,708.23	463,941.14	3,563.00	
131	J-56	1,447,316.18	463,938.26	3,565.00	
133	J-57	1,448,006.24	463,938.40	3,565.00	
135	J-58	1,448,498.01	463,938.22	3,572.00	
137	J-59	1,447,510.69	463,948.38	3,565.00	
138	J-60	1,447,511.48	465,464.76	3,573.00	
140	J-61	1,448,496.99	463,564.43	3,572.00	
141	J-62	1,448,498.04	463,177.88	3,567.00	
143	J-63	1,448,656.86	463,177.43	3,567.00	
145	J-64	1,448,996.19	463,178.09	3,567.00	
147	J-65	1,449,336.95	463,178.27	3,567.00	
149	J-66	1,449,539.30	463,178.35	3,567.00	
151	J-67	1,449,695.87	463,144.21	3,568.00	
153	J-68	1,450,026.14	463,185.64	3,570.00	
155	J-69	1,450,218.73	463,178.66	3,574.00	
157	J-70	1,450,366.90	463,178.10	3,574.00	
159	J-71	1,450,715.61	463,179.65	3,574.00	
162	J-Flow Hydrant 3	1,451,015.50	463,395.79	3,574.00	
164	J-73	1,451,318.44	463,422.88	3,580.00	
166	J-74	1,451,553.32	463,444.55	3,580.00	
168	J-75	1,451,626.36	463,451.91	3,580.00	
170	J-76	1,451,782.82	463,466.51	3,580.00	
172	J-77	1,452,174.13	463,504.29	3,580.00	
174	J-78	1,451,781.51	463,910.01	3,580.00	
176	J-79	1,451,468.94	463,068.16	3,576.00	
178	J-80	1,451,443.42	463,068.68	3,576.00	
181	J-81	1,449,581.44	460,928.18	3,570.00	
182	Pressure Hydrant 6A	1,450,216.88	460,955.43	3,570.00	
185	J-83	1,449,679.48	460,954.45	3,570.00	
187	J-84	1,449,507.42	460,989.83	3,570.00	
189	J-85	1,448,074.69	460,859.02	3,570.00	
191	J-86	1,447,873.53	461,303.87	3,570.00	
193	J-87	1,447,844.16	461,592.59	3,570.00	
195	J-88	1,448,149.87	461,597.41	3,567.00	
196	J-89	1,448,164.70	461,633.28	3,567.00	
198	J-90	1,448,330.57	462,018.58	3,567.00	
200	J-91	1,448,495.62	462,018.87	3,567.00	
204	J-93	1,448,497.00	462,056.29	3,567.00	
206	J-94	1,448,656.47	462,055.77	3,567.00	
208	J-95	1,448,330.35	462,057.62	3,567.00	
210	J-96	1,447,997.26	462,059.29	3,567.00	

212	J-97	1,447,848.88	462,061.31	3,567.00	
214	J-98	1,448,497.53	462,377.96	3,567.00	
220	J-100	1,451,369.01	466,713.72	3,571.00	
225	J-102	1,451,372.58	465,827.50	3,575.00	
227	J-103	1,451,370.88	466,194.92	3,575.00	
229	J-104	1,451,368.50	466,558.69	3,571.00	
232	J-105	1,451,691.66	465,823.36	3,575.00	
234	J-106	1,452,362.90	465,823.18	3,575.00	
237	J-107	1,451,920.74	465,627.91	3,575.00	service line end
239	J-108	1,452,006.42	465,679.72	3,575.00	service line end
241	J-109	1,451,363.70	464,646.65	3,575.00	
243	J-110	1,451,356.43	464,535.53	3,575.00	
245	J-111	1,451,026.48	464,646.17	3,575.00	
247	J-112	1,451,035.53	464,489.69	3,575.00	
249	J-113	1,451,032.95	464,269.59	3,574.00	
251	J-114	1,451,231.98	464,267.81	3,574.00	
253	J-Press Hydrant 3B	1,450,721.81	464,268.52	3,574.00	
255	J-116	1,450,387.76	464,268.14	3,574.00	
257	J-117	1,450,216.71	464,286.19	3,574.00	
259	J-118	1,450,062.15	464,286.47	3,572.00	
261	J-119	1,450,217.20	463,933.31	3,574.00	
263	J-120	1,450,367.82	463,932.94	3,574.00	
265	J-121	1,450,715.18	463,932.85	3,574.00	
271	J-122	1,450,042.01	464,317.56	3,572.00	
274	J-123	1,450,366.50	462,785.61	3,574.00	
276	J-124	1,450,027.24	462,785.68	3,570.00	
278	J-125	1,450,034.75	462,376.31	3,570.00	
280	J-126	1,449,694.55	462,378.57	3,570.00	
284	J-128	1,449,143.65	468,125.80	3,560.00	
286	J-129	1,448,787.30	467,413.08	3,570.00	
288	J-130	1,449,143.60	467,707.06	3,570.00	
291	J-131	1,449,878.20	466,751.05	3,571.00	
293	J-132	1,449,022.26	466,200.63	3,573.00	
295	J-133	1,449,017.48	464,318.19	3,572.00	
297	J-134	1,449,016.61	463,702.80	3,572.00	
299	J-Flow Hydrant 4	1,449,354.25	466,199.66	3,573.00	
301	J-Hyd 11	1,448,658.18	466,200.60	3,575.00	FT: 71/70 (prev PH4b)
303	J-137	1,448,656.89	466,534.60	3,573.00	service line
308	J-139	1,448,353.71	466,011.28	3,573.00	
310	J-140	1,448,323.63	466,217.82	3,573.00	
312	J-Hyd 23	1,448,352.77	465,852.43	3,573.00	FT: 68/67
314	J-142	1,448,019.41	465,850.95	3,573.00	
316	J-143	1,448,017.97	466,172.94	3,573.00	
318	J-Hyd2	1,448,013.16	466,216.85	3,573.00	FT: 411 gpm
320	J-145	1,448,352.07	465,465.28	3,573.00	
323	J-146	1,448,017.44	465,464.90	3,573.00	
326	J-147	1,447,681.88	465,849.31	3,573.00	

328	J-148	1,447,346.60	465,842.74	3,573.00	
330	J-149	1,447,171.60	465,840.40	3,573.00	
332	J-150	1,447,168.36	466,090.13	3,573.00	
334	J-151	1,447,172.93	465,635.85	3,573.00	
336	J-152	1,447,170.62	465,515.51	3,573.00	
338	J-153	1,447,166.15	465,464.78	3,573.00	
339	J-154	1,447,343.91	465,464.78	3,573.00	
342	J-155	1,447,684.43	465,465.96	3,573.00	
345	J-Hyd 41	1,448,018.32	464,704.92	3,565.00	FT: 70/68
348	J-157	1,448,358.00	463,564.38	3,572.00	
352	J-158	1,448,673.22	464,318.27	3,572.00	
354	J-159	1,448,500.00	465,093.68	3,572.00	
356	J-160	1,448,996.26	463,398.24	3,567.00	
359	J-161	1,449,354.10	463,511.70	3,567.00	
361	J-162	1,448,998.37	462,377.90	3,567.00	
364	J-163	1,448,847.09	461,283.14	3,567.00	
367	J-Pressure Hydrant 9A	1,448,847.20	460,991.41	3,567.00	
369	J-165	1,448,649.20	460,991.79	3,567.00	
371	J-166	1,448,648.76	460,294.77	3,568.00	
375	J-167	1,448,847.28	459,564.12	3,568.00	
377	J-168	1,448,848.18	460,789.59	3,567.00	
379	J-169	1,449,228.89	460,821.11	3,567.00	
381	J-170	1,448,848.19	460,818.59	3,567.00	
387	J-171	1,447,996.11	461,632.09	3,567.00	
390	J-172	1,447,996.01	462,418.86	3,567.00	
392	J-173	1,448,327.19	461,634.30	3,567.00	
396	J-174	1,448,334.39	463,176.37	3,567.00	
398	J-175	1,448,335.02	463,326.22	3,567.00	
400	J-176	1,448,656.48	462,377.93	3,567.00	
403	J-177	1,449,506.15	460,465.65	3,570.00	
405	J-178	1,449,504.50	459,561.85	3,571.00	
407	J-179	1,449,503.70	459,013.11	3,573.00	
409	J-180	1,449,503.00	458,624.30	3,574.00	
414	J-182	1,449,831.87	460,464.94	3,570.00	
415	J-183	1,450,497.64	458,983.52	3,581.00	
417	J-184	1,452,194.89	458,983.50	3,583.00	
419	J-185	1,452,174.39	463,521.75	3,580.00	
420	J-186	1,451,792.45	463,485.96	3,580.00	
424	J-188	1,451,328.69	463,455.23	3,580.00	
426	J-189	1,451,326.91	463,915.58	3,580.00	
428	J-190	1,451,635.03	463,998.94	3,580.00	
430	J-191	1,450,715.31	463,909.30	3,574.00	
434	J-192	1,450,713.42	462,781.56	3,574.00	
436	J-193	1,450,716.29	462,641.18	3,574.00	
439	J-194	1,451,015.30	463,916.63	3,574.00	
443	J-196	1,451,380.35	463,427.91	3,580.00	
446	J-197	1,449,805.46	464,318.23	3,572.00	

448	J-198	1,450,062.42	464,318.20	3,572.00	
451	J-199	1,448,198.04	466,882.29	3,572.00	
454	J-200	1,447,865.18	466,218.04	3,573.00	
456	J-201	1,447,680.11	466,175.22	3,573.00	
458	J-202	1,446,717.82	465,641.32	3,573.00	service line only
461	J-203	1,447,682.80	464,710.20	3,565.00	
463	J-204	1,447,656.13	463,948.22	3,565.00	
467	J-206	1,447,996.25	463,948.21	3,565.00	
470	J-207	1,447,663.37	463,287.00	3,566.00	
472	J-208	1,446,765.37	463,201.19	3,563.00	
475	J-209	1,447,316.21	463,948.21	3,565.00	
478	J-210	1,447,315.69	464,257.37	3,565.00	
480	J-211	1,452,172.96	465,475.22	3,575.00	
482	J-212	1,453,588.70	465,603.62	3,580.00	
484	J-213	1,451,529.24	466,197.63	3,575.00	
486	J-214	1,451,533.98	466,061.03	3,575.00	
488	J-215	1,452,344.02	466,376.34	3,574.00	
490	J-216	1,450,824.22	460,469.88	3,570.00	
492	J-217	1,449,252.05	459,991.99	3,568.00	
493	J-218	1,448,846.78	460,014.67	3,568.00	
498	J-219	1,450,867.35	467,175.65	3,570.00	
499	J-220	1,450,845.85	467,173.72	3,570.00	
501	J-221	1,450,885.90	467,559.84	3,570.00	
503	J-222	1,449,880.55	467,010.21	3,570.00	
506	J-Press Hydrant 4A	1,449,725.80	466,735.60	3,571.00	
508	J-224	1,449,345.74	466,697.59	3,573.00	
510	J-225	1,449,346.99	467,006.44	3,570.00	
512	J-226	1,449,243.65	467,113.86	3,570.00	
518	J-227	1,449,356.26	464,318.29	3,572.00	
522	J-228	1,449,336.15	462,377.80	3,567.00	
525	J-229	1,449,688.00	464,236.85	3,572.00	
528	J-230	1,450,008.98	464,001.02	3,572.00	
530	J-231	1,449,792.20	463,816.82	3,572.00	
532	J-232	1,448,499.69	464,317.94	3,572.00	
544	J-233	1,448,165.18	462,791.58	3,567.00	
547	J-234	1,447,845.99	462,792.70	3,567.00	
549	J-235	1,447,844.43	462,636.98	3,567.00	
551	J-236	1,447,846.08	462,389.59	3,567.00	
553	J-237	1,447,502.10	462,840.51	3,564.00	
557	J-238	1,447,507.10	462,127.24	3,567.00	
559	J-239	1,447,609.13	461,887.36	3,567.00	
561	J-240	1,446,249.69	464,319.44	3,563.00	
563	J-Hyd 53	1,445,852.28	464,977.56	3,563.00	FT:72/52
565	J-242	1,445,636.19	464,320.21	3,563.00	
569	J-244	1,448,148.40	461,331.98	3,570.00	
572	J-245	1,448,168.76	461,120.42	3,570.00	
574	J-246	1,448,334.26	461,231.55	3,570.00	

576	J-247	1,448,248.58	460,939.12	3,570.00	
580	J-248	1,448,997.31	459,990.19	3,568.00	
586	J-251	1,450,259.79	458,388.12	3,581.00	
589	J-252	1,450,215.03	461,976.73	3,570.00	
590	J-253	1,450,214.39	462,377.42	3,570.00	
599	J-254	1,451,378.69	463,009.33	3,576.00	
600	J-255	1,451,357.94	463,062.70	3,576.00	
608	J-256	1,452,028.46	465,080.26	3,576.00	
612	J-257	1,450,062.76	463,481.51	3,574.00	
614	J-Hyd 103	1,447,822.85	462,126.11	3,567.00	FT: 72/44
622	J-259	1,448,499.52	463,347.93	3,567.00	
625	J-SeniorAveDischarge	1,448,583.61	463,443.39	3,567.00	
627	J-261	1,451,458.56	462,566.31	3,576.00	
631	J-262	1,447,706.53	461,594.80	3,570.00	
634	J-263	1,447,345.84	466,086.38	3,573.00	
637	J-264	1,447,340.23	464,872.87	3,565.00	
642	J-266	1,447,636.00	461,633.77	3,570.00	
644	J-267	1,448,905.76	459,012.63	3,570.00	
648	J-269	1,448,817.28	459,509.03	3,568.00	
649	J-270	1,448,832.14	459,509.06	3,568.00	
655	J-271	1,449,687.44	459,012.48	3,575.00	
665	J-275	1,451,010.26	463,260.66	3,574.00	
688	J-4thAveDischarge	1,449,709.00	465,273.46	3,573.00	
710	J-282	1,449,829.04	459,013.45	3,575.00	
721	J-285	1,448,831.89	459,541.50	3,568.00	
730	J-288	1,449,687.13	464,318.04	3,572.00	
733	J-Press Hydrant 3A	1,451,633.49	463,488.30	3,580.00	
768	J-292	1,448,806.21	462,022.81	3,567.00	
784	J-HospitalSite	1,450,363.73	458,232.37	3,581.00	
791	J-295	1,450,671.65	458,231.84	3,579.00	
794	J-296	1,450,671.34	458,924.97	3,581.00	
800	J-297	1,450,839.20	462,383.03	3,574.00	
810	J-300	1,448,327.90	462,797.44	3,566.00	
813	J-301	1,449,774.36	465,417.88	3,573.00	
826	J-Flow Hydrant 1	1,450,228.63	457,907.84	3,579.00	
832	J-Press Hydrant 1A	1,450,127.44	458,480.13	3,581.00	
836	J-Press Hydrant 2A 1B	1,448,817.52	459,124.89	3,570.00	
845	J-Pressure Hydrant 9B	1,448,817.44	461,590.11	3,567.00	
851	J-Press Hydrant 2A	1,448,997.75	462,041.27	3,567.00	
876	Pressure Hydrant 6B	1,449,877.85	461,655.37	3,570.00	
914	J-321	1,450,094.20	458,627.38	3,581.00	
917	J-322	1,450,510.09	458,925.64	3,581.00	
924	J-323	1,450,873.54	460,947.23	3,570.00	
928	J-324	1,450,079.37	458,927.27	3,575.00	
936	J-326	1,450,740.69	458,983.43	3,581.00	
958	J-332	1,447,678.02	463,947.62	3,565.00	
961	J-333	1,448,657.34	466,013.07	3,573.00	

964	J-334	1,449,355.91	465,463.17	3,573.00	
967	J-Hyd 42	1,448,673.91	464,723.50	3,569.00	FT: 751 gpm
970	J-Hyd 51	1,448,348.39	464,324.21	3,568.00	FT: 71/68
974	J-Hyd 121	1,446,250.37	464,231.42	3,564.00	FT: 920 gpm
977	J-Hyd 47	1,445,792.36	464,320.58	3,564.00	FT: 88/52
980	J-Hyd 105	1,447,847.04	462,972.84	3,564.00	FT: 751 gpm
983	J-Hyd 106	1,447,298.66	462,629.60	3,565.00	FT: 70/42
987	J-Hyd 10	1,452,192.69	465,822.86	3,575.00	FT: 68/57
1004	J-343	1,449,372.39	465,089.14	3,573.00	
1007	J-344	1,447,510.41	463,938.23	3,565.00	
1011	J-345	1,447,655.86	463,938.21	3,565.00	
1015	J-346	1,446,830.45	463,937.76	3,563.00	
1018	J-347	1,451,692.48	465,080.27	3,576.00	
1024	J-349	1,445,727.90	463,941.80	3,563.00	
1078	J-350	1,450,875.19	460,470.25	3,570.00	
1082	J-351	1,450,874.26	461,661.69	3,570.00	
1088	J-352	1,450,854.39	462,382.96	3,574.00	
1090	J-353	1,450,845.62	462,776.80	3,574.00	
1111	J-354	1,446,279.07	465,463.14	3,570.00	
1113	J-355	1,446,279.61	464,927.23	3,563.00	
1117	J-356	1,446,255.39	461,593.90	3,527.00	
1123	J-357	1,453,669.21	465,638.25	3,580.00	
1125	J-358	1,448,994.12	465,097.49	3,572.00	
1130	J-359	1,449,706.24	465,077.39	3,574.00	
1134	J-360	1,450,036.63	465,062.84	3,574.00	
1138	J-361	1,450,383.96	465,067.25	3,574.00	
1142	J-362	1,450,722.32	465,055.96	3,575.00	
1146	J-363	1,450,851.38	465,053.28	3,575.00	
1150	J-364	1,451,023.81	465,048.51	3,576.00	
1154	J-365	1,451,366.30	465,044.87	3,576.00	
1158	J-366	1,452,189.56	465,056.87	3,576.00	
1162	J-367	1,452,383.99	465,633.21	3,575.00	
1168	J-369	1,448,820.54	459,030.02	3,570.00	
1171	J-370	1,446,866.04	459,033.26	3,586.00	
1174	J-372	1,452,164.34	458,931.34	3,583.00	
1180	J-375	1,446,862.77	461,593.20	3,572.00	
1184	J-376	1,452,363.74	468,249.60	3,571.00	
1186	J-377	1,450,887.41	468,250.26	3,552.00	
1188	J-378	1,449,551.75	468,248.36	3,556.00	
1190	J-379	1,449,553.83	467,380.58	3,570.00	
1195	J-381	1,450,876.97	467,092.84	3,570.00	
1199	J-382	1,448,499.77	464,698.56	3,568.00	
1202	J-383	1,448,349.37	464,689.08	3,568.00	
1208	J-384	1,447,509.43	464,710.60	3,565.00	
1212	J-385	1,447,492.36	466,200.34	3,573.00	
1225	J-390	1,447,617.01	463,563.19	3,565.00	
1227	J-391	1,448,017.59	463,563.42	3,566.00	

1232	J-392	1,448,669.40	463,947.51	3,572.00	
1236	J-393	1,449,012.43	463,934.87	3,572.00	
1240	J-394	1,449,355.46	463,925.84	3,572.00	
1246	J-395	1,450,068.32	466,586.41	3,571.00	
1250	J-396	1,449,724.51	466,211.75	3,572.00	
1254	J-397	1,450,063.91	466,198.53	3,572.00	
1258	J-398	1,450,385.68	466,194.73	3,573.00	
1262	J-399	1,450,725.08	466,190.33	3,573.00	
1266	J-400	1,450,879.35	466,207.96	3,573.00	
1270	J-401	1,451,029.21	466,181.51	3,573.00	
1274	J-402	1,451,029.21	466,212.36	3,573.00	
1289	J-404	1,449,518.36	462,377.15	3,569.00	
1294	J-405	1,449,537.54	463,510.88	3,567.00	
1298	J-406	1,449,513.28	463,931.23	3,572.00	
1300	J-407	1,449,522.31	464,321.65	3,572.00	
1304	J-408	1,449,538.11	465,086.70	3,573.00	
1308	J-409	1,449,556.43	466,974.41	3,570.00	
1312	J-410	1,449,538.37	466,712.62	3,570.00	
1316	J-411	1,449,537.13	466,201.58	3,572.00	
1320	J-412	1,449,537.92	465,414.02	3,573.00	
1335	J-416	1,449,828.28	459,963.18	3,571.00	
1339	J-417	1,450,160.34	459,939.53	3,572.00	
1343	J-418	1,448,497.85	462,797.68	3,566.00	
1349	J-420	1,445,603.81	464,351.15	3,563.00	
1351	J-421	1,450,182.56	458,927.14	3,575.00	
1354	J-422	1,450,389.27	465,820.26	3,574.00	
1357	J-423	1,450,729.92	465,814.55	3,575.00	
1360	J-424	1,450,878.37	465,806.94	3,575.00	
1363	J-425	1,451,026.81	465,810.74	3,575.00	
1366	J-426	1,450,058.13	465,822.16	3,573.00	
1369	J-427	1,449,719.38	465,827.87	3,573.00	
1372	J-428	1,449,355.66	465,823.90	3,572.00	
1375	J-429	1,449,020.72	465,825.80	3,571.00	
1378	J-430	1,448,676.25	465,839.13	3,571.00	
1396	J-436	1,452,360.76	467,607.52	3,571.00	
1399	J-437	1,447,513.51	465,850.72	3,570.00	
1402	J-438	1,448,017.92	465,077.38	3,569.00	
1405	J-439	1,448,351.91	465,084.99	3,570.00	
1408	J-440	1,447,682.97	465,088.80	3,568.00	
1411	J-441	1,447,504.08	465,100.21	3,567.00	
1414	J-442	1,447,511.92	464,320.67	3,565.00	
1417	J-443	1,447,680.00	464,318.23	3,566.00	
1420	J-444	1,448,017.38	464,312.14	3,567.00	
1423	J-445	1,448,367.94	463,937.91	3,567.00	
1427	J-447	1,451,530.90	466,374.07	3,573.00	
1430	J-448	1,451,693.43	465,614.57	3,576.00	
1433	J-449	1,451,369.90	465,612.19	3,576.00	

1436	J-450	1,450,040.68	464,684.84	3,573.00	
1439	J-451	1,450,387.04	464,673.42	3,574.00	
1442	J-452	1,450,723.89	464,656.30	3,574.00	
1445	J-453	1,450,853.30	464,816.16	3,575.00	
1448	J-454	1,449,707.53	464,688.34	3,572.00	
1451	J-455	1,449,364.97	464,695.95	3,572.00	
1454	J-456	1,449,005.28	464,686.43	3,571.00	
1457	J-457	1,450,219.91	463,540.41	3,572.00	
1460	J-458	1,450,362.64	463,542.31	3,573.00	
1463	J-459	1,450,714.71	463,530.89	3,574.00	
1466	J-460	1,449,691.72	462,778.40	3,568.00	
1469	J-461	1,449,337.27	462,790.29	3,567.00	
1472	J-462	1,448,994.71	462,783.16	3,566.00	
1475	J-463	1,448,654.53	462,776.02	3,566.00	
1478	J-464	1,448,815.15	462,026.67	3,566.00	
1481	J-465	1,449,334.32	462,014.49	3,568.00	
1484	J-466	1,448,831.42	461,168.77	3,566.00	
1487	J-467	1,448,212.42	460,553.90	3,570.00	
1490	J-468	1,449,829.12	459,549.78	3,572.00	
1493	J-469	1,450,215.56	461,308.60	3,570.00	
1496	J-470	1,449,499.52	461,306.22	3,568.00	
1499	J-471	1,449,677.94	461,322.87	3,569.00	
1504	J-472	1,449,503.85	459,980.46	3,569.00	
1507	J-473	1,449,505.97	460,823.27	3,569.00	
1599	J-476	1,445,601.19	464,965.43	3,563.00	
1609	J-477	1,449,996.23	463,797.99	3,572.00	

Notes:

1. X,Y Coordinates are in Idaho State Plane Central (feet) System.
2. Elevations are based on Google Earth ground elevations.

Pipe Inputs: All modeled pipes								
Pipe ID	Label	Start Node	Stop Node	Length (ft)	Diameter (in)	Material	Hazen-Williams C	Installation Year
1265	P-681	J-398	J-399	347	10	pvc	130	2032
1166	P-613	J-367	J-211	284	12	pvc	130	2032
1249	P-669	J-11	J-395	327	8	pvc	130	2032
1163	P-611	J-215	J-106	583	12	pvc	130	2032
1160	P-609	J-366	J-185	1535	12	pvc	130	2032
1257	P-675	J-396	J-397	364	10	pvc	130	2032
1159	P-608	J-211	J-366	438	12	pvc	130	2032
1261	P-678	J-397	J-398	334	10	pvc	130	2032
1281	P-693	J-447	J-104	347	8	pvc	130	2032
903	P-479	J-252	J-253	428	8	pvc	130	2032
1167	P-614	J-211	J-Hyd 33	195	8	pvc	130	2032
918	P-489	J-296	J-322	161	12	pvc	130	2032
919	P-490	J-322	J-421	328	12	pvc	130	2032
1269	P-684	J-399	J-400	159	10	pvc	130	2032
1273	P-687	J-400	J-401	161	10	pvc	130	2032
1153	P-604	J-363	J-364	173	12	pvc	130	2032
1277	P-690	J-401	J-402	41	10	pvc	130	2032
1278	P-691	J-402	J-103	346	10	pvc	130	2032
1216	P-646	J-201	J-Hyd2	355	10	pvc	130	2032
1157	P-607	J-364	J-365	343	12	pvc	130	2032
771	P-425	J-292	J-31	358	12	Ductile Iron	110	2032
1222	P-649	J-440	J-155	396	8	pvc	130	2032
1224	P-650	J-203	J-345	788	8	pvc	130	2032
1226	P-651	J-345	J-390	393	8	pvc	130	2032
1181	P-621	J-356	J-375	607	12	pvc	130	2032
1178	P-620	J-353	J-18	419	12	pvc	130	2032
1230	P-654	J-390	J-391	411	8	pvc	130	2032
763	P-419	J-Pressure Hydrant 9A	J-32	581	12	Ductile Iron	135	2032
1110	P-572	J-60	J-153	366	12	pvc	130	2032
1245	P-666	J-104	J-9	350	8	pvc	130	2032
770	P-424	J-94	J-292	153	8	Ductile Iron	110	2032
1243	P-664	J-393	J-394	354	8	pvc	130	2032
775	P-429	J-259	J-62	188	10	pvc	130	2032
776	P-430	J-62	J-98	803	10	pvc	130	2032
1231	P-655	J-124	J-68	428	8	pvc	130	2032
1175	P-618	J-296	J-372	1493	12	pvc	130	2032
1235	P-658	J-58	J-392	179	8	pvc	130	2032
1172	P-617	J-369	J-370	1955	12	pvc	130	2032
1239	P-661	J-392	J-393	352	8	pvc	130	2032
1282	P-694	J-103	J-213	172	10	pvc	130	2032
769	P-423	J-30	J-292	384	12	Ductile Iron	110	2032
1329	P-731	J-473	J-169	281	8	pvc	130	2032
1318	P-722	J-411	J-396	189	10	pvc	130	2032
1319	P-723	J-410	J-411	519	12	pvc	130	2032
1121	P-580	J-297	J-253	633	8	pvc	130	2032
1118	P-577	J-53	J-356	2102	12	pvc	130	2032
1116	P-576	J-354	J-476	1177	12	pvc	130	2032
1325	P-728	J-406	J-394	172	8	pvc	130	2032
1350	P-745	J-240	J-420	651	12	pvc	130	2032
1280	P-692	J-215	J-447	834	10	pvc	130	2032
1346	P-743	J-418	J-300	177	8	pvc	130	2032
1068	P-550	Future Well 5_Southeast	J-295	52	12	pvc	130	2032
1097	P-565	J-256	J-366	195	12	pvc	130	2032
1342	P-740	J-416	J-417	338	8	pvc	130	2032
1104	P-566	Future Well 7_Northwest	J-129	491	12	pvc	130	2032
1107	P-569	J-60	J-146	516	12	pvc	130	2032
1338	P-737	J-472	J-416	329	8	pvc	130	2032

1108	P-570	J-146	J-145	345	12	pvc	130	2032
1334	P-734	J-472	J-217	253	8	pvc	130	2032
1109	P-571	J-145	J-38	164	12	pvc	130	2032
1112	P-573	J-153	J-354	887	12	pvc	130	2032
1306	P-713	J-408	J-359	178	12	pvc	130	2032
1283	P-695	J-4thAveDischarge	J-359	212	12	pvc	130	2032
1284	P-696	J-112	J-110	333	8	pvc	130	2032
1192	P-628	J-379	J-129	779	12	pvc	130	2032
1149	P-601	J-362	J-363	129	12	pvc	130	2032
1145	P-598	J-361	J-362	339	12	pvc	130	2032
1141	P-595	J-360	J-361	347	12	pvc	130	2032
372	P-181	J-34	J-166	183	8	PVC	110	2032
1299	P-708	J-405	J-406	436	12	pvc	130	2032
1317	P-721	J-Flow Hydrant 4	J-411	183	10	pvc	130	2032
1305	P-712	J-343	J-408	173	12	pvc	130	2032
1315	P-720	J-409	J-410	285	12	pvc	130	2032
1612	P-930	J-231	J-477	222	8	pvc	130	2032
1129	P-586	J-358	J-343	389	12	pvc	130	2032
1128	P-585	J-159	J-358	513	12	pvc	130	2032
1311	P-717	J-379	J-409	406	12	pvc	130	2032
1124	P-582	J-367	J-357	1285	12	pvc	130	2032
1122	P-581	J-5	J-221	274	8	pvc	130	2032
1058	P-545	Future Well 6_Northeast	J-215	105	12	pvc	130	2032
762	P-418	J-34	J-168	505	12	Ductile Iron	135	2032
1137	P-592	J-359	J-360	331	12	pvc	130	2032
1555	P-890	J-128	J-378	438	8	pvc	130	2032
1546	P-881	J-150	J-263	191	10	pvc	130	2032
1576	P-901	J-17	J-Flow Hydrant 3	168	12	pvc	130	2032
1575	P-900	J-18	J-17	218	12	pvc	130	2032
1574	P-899	J-367	J-106	200	12	pvc	130	2032
1573	P-898	Senior with Pump Upgrade	J-SeniorAveDischarge	30	12	pvc	130	2032
1562	P-897	J-179	J-180	410	12	pvc	130	2032
1559	P-894	J-55	J-208	809	8	pvc	130	2032
1558	P-893	J-199	Future Well 7_Northwest	568	12	pvc	130	2032
1578	P-903	J-73	J-74	257	12	pvc	130	2032
1556	P-891	J-128	J-130	443	8	pvc	130	2032
1579	P-904	J-74	J-76	252	12	pvc	130	2032
1554	P-889	J-Hyd 23	J-430	340	8	pvc	130	2032
1553	P-888	J-430	J-429	361	8	pvc	130	2032
1552	P-887	J-422	J-426	345	8	pvc	130	2032
1551	P-886	J-132	J-Flow Hydrant 4	359	10	pvc	130	2032
767	P-422	J-32	J-30	93	12	Ductile Iron	110	2032
1550	P-885	J-Hyd 11	J-132	385	10	pvc	130	2032
1215	P-645	J-385	J-201	200	10	pvc	130	2032
1548	P-883	J-Hyd2	J-140	319	10	pvc	130	2032
1547	P-882	J-263	J-385	239	10	pvc	130	2032
1557	P-892	J-225	J-409	231	8	pvc	130	2032
1596	P-919	J-321	J-180	619	8	pvc	130	2032
1611	P-929	J-477	J-230	205	8	pvc	130	2032
1610	P-928	J-257	J-477	362	8	pvc	130	2032
1193	P-629	J-377	J-221	690	8	pvc	130	2032
1607	P-926	J-264	J-154	608	8	pvc	130	2032
1191	P-627	J-378	J-379	868	12	pvc	130	2032
1189	P-626	J-377	J-378	1336	12	pvc	130	2032
1601	P-923	J-476	J-420	614	12	pvc	130	2032
1600	P-922	J-Hyd 53	J-476	251	8	pvc	130	2032
1577	P-902	J-Flow Hydrant 3	J-73	319	12	pvc	130	2032
1187	P-625	J-376	J-377	1476	12	pvc	130	2032
1549	P-884	J-140	J-Hyd 11	339	10	pvc	130	2032
1183	P-623	J-370	J-375	2560	12	pvc	130	2032

1593	P-916	J-168	J-Pressure Hydrant 9A	217	12	pvc	130	2032
1592	P-915	J-229	J-288	103	8	pvc	130	2032
1591	P-914	J-230	J-197	571	8	pvc	130	2032
1588	P-912	J-275	J-18	238	8	pvc	130	2032
1586	P-910	J-384	J-264	331	8	pvc	130	2032
1585	P-909	13th Ave with Pump Upgrade	J-91	91	12	pvc	130	2032
1581	P-906	J-88	J-89	45	12	pvc	130	2032
1580	P-905	J-76	J-77	412	12	pvc	130	2032
1198	P-632	J-221	J-381	501	8	pvc	130	2032
1512	P-852	J-212	J-357	88	12	pvc	130	2032
1528	P-864	J-242	J-420	45	8	pvc	130	2032
1545	P-880	J-153	J-152	51	8	pvc	130	2032
1526	P-862	J-123	J-192	360	8	pvc	130	2032
1524	P-860	J-460	J-124	350	8	pvc	130	2032
1523	P-859	J-353	J-192	133	8	pvc	130	2032
1522	P-858	J-21	J-252	319	8	pvc	130	2032
1521	P-857	J-347	J-256	358	12	pvc	130	2032
1520	P-856	J-347	J-365	344	12	pvc	130	2032
1516	P-855	J-436	J-376	649	12	pvc	130	2032
1529	P-865	J-349	J-242	473	8	pvc	130	2032
1513	P-853	J-437	J-385	358	12	pvc	130	2032
1527	P-863	J-352	J-261	771	8	pvc	130	2032
1511	P-851	J-213	J-447	193	10	pvc	130	2032
1510	P-850	J-77	J-185	17	12	pvc	130	2032
1182	P-622	J-375	J-262	844	10	pvc	130	2032
1205	P-637	J-382	J-383	159	8	pvc	130	2032
1206	P-638	J-383	J-Hyd 41	339	8	pvc	130	2032
1207	P-639	J-Hyd 41	J-203	358	8	pvc	130	2032
1211	P-642	J-203	J-384	173	8	pvc	130	2032
1213	P-643	J-199	J-385	1299	12	pvc	130	2032
1214	P-644	J-437	J-60	397	12	pvc	130	2032
1515	P-854	J-215	J-436	1235	12	pvc	130	2032
1539	P-875	J-443	J-442	176	8	pvc	130	2032
1525	P-861	J-124	J-123	353	8	pvc	130	2032
1538	P-874	J-444	J-443	344	8	pvc	130	2032
1530	P-866	J-56	J-209	29	8	pvc	130	2032
1535	P-871	J-182	J-350	1055	8	pvc	130	2032
1537	P-873	J-Hyd 51	J-444	340	8	pvc	130	2032
1533	P-869	J-468	J-178	333	8	pvc	130	2032
1536	P-872	J-232	J-Hyd 51	157	8	pvc	130	2032
1540	P-876	J-442	J-210	251	8	pvc	130	2032
1541	P-877	J-204	J-332	39	8	pvc	130	2032
1542	P-878	J-440	J-203	398	8	pvc	130	2032
1532	P-868	J-81	J-83	111	8	pvc	130	2032
1544	P-879	J-231	J-229	521	8	pvc	130	2032
1531	P-867	J-262	J-266	81	8	pvc	130	2032
1534	P-870	J-177	J-182	335	8	pvc	130	2032
460	P-232	J-147	J-155	383	2	PVC	110	2012
570	P-299	J-86	J-244	281	6	PVC	110	2012
471	P-238	J-345	J-207	651	2	PVC	110	2012
459	P-231	J-151	J-202	455	2	PVC	110	2012
473	P-239	J-55	J-208	799	2	PVC	110	2012
485	P-246	J-103	J-213	158	2	PVC	110	2012
483	P-245	J-211	J-212	1466	2	PVC	110	2012
476	P-241	J-59	J-209	194	2	PVC	110	2012
453	P-228	J-140	J-Hyd2	310	2	PVC	110	2012
455	P-229	J-Hyd2	J-200	148	2	PVC	110	2012
477	P-242	J-209	J-56	10	2	PVC	110	2012
457	P-230	J-201	J-147	326	2	PVC	110	2012
469	P-237	J-206	J-57	14	4	PVC	110	2012

479	P-243	J-209	J-210	309	2	PVC	110	2012
481	P-244	J-Hyd 33	J-211	177	2	PVC	110	2012
474	P-240	J-204	J-59	145	2	PVC	110	2012
609	P-324	J-Hyd 33	J-256	349	1	PVC	110	2012
624	P-335	J-259	J-62	170	8	PVC	110	2012
623	P-334	J-61	J-259	217	8	PVC	110	2012
619	P-332	J-225	J-226	165	3	PVC	110	2012
618	P-331	J-239	J-238	289	4	PVC	110	2012
617	P-330	J-Hyd 103	J-236	265	8	PVC	110	2012
616	P-329	J-Hyd 103	J-238	316	6	PVC	110	2012
615	P-328	J-97	J-Hyd 103	91	6	PVC	110	2012
613	P-327	J-118	J-257	805	1	PVC	110	2012
555	P-291	J-237	J-235	475	6	PVC	110	2012
610	P-325	J-109	J-111	337	1	PVC	110	2012
629	P-338	J-124	J-68	400	1.5	PVC	110	2012
606	P-323	J-125	J-253	180	8	PVC	110	2012
605	P-322	J-126	J-125	340	8	PVC	110	2012
603	P-320	J-254	J-255	57	10	PVC	110	2012
602	P-319	J-255	J-19	592	8	PVC	110	2012
601	P-318	J-80	J-255	87	8	PVC	110	2012
598	P-317	J-88	J-87	306	10	PVC	110	2012
597	P-316	J-228	J-162	338	10	PVC	110	2012
596	P-315	J-58	J-61	374	10	PVC	110	2012
611	P-326	J-198	J-118	32	4	PVC	110	2012
652	P-350	J-269	J-270	15	12	PVC	135	2012
672	P-365	J-90	J-95	39	4	PVC	110	2012
671	P-364	J-176	J-98	159	12	PVC	110	2012
670	P-363	J-31	J-176	160	12	PVC	110	2012
669	P-362	J-162	J-31	182	12	PVC	110	2012
668	P-361	J-23	J-24	53	8	PVC	110	2012
667	P-360	J-112	J-15	176	8	PVC	110	2012
666	P-359	J-73	J-275	451	1.5	PVC	110	2012
664	P-358	J-188	J-73	39	1.5	PVC	110	2012
626	P-336	J-259	J-SeniorAveDischarge	180	10	PVC	110	2012
654	P-352	J-267	J-179	598	12	PVC	135	2012
628	P-337	J-79	J-261	502	3	PVC	110	2012
651	P-349	J-270	J-37	18	8	PVC	110	2012
643	P-346	J-171	J-266	360	1.3	PVC	110	2012
639	P-344	J-203	J-Hyd 41	336	1.3	PVC	110	2012
638	P-343	J-154	J-264	592	1.3	PVC	110	2012
636	P-342	J-148	J-154	378	1.3	PVC	110	2012
635	P-341	J-263	J-148	244	1.3	PVC	110	2012
632	P-340	J-87	J-262	138	10	PVC	110	2012
630	P-339	J-68	J-257	310	1.5	PVC	110	2012
591	P-311	J-252	J-253	401	6	PVC	110	2012
656	P-353	J-179	J-271	184	12	PVC	110	2012
511	P-259	J-224	J-225	309	4	PVC	110	2012
595	P-314	J-232	J-58	380	10	PVC	110	2012
536	P-277	J-78	J-189	455	6	PVC	110	2012
535	P-276	J-133	J-227	339	6	PVC	110	2012
534	P-275	J-158	J-133	344	6	PVC	110	2012
533	P-274	J-232	J-158	174	6	PVC	110	2012
531	P-273	J-230	J-231	396	6	PVC	110	2012
529	P-272	J-197	J-230	518	6	PVC	110	2012
521	P-267	J-161	J-65	351	6	PVC	110	2012
538	P-279	J-194	J-16	152	6	PVC	110	2012
514	P-261	J-226	J-129	580	6	PVC	110	2012
539	P-280	J-16	J-121	157	6	PVC	110	2012
507	P-257	J-131	J-Press Hydrant 4A	153	6	PVC	110	2012
505	P-256	J-222	J-131	259	6	PVC	110	2012

504	P-255	J-220	J-222	1040	6	PVC	110	2012
502	P-254	J-220	J-221	420	6	PVC	110	2012
500	P-253	J-219	J-220	22	6	PVC	110	2012
496	P-252	J-217	J-218	428	2	PVC	110	2012
495	P-251	J-218	J-168	775	4	PVC	110	2012
494	P-250	J-167	J-218	451	4	PVC	110	2012
491	P-249	J-182	J-216	992	4	PVC	110	2012
515	P-262	J-224	J-Flow Hydrant 4	498	6	PVC	110	2012
383	P-188	J-170	J-Pressure Hydrant 9A	173	4	PVC	110	2012
487	P-247	J-213	J-214	137	2	PVC	110	2012
584	P-308	J-248	J-36	357	6	PVC	110	2012
583	P-307	J-248	J-217	255	6	PVC	110	2012
581	P-306	J-35	J-248	164	6	PVC	110	2012
579	P-305	J-247	J-165	411	6	PVC	110	2012
578	P-304	J-247	J-85	191	6	PVC	110	2012
577	P-303	J-245	J-247	198	6	PVC	110	2012
575	P-302	J-245	J-246	207	6	PVC	110	2012
537	P-278	J-189	J-194	312	6	PVC	110	2012
571	P-300	J-244	J-88	265	6	PVC	110	2012
593	P-312	J-38	J-159	371	10	PVC	110	2012
560	P-294	J-239	J-97	411	6	PVC	110	2012
552	P-289	J-235	J-236	247	6	PVC	110	2012
550	P-288	J-234	J-235	156	6	PVC	110	2012
548	P-287	J-233	J-234	319	6	PVC	110	2012
546	P-286	J-233	J-172	544	6	PVC	110	2012
545	P-285	J-174	J-233	554	6	PVC	110	2012
543	P-284	J-62	J-174	164	6	PVC	110	2012
541	P-282	J-120	J-119	151	6	PVC	110	2012
540	P-281	J-121	J-120	347	6	PVC	110	2012
573	P-301	J-244	J-245	216	6	PVC	110	2012
163	P-67	J-17	J-Flow Hydrant 3	150	8	PVC	110	2012
183	P-77	J-81	Pressure Hydrant 6A	1268	8	PVC	110	2012
179	P-75	J-79	J-80	26	8	PVC	110	2012
177	P-74	J-74	J-79	464	8	PVC	110	2012
175	P-73	J-76	J-78	444	8	PVC	110	2012
173	P-72	J-76	J-77	393	8	PVC	110	2012
171	P-71	J-75	J-76	157	8	PVC	110	2012
388	P-192	J-89	J-171	169	4	PVC	110	2012
165	P-68	J-Flow Hydrant 3	J-73	304	8	PVC	110	2012
192	P-82	J-85	J-86	488	8	PVC	110	2012
161	P-66	J-71	J-18	134	8	PVC	110	2012
160	P-65	J-70	J-71	349	8	PVC	110	2012
158	P-64	J-69	J-70	148	8	PVC	110	2012
156	P-63	J-68	J-69	195	8	PVC	110	2012
154	P-62	J-67	J-68	366	8	PVC	110	2012
152	P-61	J-66	J-67	191	8	PVC	110	2012
150	P-60	J-65	J-66	202	8	PVC	110	2012
169	P-70	J-74	J-75	73	8	PVC	110	2012
207	P-89	J-93	J-94	159	4	PVC	110	2012
238	P-106	J-49	J-107	265	4	PVC	110	2012
233	P-103	J-102	J-105	319	4	PVC	110	2012
231	P-102	J-104	J-100	155	4	PVC	110	2012
230	P-101	J-103	J-104	364	4	PVC	110	2012
228	P-100	J-102	J-103	367	4	PVC	110	2012
223	P-97	J-100	J-9	452	4	PVC	110	2012
215	P-93	J-93	J-98	322	12	PVC	110	2012
186	P-79	Pressure Hydrant 6A	J-83	537	8	PVC	110	2012
211	P-91	J-95	J-96	333	8	PVC	110	2012
188	P-80	J-83	J-84	186	8	PVC	110	2012
205	P-88	J-91	J-93	37	12	PVC	110	2012

201	P-86	J-90	J-91	165	8	PVC	110	2012
199	P-85	J-89	J-90	552	8	PVC	110	2012
197	P-84	J-88	J-89	51	8	PVC	110	2012
194	P-83	J-86	J-87	295	8	PVC	110	2012
144	P-57	J-62	J-63	159	8	PVC	110	2012
213	P-92	J-96	J-97	148	8	PVC	110	2012
55	P-15	J-15	J-16	544	8	PVC	110	2012
148	P-59	J-64	J-65	341	8	PVC	110	2012
76	P-25	J-26	J-27	105	8	PVC	110	2012
74	P-24	J-25	J-26	232	8	PVC	110	2012
72	P-23	J-24	J-25	161	8	PVC	110	2012
69	P-22	J-22	J-23	179	8	PVC	110	2012
65	P-20	Flow Hydrant 6	J-21	622	8	PVC	110	2012
61	P-18	J-18	J-19	377	8	PVC	110	2012
80	P-27	J-28	J-29	30	8	PVC	110	2012
57	P-16	J-16	J-17	534	8	PVC	110	2012
82	P-28	J-29	J-30	20	8	PVC	110	2012
51	P-13	J-13	J-14	20	8	PVC	110	2012
47	P-11	J-12	J-9	152	8	PVC	110	2012
46	P-10	J-8	J-12	4	8	PVC	110	2012
44	P-9	J-10	J-11	338	8	PVC	110	2012
42	P-8	J-8	J-10	144	8	PVC	110	2012
36	P-5	J-6	J-7	201	8	PVC	110	2012
34	P-4	J-4	J-6	423	8	PVC	110	2012
59	P-17	J-17	J-18	219	8	PVC	110	2012
111	P-42	J-45	J-14	127	8	PVC	110	2012
248	P-111	J-111	J-112	159	4	PVC	110	2012
130	P-51	J-54	J-55	455	8	PVC	110	2012
128	P-50	J-53	J-54	243	10	PVC	110	2012
126	P-49	J-52	J-53	335	10	PVC	110	2012
121	P-47	J-49	J-Hyd 33	137	8	PVC	110	2012
119	P-46	J-48	J-49	176	8	PVC	110	2012
117	P-45	J-Hyd 32	J-48	326	8	PVC	110	2012
78	P-26	J-27	J-28	151	8	PVC	110	2012
113	P-43	J-13	J-46	148	8	PVC	110	2012
146	P-58	J-63	J-64	339	8	PVC	110	2012
110	P-41	J-44	J-45	339	8	PVC	110	2012
108	P-40	J-43	J-44	351	8	PVC	110	2012
102	P-37	J-40	J-334	335	8	PVC	110	2012
100	P-36	J-39	J-40	345	8	PVC	110	2012
98	P-35	J-38	J-39	175	8	PVC	110	2012
93	P-33	J-35	J-36	192	8	PVC	110	2012
91	P-32	J-34	J-35	306	8	PVC	110	2012
115	P-44	J-46	J-Hyd 32	337	8	PVC	110	2012
370	P-180	J-Pressure Hydrant 9A	J-165	198	4	PVC	110	2012
343	P-163	J-60	J-155	173	4	PVC	110	2012
391	P-194	J-96	J-172	360	4	PVC	110	2012
389	P-193	J-171	J-96	427	4	PVC	110	2012
673	P-366	J-32	J-33	22	8	PVC	110	2012
384	P-189	J-168	J-170	29	4	PVC	110	2012
1013	P-536	J-345	J-57	350	8	PVC	110	2012
382	P-187	J-169	J-170	381	4	PVC	110	2012
394	P-196	J-173	J-89	163	4	PVC	110	2012
374	P-183	J-165	J-166	697	4	PVC	110	2012
395	P-197	J-90	J-173	384	4	PVC	110	2012
368	P-179	J-163	J-Pressure Hydrant 9A	292	4	PVC	110	2012
366	P-178	J-163	J-28	345	4	PVC	110	2012
365	P-177	J-26	J-163	607	4	PVC	110	2012
358	P-173	J-160	J-64	220	4	PVC	110	2012
357	P-172	J-63	J-160	561	4	PVC	110	2012

351	P-169	J-157	J-61	139	4	PVC	110	2012
240	P-107	J-Hyd 33	J-108	260	4	PVC	110	2012
380	P-186	J-168	J-169	411	4	PVC	110	2012
431	P-215	J-186	J-191	1488	4	PVC	110	2012
449	P-226	J-122	J-198	20	4	PVC	110	2012
447	P-225	J-197	J-122	237	4	PVC	110	2012
445	P-224	J-196	J-74	174	8	PVC	110	2012
444	P-223	J-73	J-196	62	8	PVC	110	2012
440	P-221	J-Flow Hydrant 3	J-194	521	4	PVC	110	2012
438	P-220	J-192	J-123	347	4	PVC	110	2012
437	P-219	J-192	J-193	140	4	PVC	110	2012
393	P-195	J-30	J-173	490	4	PVC	110	2012
432	P-216	J-191	J-121	24	4	PVC	110	2012
341	P-162	J-154	J-60	168	4	PVC	110	2012
427	P-213	J-188	J-189	460	4	PVC	110	2012
421	P-210	J-185	J-186	384	4	PVC	110	2012
411	P-206	J-178	J-167	657	4	PVC	110	2012
410	P-205	J-179	J-180	389	4	PVC	110	2012
408	P-204	J-178	J-179	549	4	PVC	110	2012
402	P-201	J-176	J-94	322	4	PVC	110	2012
399	P-199	J-174	J-175	150	4	PVC	110	2012
435	P-218	J-71	J-192	398	4	PVC	110	2012
262	P-118	J-117	J-119	353	4	PVC	110	2012
344	P-164	J-155	J-146	333	4	PVC	110	2012
289	P-134	J-128	J-130	1058	4	PVC	110	2012
287	P-133	J-128	J-129	1067	4	PVC	110	2012
281	P-130	J-125	J-126	1012	4	PVC	110	2012
279	P-129	J-124	J-125	412	4	PVC	110	2012
277	P-128	J-123	J-124	339	4	PVC	110	2012
275	P-127	J-70	J-123	392	4	PVC	110	2012
300	P-140	J-Flow Hydrant 4	J-132	332	4	PVC	110	2012
264	P-119	J-116	J-120	349	4	PVC	110	2012
302	P-141	J-132	J-Hyd 11	364	4	PVC	110	2012
260	P-117	J-117	J-118	155	4	PVC	110	2012
258	P-116	J-116	J-117	179	4	PVC	110	2012
256	P-115	J-Press Hydrant 3B	J-116	334	4	PVC	110	2012
254	P-114	J-113	J-Press Hydrant 3B	311	4	PVC	110	2012
252	P-113	J-113	J-114	199	4	PVC	110	2012
250	P-112	J-112	J-113	220	4	PVC	110	2012
452	P-227	J-199	J-140	715	2	PVC	110	2012
266	P-120	J-Press Hydrant 3B	J-121	337	4	PVC	110	2012
321	P-151	J-Hyd 23	J-145	387	4	PVC	110	2012
340	P-161	J-153	J-154	178	4	PVC	110	2012
337	P-160	J-151	J-152	120	4	PVC	110	2012
335	P-159	J-149	J-151	205	4	PVC	110	2012
333	P-158	J-149	J-150	250	4	PVC	110	2012
331	P-157	J-148	J-149	175	4	PVC	110	2012
327	P-155	J-142	J-147	338	4	PVC	110	2012
325	P-154	J-146	J-142	386	4	PVC	110	2012
290	P-135	J-130	J-128	419	4	PVC	110	2012
322	P-152	J-145	J-38	150	4	PVC	110	2012
244	P-109	J-109	J-110	114	4	PVC	110	2012
319	P-150	J-143	J-Hyd2	46	4	PVC	110	2012
317	P-149	J-142	J-143	322	4	PVC	110	2012
315	P-148	J-Hyd 23	J-142	333	4	PVC	110	2012
313	P-147	J-139	J-Hyd 23	159	4	PVC	110	2012
311	P-146	J-139	J-140	232	4	PVC	110	2012
306	P-143	J-Hyd 11	J-333	188	4	PVC	110	2012
304	P-142	J-Hyd 11	J-137	334	4	PVC	110	2012
324	P-153	J-145	J-146	335	4	PVC	110	2012

1401	P-779	J-437	J-148	168	4	PVC	110	2012
1364	P-754	J-401	J-425	371	4	PVC	110	2012
1365	P-755	J-425	J-46	393	4	PVC	110	2012
1367	P-756	J-397	J-426	376	4	PVC	110	2012
1368	P-757	J-426	J-43	411	4	PVC	110	2012
1370	P-758	J-396	J-427	384	6	PVC	110	2012
1371	P-759	J-427	J-42	410	6	PVC	110	2012
1373	P-760	J-334	J-428	361	6	PVC	110	2012
1374	P-761	J-428	J-Flow Hydrant 4	376	6	PVC	110	2012
1376	P-762	J-132	J-429	375	4	PVC	110	2012
1377	P-763	J-429	J-40	361	4	PVC	110	2012
1379	P-764	J-333	J-430	193	4	PVC	110	2012
1380	P-765	J-430	J-39	374	4	PVC	110	2012
1259	P-676	J-11	J-398	406	4	PVC	110	2012
1400	P-778	J-147	J-437	168	4	PVC	110	2012
1359	P-751	J-423	J-399	376	4	PVC	110	2012
1403	P-780	J-146	J-438	388	4	PVC	110	2012
1404	P-781	J-438	J-Hyd 41	372	4	PVC	110	2012
1406	P-782	J-145	J-439	380	4	PVC	110	2012
1407	P-783	J-439	J-383	396	4	PVC	110	2012
1409	P-784	J-155	J-440	377	2	PVC	110	2012
1410	P-785	J-440	J-203	379	2	PVC	110	2012
1412	P-786	J-384	J-441	390	8	PVC	110	2012
1413	P-787	J-441	J-60	365	8	PVC	110	2012
1415	P-788	J-59	J-442	372	8	PVC	110	2012
1416	P-789	J-442	J-384	390	8	PVC	110	2012
1418	P-790	J-203	J-443	392	2	PVC	110	2012
1419	P-791	J-443	J-332	371	2	PVC	110	2012
1398	P-777	J-436	J-4	1020	8	PVC	110	2012
1314	P-719	J-410	J-224	193	4	PVC	110	2012
1264	P-680	J-399	J-10	408	4	PVC	110	2012
1267	P-682	J-12	J-400	391	8	PVC	110	2012
1275	P-688	J-9	J-402	385	4	PVC	110	2012
1276	P-689	J-402	J-401	31	4	PVC	110	2012
1291	P-702	J-404	J-126	176	8	PVC	110	2012
1010	P-534	J-344	J-59	10	8	pvc	130	2012
1295	P-705	J-161	J-405	185	4	PVC	110	2012
1296	P-706	J-405	J-66	333	4	PVC	110	2012
1301	P-709	J-288	J-407	165	6	PVC	110	2012
1302	P-710	J-407	J-227	166	6	PVC	110	2012
1309	P-715	J-222	J-409	326	6	PVC	110	2012
1362	P-753	J-424	J-13	389	8	PVC	110	2012
1313	P-718	J-Press Hydrant 4A	J-410	189	4	PVC	110	2012
1361	P-752	J-400	J-424	401	8	PVC	110	2012
1321	P-724	J-41	J-412	181	8	PVC	110	2012
1322	P-725	J-412	J-42	186	8	PVC	110	2012
1336	P-735	J-182	J-416	502	4	PVC	110	2012
1340	P-738	H-2	J-417	748	12	pvc	130	2012
1341	P-739	J-417	H-3	103	12	pvc	130	2012
1344	P-741	J-98	J-418	420	8	PVC	110	2012
1345	P-742	J-418	J-62	380	8	PVC	110	2012
1352	P-746	H-1	J-421	23	12	pvc	130	2012
1353	P-747	J-421	H-2	266	12	pvc	130	2012
1355	P-748	J-398	J-422	374	4	PVC	110	2012
1356	P-749	J-422	J-44	400	4	PVC	110	2012
1358	P-750	J-45	J-423	397	4	PVC	110	2012
1424	P-794	J-57	J-445	362	8	PVC	110	2012
1310	P-716	J-409	J-226	398	6	PVC	110	2012
1491	P-838	J-416	J-468	413	4	PVC	110	2012
1421	P-792	J-Hyd 41	J-444	393	4	PVC	110	2012

1471	P-825	J-461	J-228	413	6	PVC	110	2012
1473	P-826	J-64	J-462	395	4	PVC	110	2012
1474	P-827	J-462	J-162	405	4	PVC	110	2012
1476	P-828	J-63	J-463	401	4	PVC	110	2012
1477	P-829	J-463	J-176	398	4	PVC	110	2012
1479	P-830	J-30	J-464	384	8	PVC	110	2012
1480	P-831	J-464	J-31	351	8	PVC	110	2012
1482	P-832	J-228	J-465	363	6	PVC	110	2012
1483	P-833	J-465	J-25	374	6	PVC	110	2012
1485	P-834	J-33	J-466	386	8	PVC	110	2012
1486	P-835	J-466	J-34	873	8	PVC	110	2012
1468	P-823	J-460	J-67	366	4	PVC	110	2012
1489	P-837	J-467	J-85	335	8	PVC	110	2012
1467	P-822	J-126	J-460	400	4	PVC	110	2012
1492	P-839	J-468	J-282	536	4	PVC	110	2012
1494	P-840	Pressure Hydrant 6A	J-469	353	8	PVC	110	2012
1495	P-841	J-469	J-21	349	8	PVC	110	2012
1497	P-842	J-84	J-470	316	4	PVC	110	2012
1498	P-843	J-470	J-30	1005	4	PVC	110	2012
1500	P-844	J-83	J-471	368	6	PVC	110	2012
1501	P-845	J-471	J-22	350	6	PVC	110	2012
1505	P-846	J-177	J-472	485	4	PVC	110	2012
1506	P-847	J-472	J-178	419	4	PVC	110	2012
1508	P-848	J-84	J-473	167	4	PVC	110	2012
1509	P-849	J-473	J-177	358	4	PVC	110	2012
1605	P-924	J-3	H-8	828	8	PVC	110	2012
1606	P-925	H-8	J-436	244	8	PVC	110	2012
1488	P-836	J-166	J-467	594	8	PVC	110	2012
1446	P-808	J-363	J-453	237	8	PVC	110	2012
1290	P-701	J-228	J-404	182	8	PVC	110	2012
1425	P-795	J-445	J-58	130	8	PVC	110	2012
1428	P-796	J-213	J-447	176	2	PVC	110	2012
1429	P-797	J-447	J-215	813	2	PVC	110	2012
1431	P-798	J-105	J-448	209	4	PVC	110	2012
1432	P-799	J-448	J-48	196	4	PVC	110	2012
1434	P-800	J-Hyd 32	J-449	194	4	PVC	110	2012
1435	P-801	J-449	J-102	215	4	PVC	110	2012
1437	P-802	J-360	J-450	378	4	PVC	110	2012
1438	P-803	J-450	J-122	367	4	PVC	110	2012
1440	P-804	J-361	J-451	394	4	PVC	110	2012
1441	P-805	J-451	J-116	405	4	PVC	110	2012
1470	P-824	J-65	J-461	388	6	PVC	110	2012
1444	P-807	J-452	J-362	400	4	PVC	110	2012
1422	P-793	J-444	J-206	382	4	PVC	110	2012
1447	P-809	J-453	J-15	356	8	PVC	110	2012
1449	P-810	J-359	J-454	389	6	PVC	110	2012
1450	P-811	J-454	J-288	690	6	PVC	110	2012
1452	P-812	J-343	J-455	393	6	PVC	110	2012
1453	P-813	J-455	J-227	384	6	PVC	110	2012
1455	P-814	J-358	J-456	411	4	PVC	110	2012
1456	P-815	J-456	J-133	368	4	PVC	110	2012
1458	P-816	J-119	J-457	393	6	PVC	110	2012
1459	P-817	J-457	J-69	362	6	PVC	110	2012
1461	P-818	J-120	J-458	391	4	PVC	110	2012
1462	P-819	J-458	J-70	364	4	PVC	110	2012
1464	P-820	J-191	J-459	378	4	PVC	110	2012
1465	P-821	J-459	J-71	351	4	PVC	110	2012
1443	P-806	J-Press Hydrant 3B	J-452	388	4	PVC	110	2012
878	P-472	Pressure Hydrant 6B	J-22	151	8	PVC	110	2012
932	P-500	J-282	J-183	695	4	PVC	110	2012

930	P-499	J-324	H-1	81	12	PVC	135	2012
929	P-498	J-271	J-324	479	12	PVC	135	2012
920	P-491	J-180	J-321	591	4	pvc	130	2012
916	P-488	J-321	J-Press Hydrant 1A	151	12	PVC	135	2012
834	P-464	J-Press Hydrant 1A	J-251	161	12	PVC	135	2012
880	P-474	J-352	J-353	404	12	pvc	130	2012
959	P-510	J-204	J-332	22	2	PVC	110	2012
877	P-471	J-21	Pressure Hydrant 6B	339	8	PVC	110	2012
853	P-470	J-Press Hydrant 2A	J-27	409	4	PVC	110	2012
852	P-469	J-162	J-Press Hydrant 2A	337	4	PVC	110	2012
847	P-468	J-Pressure Hydrant 9B	J-32	29	8	PVC	110	2012
846	P-467	J-29	J-Pressure Hydrant 9B	32	8	PVC	110	2012
989	P-529	J-Hyd 10	J-106	170	4	PVC	110	2012
915	P-487	J-324	J-321	300	12	PVC	135	2012
972	P-519	J-Hyd 51	J-157	760	4	PVC	110	2012
1255	P-673	J-395	J-397	388	4	PVC	110	2012
985	P-527	J-Hyd 106	J-237	381	6	PVC	110	2012
982	P-525	J-Hyd 105	J-237	445	6	PVC	110	2012
981	P-524	J-234	J-Hyd 105	180	6	PVC	110	2012
979	P-523	J-Hyd 47	J-242	156	6	PVC	110	2012
978	P-522	J-240	J-Hyd 47	457	6	PVC	110	2012
937	P-504	J-183	J-326	243	4	PVC	110	2012
975	P-520	J-54	J-Hyd 121	293	10	PVC	110	2012
938	P-505	J-326	J-184	1454	4	PVC	110	2012
969	P-517	J-Hyd 42	J-159	544	4	PVC	110	2012
968	P-516	J-158	J-Hyd 42	405	4	PVC	110	2012
965	P-514	J-41	J-334	46	8	PVC	110	2012
963	P-513	J-333	J-139	304	4	PVC	110	2012
960	P-511	J-332	J-206	318	2	PVC	110	2012
828	P-460	J-Flow Hydrant 1	J-295	739	10	PVC	135	2012
976	P-521	J-Hyd 121	J-240	88	10	PVC	110	2012
725	P-397	J-36	J-285	257	8	PVC	110	2012
737	P-405	J-186	J-Press Hydrant 3A	168	4	PVC	110	2012
735	P-404	J-Press Hydrant 3A	J-75	43	4	PVC	110	2012
734	P-403	J-190	J-Press Hydrant 3A	511	4	PVC	110	2012
731	P-401	J-197	J-288	118	6	PVC	110	2012
837	P-465	J-269	J-Press Hydrant 2A 1B	384	12	PVC	135	2012
726	P-398	J-285	J-270	32	8	PVC	110	2012
750	P-410	PMP-4thAve3000gpm	J-4thAveDischarge	39	12	PVC	110	2012
723	P-396	J-285	J-167	38	4	PVC	110	2012
722	P-395	J-166	J-285	936	4	PVC	110	2012
711	P-388	J-271	J-282	142	12	PVC	110	2012
705	P-384	J-177	J-182	326	4	PVC	110	2012
689	P-375	J-42	J-4thAveDischarge	153	6	PVC	110	2012
729	P-400	J-288	J-229	81	6	PVC	110	2012
785	P-432	J-251	J-HospitalSite	191	12	PVC	135	2012
827	P-459	J-HospitalSite	J-Flow Hydrant 1	471	10	PVC	135	2012
816	P-455	J-4thAveDischarge	J-301	211	12	pvc	130	2012
815	P-454	J-301	J-43	269	8	PVC	110	2012
814	P-453	J-42	J-301	50	8	PVC	110	2012
812	P-452	J-300	J-174	379	4	PVC	110	2012
811	P-451	J-95	J-300	740	4	PVC	110	2012
792	P-437	J-HospitalSite	J-295	308	12	pvc	130	2012
749	P-409	4th Ave Well	PMP-4thAve3000gpm	27	12	PVC	110	2012
760	P-416	J-269	J-34	791	12	Ductile Iron	130	2012
756	P-414	PMP-4th500gpm	J-4thAveDischarge	45	10	Ductile Iron	110	2012
755	P-413	4th Ave Well	PMP-4th500gpm	33	10	Ductile Iron	110	2012
753	P-412	PMP-4th1000gpm	J-4thAveDischarge	49	10	Ductile Iron	110	2012
752	P-411	4th Ave Well	PMP-4th1000gpm	28	10	Ductile Iron	110	2012
988	P-528	J-105	J-Hyd 10	501	4	PVC	110	2012

807	P-449	J-351	J-352	726	12	pvc	130	2012
1201	P-634	J-382	J-232	381	10	PVC	110	2012
1139	P-593	J-44	J-361	355	4	PVC	110	2012
1144	P-597	J-362	J-45	367	4	PVC	110	2012
1147	P-599	J-14	J-363	364	8	PVC	110	2012
1151	P-602	J-46	J-364	370	4	PVC	110	2012
1152	P-603	J-364	J-111	402	4	PVC	110	2012
1005	P-530	J-41	J-343	337	8	PVC	110	2012
1156	P-606	J-365	J-109	398	4	PVC	110	2012
984	P-526	J-236	J-Hyd 106	705	6	PVC	110	2012
1169	P-615	J-Press Hydrant 2A 1B	J-369	95	12	PVC	135	2012
1170	P-616	J-369	J-267	106	12	PVC	135	2012
1196	P-630	J-6	J-381	472	8	PVC	110	2012
1135	P-590	J-43	J-360	355	4	PVC	110	2012
1200	P-633	J-159	J-382	395	10	PVC	110	2012
1155	P-605	J-Hyd 32	J-365	373	4	PVC	110	2012
1204	P-636	J-383	J-Hyd 51	365	4	PVC	110	2012
1228	P-652	J-157	J-391	340	4	PVC	110	2012
1229	P-653	J-391	J-57	385	4	PVC	110	2012
1233	P-656	J-61	J-392	559	4	PVC	110	2012
1234	P-657	J-392	J-158	371	4	PVC	110	2012
1237	P-659	J-133	J-393	383	4	PVC	110	2012
1238	P-660	J-393	J-134	232	4	PVC	110	2012
1241	P-662	J-227	J-394	392	6	PVC	110	2012
1242	P-663	J-394	J-161	414	6	PVC	110	2012
1247	P-667	J-131	J-395	351	4	PVC	110	2012
1251	P-670	J-Press Hydrant 4A	J-396	524	6	PVC	110	2012
1197	P-631	J-381	J-8	495	8	PVC	110	2012
1084	P-559	J-351	Flow Hydrant 6	35	8	pvc	130	2012
1017	P-539	J-346	J-56	486	8	PVC	110	2012
1019	P-540	J-48	J-347	338	1.5	PVC	110	2012
1020	P-541	J-347	J-256	337	1	PVC	110	2012
1025	P-543	J-52	J-349	326	8	pvc	130	2012
1075	P-553	H-3	H-4	668	12	pvc	130	2012
1014	P-537	J-345	J-204	10	2	pvc	130	2012
1012	P-535	J-344	J-345	145	8	PVC	110	2012
1131	P-587	J-4thAveDischarge	J-359	196	6	PVC	110	2012
1079	P-555	J-216	J-350	51	4	pvc	130	2012
1080	P-556	J-350	J-323	477	12	pvc	130	2012
1081	P-557	H-5	J-350	66	12	pvc	130	2012
1016	P-538	J-55	J-346	122	12	PVC	110	2012
1083	P-558	J-323	J-351	714	12	pvc	130	2012
1077	P-554	H-4	H-5	405	12	pvc	130	2012
1089	P-562	J-352	J-297	15	8	pvc	130	2012
1126	P-583	J-40	J-358	369	4	PVC	110	2012
1115	P-575	J-355	J-Hyd 53	430	8	PVC	110	2012
1114	P-574	J-240	J-355	629	8	PVC	110	2012
1091	P-563	J-19	J-353	25	8	PVC	110	2012
1087	P-561	H-6	Flow Hydrant 6	24	8	PVC	110	2012
1086	P-560	J-297	H-6	698	8	PVC	110	2012
1008	P-532	J-56	J-344	194	8	PVC	110	2012
32	P-3	J-4	J-5	315	8	PVC	110	2012
1092	P-564	J-353	J-297	394	8	PVC	110	2012

Appendix K Operations and Maintenance Budget

City of Gooding
308 5th Ave West
Gooding, ID 83330
(208) 934-5669

Acct #	IRRIGATION EXPENSE	2013	2012
70-490-10.00	Salary	82,000.00	75,408.72
70-490-20.00	Benefits	9,500.00	9,003.69
70-490-30.00	Supplies	5,500.00	6,219.34
70-490-31.00	Office Supplies	1,350.00	1,895.36
70-490-33.00	Pipe & Valves	3,500.00	4,473.79
70-490-35.00	Motor Fuel	5,500.00	7,330.81
70-490-37.00	Water Rights	10,000.00	9,973.79
70-490-46.00	Unemployment Insurance	15,200.00	14,838.16
70-490-52.00	Utilities	1,150.00	1,425.76
70-490-60.00	Vehicle Repair & Maint	1,700.00	623.75
70-490-69.00	Miscellaneous	1,000.00	186.61
	Reserve Fund	5,088.00	
	Irrigation Study-Keller		
	Irrigation Budget	**141,488.00**	**136,400.00**
	Irrigation Improvement Year End Actual Revenue	141,488.00	145,348.75
	Irrigation Improvement Year End Actual Expenses	**141,488.00**	**131,379.78**
	Irrigation Under/Over Budget	-	**13,968.97**

Irrigation Expenses

City of Gooding
308 5th Ave West
Gooding, ID 83330
(208) 934-5669

Acct #	WATER EXPENSE	2013	2012
25-434-10.00	Salary	144,200.00	124,387.97
25-434-20.00	Benefits	45,000.00	43,271.99
25-434-30.00	Supplies	50,000.00	53,594.83
25-434-31.00	Office Supplies&Software	7,000.00	6,335.42
25-434-32.00	Office Exp Bldg	2,000.00	874.33
25-434-35.00	Motor Fuel	6,000.00	4,340.76
25-434-36.00	Refunds & Rebates	500.00	409.45
25-434-40.00	Water Tests	3,000.00	648.63
25-434-41.00	DEQ	6,000.00	5,780.00
25-434-46.00	Insurance	4,900.00	6,794.55
25-434-47.00	School/Travel/Dues	2,700.00	1,827.17
25-434-49.00	ICDBG- Grant	500,000.00	261,806.00
25-434-49.10	Grant Match City		2,536.51
25-434-49.20	DEQ- Water FP Study		15,000.00
25-434-49.30	DEQ WFPS Grant Match		15,003.60
25-434-50.00	Custodian Contract	1,800.00	1,719.50
25-434-52.00	Utilities	61,600.00	63,891.23
25-434-59.00	Repair/Maint Bldg&Lines	10,000.00	2,955.29
25-434-60.00	Vehicle Maint & Repair	6,000.00	6,298.92
25-434-62.00	Dig Line	300.00	128.12
25-434-63.00	Advance Deposits	16,500.00	9,553.46
25-434-66.00	Merchant Fees - Crdt Crd	1,500.00	1,731.99
25-434-67.00	Drug Testing	300.00	182.75
25-434-69.00	Miscellaneous	2,000.00	1,402.91
25-434-72.00	River Wall		20,000.00
25-434-73.00	Improvements-Engineering	7,000,000.00	17,505.11
	Equip & Vehicle Purchase	15,000.00	
	Water Budget	**7,886,300.00**	**990,400.00**
	Water Improvement Year End Actual Revenue	7,886,300.00	658,959.70
	Water Improvement Year End Actual Expenses	**7,886,300.00**	**667,980.49**
	Water Under/Over Budget	-	**(9,020.79)**

Water Expenses

Appendix L 2010 DEQ Sanitary Survey

STATE OF IDAHO
DEPARTMENT OF
ENVIRONMENTAL QUALITY

FILE

1363 Fillmore Street • Twin Falls, Idaho 83301 • (208) 736-2190

C.L. "Butch" Otter, Governor
Toni Hardesty, Director

June 28, 2010

Mr. Tim Weaver
City of Gooding
308 5th Ave W
Gooding, Idaho 83330

Subject: Enhanced Sanitary Survey conducted on June 10, 2010 - PWS#: ID5240009

Dear Mr. Weaver:

A copy of the Enhanced Sanitary Survey and CD of photos for Public Water System ID5240009 are enclosed for your records. No significant deficiencies and/or recommended improvements for your system were noted.

Pursuant to IDAPA 58.01.08.302.03, the water system must respond in writing no later than forty-five (45) days after receipt of the sanitary survey report describing how and on what schedule the system will address significant deficiencies identified in the survey.

For all new water systems or modifications to existing water systems, an engineering report must be submitted to the Department of Environmental Quality (DEQ) for review and approval prior to or concurrent with the submittal of plans and specifications as required in Subsection 551.04, pursuant to IDAPA 58.01.08.551.01

Prior to construction of new public water supply systems or modifications or existing public water supply systems, plans and specifications must be submitted to DEQ for review, and approved, pursuant to IDAPA 58.01.08.551.04.a.

This system will be in substantial compliance with regulations if the significant deficiencies of this survey are implemented. Thank you for your time and cooperation in the completion of this survey, and for your hard work and efforts in providing the residents of Filer with safe drinking water. If you have any questions, please contact me at 736-2190.

Sincerely,

Josh Barron REHS/RS
Regional Drinking Water Program Coordinator

David Anderson
Regional Manager, Engineering

JB:DA:sg

Enclosures (2)

Scanned

Enhanced Sanitary Survey
Preliminary Inspection Findings Form

Facility Name: Gooding Time Closing Conference Begins: ________

PWS #: ________ Time Closing Conference Ends: ________

Date: 6/10/10

Inspector (Print Name): Josh Barron Phone #: 734 2190

Inspector (Signature): [signature] Date: 6/10/2010

Facility Representative (Print Name and Title): Tim Weaver Date: 6/10/2010

Facility Representative (Signature): Tim Weaver Date: 6/10/10

NOTE: Your signature indicates you have received this document and does not imply agreement with the violations noted.

Deficiencies Noted at the Time of the Inspection:

In accordance with IDAPA 58.01.08.008.02., the health hazards identified below must be mitigated as required by the Department and terminated within a time schedule established by the Department.

Correction Time Frame

1. No Deficiencies at time ☐ 24 hours ☐ 7 days ☐ Corrective action plan within 45 days
2. of Inspection ☐ 24 hours ☐ 7 days ☐ Corrective action plan within 45 days
3. ________ ☐ 24 hours ☐ 7 days ☐ Corrective action plan within 45 days
4. ________ ☐ 24 hours ☐ 7 days ☐ Corrective action plan within 45 days
5. ________ ☐ 24 hours ☐ 7 days ☐ Corrective action plan within 45 days
6. ________ ☐ 24 hours ☐ 7 days ☐ Corrective action plan within 45 days

Potential Violations Pending Further Review:

1. Senior (1st) avenue well house make sure you keep
2. Backflow Prevention Device on sample tap at all
3. Times! Had one on hand!
4. ________
5. ________
6. ________
7. ________
8. ________

State of Idaho Public Water System Enhanced Sanitary Survey

WATER SYSTEM INVENTORY INFORMATION

SURVEY DATE: 6/10/2010 (mm/dd/yyyy)

PWS #: ID#5240009

Name of Public Water System: **City of Gooding**

# of Groundwater Sources: 3
# of Surface Water Sources: 0
# of Storage Facilities: 2
Total Storage (gal): 1.2 MG

Date of Last Survey: 06/17/2005

Health District: ☑ N/A

DEQ Region: ☐ N/A — Twin Falls

County: Gooding

Number of Service Connections: 1,450

Residential Population: 3,300

Status: ☑ Approved ☐ Disapproved

Water Purchased From: ☑ N/A
Name:
PWS #:

Water Sold To: ☑ N/A
Name:
PWS #:

Owner Type: Local Government

Legal Entity: Municipality

Water System Classification:
☑ Community Water System
☐ Nontransient Noncommunity
☐ Transient Noncommunity - TNC

Combined Source? ☐ Yes ☑ No
If yes, ☐ Well Fields ☐ Manifolds
Sources Manifolded:

System Certification Class: Distribution II

Seasonal Operation Dates: ☑ N/A
Date Open:
Date Closed:

Responsible Person In Charge (RIC): (Identify Operator here for TNC PWS)
☑ Mr. ☐ Ms. Todd Bunn
RIC Properly Certified? ☑ Yes ☐ No ☐ N/A-GW-TNC — Certification Level: Dist II ☐ N/A
Mailing Address: 308 Fifth Avenue West
City, State, Zip Code: Gooding, Idaho 83330
Telephone — Day: 934-5669 Night: 539-5669 (Cell) Fax: 934-5425
E-mail: tbunn@goodingidaho.org

Legal Owner's Name:
☑ Mr. ☐ Ms. Herb Straud
Mailing Address: 308 Fifth Avenue West
City, State, Zip Code: Gooding, Idaho 83330
Telephone — Day: 934-5669 Night: 539-5669 Fax: 934-5425
E-mail: ckorsen@goodingidaho.org (City Clerk)

Substitute (RIC): ☐ No Sub. RIC Identified ☐ N/A (N/A for GW-TNC PWS)
☑ Mr. ☐ Ms. Scott Carrico
Sub.RIC Certified? ☑ Yes ☐ No ☐ N/A-GW-TNC — Certification Level: Dist II ☐ N/A
Mailing Address: 308 Fifth Avenue West
City, State, Zip Code: Gooding, Idaho 83330
Telephone — Day: 934-5669 Night: 539-5880 (Cell) Fax: 934-5425
E-mail: NA

Individuals present during inspection:

Name	Title
Tim Weaver	Ass. PWS Super

Physical location of the PWS (Township, Range, Section):
42 deg, 55', 56.0900"
114 deg,42',59.4500"

Samples taken at the time of survey by inspector? ☐ Yes ☑ No
If yes, what:

Survey performed by:
Name: Josh Barron
Title: Drinking Water Coordinator
Phone #: 736-2190

Agency: ☑ IDEQ ☐ Health Dept. ☐ Other:________

General Information

yes	no	n/a	unk	note	
☐	☑	☐	☐	☐	1. Have modifications been made to the PWS since the last ESS?
☐	☑	☐	☐	☐	2. If yes, are the modifications considered to be significant?
☐	☐	☐	☐	☐	3. If yes, were plans and specs submitted to and approved by DEQ?

Comments:

The groundwater source on 13th Street is presently being rehabilitated; a new 150 HP booster pump was installed in the 4th/Washington street pump station and new control systems were installed in all three stations.

Sanitary Survey Index

Modules used:	#
☑ General Information	1
☑ Groundwater Source	3
☑ Storage	2
☐ Hydropneumatic Tanks	0
☑ Distribution	1
☑ Pumping	1
☑ Financial Capacity	1
☑ Managerial Capacity	1
☑ Treatment Application	2
☑ Disinfection	2
☑ Notes	1
☑ Photo Log	1
Total Modules	16

Page 1 Of 24

IDEQ - Enhanced Sanitary Survey - 5/11/05 — General Information

GROUNDWATER SOURCE

A separate sources form must be filled out for each groundwater source in the PWS.

SURVEY DATE: 6/10/2010 (mm/dd/yyyy)		PWS #: ID#5240009	
Tag #: E0008011	Common Name of Source: (4th Avenue Well)	Source: [x] Well [ ] Spring [ ] Infiltration Gallery	Is this Source Treated? [x] Yes [ ] No
Physical Location: Corner of 4th Avenue & Washinton Street			Treatment Objective: [ ] N/A Disinfection
			Treatment Types: [ ] N/A (Identify Treatment Train in Comments) Gas Chlorination, Post
Is there a well log for the groundwater source? [x] Yes [ ] No [ ] N/A [ ] Unk			

Pump Capacity (GPM)	Casing Size (In)	Date Drilled:	Well Depth (Ft)	Casing Depth (Ft)	Grout Depth(Ft)	Static Water Depth (Ft)
1,000 [ ] Unk	14 [ ] Unk	1996 [ ] Unk	400 [ ] Unk	368 [ ] Unk	270 [ ] Unk	180 [ ] Unk

Is the Casing Screened?	Screen Depth (Ft):	Is the Casing Perforated?	Perforation Depth (Ft):
[ ] Yes [x] No [ ] Unk [ ] N/A	[x] N/A [ ] Unk From: To:	[ ] Yes [x] No [ ] Unk [ ] N/A	[x] N/A [ ] Unk From: To:

Latitude (Decimal): Not Available

Longitude (Decimal): Not Available

(+) IF A GROUNDWATER SOURCE HAS BEEN DETERMINED TO FALL UNDER THE DIRECT INFLUENCE OF SURFACE WATER, THE SURFACE WATER SYSTE INSPECTION RESULTS AND TURBIDITY SECTIONS MUST BE FILLED OUT IN ADDITION TO THE GROUNDWATER SYSTEM INSPECTION RESULTS SECTION.

GROUNDWATER SOURCE

COMMENTS: (Please indicate question number)

1. This source is: [x] Active [ ] Proposed [ ] Inactive [ ] Emergency (<60 days per year)

yes	no	n/a	unk	note	Question
[x]	[ ]	[ ]	[ ]	[ ]	2. Has there been a Source Water Assessment conducted for the source? Date: 2002
[x]	[ ]	[ ]	[ ]	[ ]	3. Has a final GWUDI determination been done for this source? Date: 8/9/2000
[x]	[ ]	[ ]	[ ]	[ ]	4. Is the well on a separate lot that is large enough to provide a minimum distance of 50 feet between the well and the nearest property line? (applicable if constructed after 11/1/77)
[x]	[ ]	[ ]	[ ]	[ ]	5. Is the well lot owned in fee simple by the supplier of water or controlled by lease with a term of not less than the useful life of the well?
					6. Are the following minimum distances from the PWS well being met?
[x]	[ ]	[ ]	[ ]	[ ]	- Sewer line....50 Ft.
[x]	[ ]	[ ]	[ ]	[ ]	- Individual home septic tank....100 Ft.
[x]	[ ]	[ ]	[ ]	[ ]	- Individual home disposal field....100 Ft.
[x]	[ ]	[ ]	[ ]	[ ]	- Individual home seepage pit....100 Ft.
[x]	[ ]	[ ]	[ ]	[ ]	- Privies....100 Ft.
[x]	[ ]	[ ]	[ ]	[ ]	- Livestock....50 Ft.
[x]	[ ]	[ ]	[ ]	[ ]	- Canals, streams, ditches, lakes, ponds and tanks used to store nonpotable substances....50 Ft.
[x]	[ ]	[ ]	[ ]	[ ]	- Any other potential source of contamination observed at time of inspection....50 Ft.
[ ]	[x]	[ ]	[ ]	[ ]	7. Are pesticides, herbicides, fertilizers, portable containers of petroleum products, or other toxic or hazardous materials stored on the well lot?
[ ]	[x]	[ ]	[ ]	[ ]	8. Are pesticides, herbicides, or fertilizers applied to the well lot?
[ ]	[x]	[ ]	[ ]	[ ]	9. Is the well in a pit? If yes, Date constructed:
[ ]	[ ]	[x]	[ ]	[ ]	10. Was the well that is located in a pit installed after 11/5/64?
[ ]	[ ]	[x]	[ ]	[ ]	11. If pit was installed prior to 11/5/64 – Does the pit have water tight construction of pit walls and floor, a floor drain and an acceptable pit cover?
[x]	[ ]	[ ]	[ ]	[ ]	12. Is the source protected from unauthorized entry? *(Recommended)*
[x]	[ ]	[ ]	[ ]	[ ]	13. Does the casing extend a minimum of 18 inches above the final ground surface and/ or 12 inches above the well house floor?
[x]	[ ]	[ ]	[ ]	[ ]	14. Is the well vented with the open end of the vent screened and terminated downward at least 18 inches above the final ground surface?
[x]	[ ]	[ ]	[ ]	[ ]	15. Is the well cap sanitary seal properly installed and maintained?
[x]	[ ]	[ ]	[ ]	[ ]	16. Is the well cased and sealed in such a manner that surface water cannot enter the well?

GROUNDWATER SOURCES PG. 2	Common Name: (4th Avenue Well)	SURVEY DATE: 6/10/2010 (mm/dd/yyyy)	PWS #: ID#5240009

COMMENTS:
(Please indicate question number)

yes	no	n/a	unk	note	GROUNDWATER SOURCE (cont.)
☑	☐	☐	☐	☐	17. Is there a smooth nosed sample tap provided on the well discharge pipe prior to treatment? (Threaded tap is approved with backflow preventer)
☑	☐	☐	☐	☐	18. Is an instantaneous and totalizing flow meter installed on the pump distribution line of the well and is it maintained and working properly? Not Avail gal.
☑	☐	☐	☐	☐	19. Is a pressure gauge provided at all installations and is it maintained and working properly? 70 psi.
☑	☐	☐	☐	☐	20. Can the well be pumped to waste at the design capacity of the well via an approved air gap at a location prior to the first service connection?
☐	☑	☐	☐	☐	21. Has the source been known to have caving or sand problems?

yes	no	n/a	unk	note	WELL HOUSE *(Any structure containing important water system components)*
☑	☐	☐	☐	☐	22. Is the source located in a well house?
☑	☐	☐	☐	☐	23. Is the well house kept clean and in good repair? *(Floor cracks?)*
☑	☐	☐	☐	☐	24. Is the well house protected from unauthorized personnel?
☑	☐	☐	☐	☐	25. Are all non-sample taps installed in the well house equipped with an appropriate backflow prevention device?
☑	☐	☐	☐	☐	26. Is an electrical fan or automated air flow system provided in the well house to remove excess heat and moisture during peak summer temperatures?
☑	☐	☐	☐	☐	27. Is a thermostatically regulated heater installed in the well house to prevent moisture buildup during cold weather?
☑	☐	☐	☐	☐	28. Is the well house protected from flooding, have adequate drainage and is the floor surface at least six (6) inches above the final ground surface?
☐	☐	☑	☐	☐	29. Is the sump for well house floor drains closer than 30 feet from the well?
☐	☑	☐	☐	☐	30. Is the floor drain connected to sewer, storm drains, chlorination room drains, or any other source of contamination?

yes	no	n/a	unk	note	SPRING INFORMATION
☐	☐	☑	☐	☐	31. Is the entire area within one hundred (100) feet of the spring owned by the supplier or controlled by a long term lease?
☐	☐	☑	☐	☐	32. Is the entire area within a one hundred (100) foot radius of the spring box fenced to prevent trespassing of livestock and void of buildings, dwellings and sources of contamination?
☐	☐	☑	☐	☐	33. Is surface water and drainage ditches diverted from the 100 foot protection zone around the spring?
☐	☐	☑	☐	☐	34. Is the spring housed in a permanent structure and protected from contamination including the entry of surface water, animals and dust?
☐	☐	☑	☐	☐	35. Is a sample tap provided?
☐	☐	☑	☐	☐	36. Is a flow meter or other flow measuring device provided?
☐	☐	☑	☐	☐	37. Is there a screened overflow?
☐	☐	☑	☐	☐	38. Is the supply intake located above the floor of the collection chamber?

yes	no	n/a	unk	note	INFILTRATION GALLERY INFORMATION
☐	☐	☑	☐	☐	39. Is there a lid over the gallery?
☐	☐	☑	☐	☐	40. Is the lid watertight and locked?
☐	☐	☑	☐	☐	41. Is the manhole elevated at least 24 inches above the top of the tank or covering sod?
☐	☐	☑	☐	☐	42. Is the collector in sound condition and maintained as necessary?

GROUNDWATER SOURCE

SURVEY DA... 6/10/2010 (mm/dd/yyyy) | PWS # ID#5240009

A separate sources form must be filled out for **each** groundwater source in the PWS.

Tag #: A0004271	Common Name of Source: (Senior Avenue Well)	Source: [x] Well [ ] Spring [ ] Infiltration Gallery	Is this Source Treated? [x] Yes [ ] No Treatment Objective: [ ] N/A Disinfection
Physical Location: Senior Avenue			Treatment Types: [ ] N/A *(Identify Treatment Train in Comments)* Gas Chlorination, Post
Is there a well log for the groundwater source? [x] Yes [ ] No [ ] N/A [ ] Unk			

Pump Capacity (GPM)	Casing Size (In)	Date Drilled:	Well Depth (Ft)	Casing Depth (Ft)	Grout Depth(Ft)	Static Water Depth (Ft)
1,200 [ ] Unk	20-16 [ ] Unk	1971 [ ] Unk	406 [ ] Unk	178 [ ] Unk	178 [ ] Unk	180 [ ] Unk

Is the Casing Screened? [ ] Yes [x] No [ ] Unk [ ] N/A	Screen Depth (Ft): [x] N/A [ ] Unk From: To:	Is the Casing Perforated? [ ] Yes [x] No [ ] Unk [ ] N/A	Perforation Depth (Ft): [x] N/A [ ] Unk From: To:

Latitude (Decimal): 42 deg 56' 9.8600"

Longitude (Decimal): 114 deg 42' 59.1200"

(+) IF A GROUNDWATER SOURCE HAS BEEN DETERMINED TO FALL UNDER THE DIRECT INFLUENCE OF SURFACE WATER, THE SURFACE WATER SYSTE INSPECTION RESULTS AND TURBIDITY SECTIONS MUST BE FILLED OUT IN ADDITION TO THE GROUNDWATER SYSTEM INSPECTION RESULTS SECTION.

GROUNDWATER SOURCE

1. This source is:
   [x] Active [ ] Proposed
   [ ] Inactive [ ] Emergency (<60 days per year)

yes	no	n/a	unk	note	Question
[x]	[ ]	[ ]	[ ]	[ ]	2. Has there been a Source Water Assessment conducted for the source? Date: 2002
[ ]	[ ]	[x]	[ ]	[ ]	3. Has a final GWUDI determination been done for this source? Date: ______
[x]	[ ]	[ ]	[ ]	[ ]	4. Is the well on a separate lot that is large enough to provide a minimum distance of 50 feet between the well and the nearest property line? (applicable if constructed after 11/1/77)
[x]	[ ]	[ ]	[ ]	[ ]	5. Is the well lot owned in fee simple by the supplier of water or controlled by lease with a term of not less than the useful life of the well?
					6. Are the following minimum distances from the PWS well being met?
[x]	[ ]	[ ]	[ ]	[ ]	- Sewer line....50 Ft.
[x]	[ ]	[ ]	[ ]	[ ]	- Individual home septic tank....100 Ft.
[x]	[ ]	[ ]	[ ]	[ ]	- Individual home disposal field....100 Ft.
[x]	[ ]	[ ]	[ ]	[ ]	- Individual home seepage pit....100 Ft.
[x]	[ ]	[ ]	[ ]	[ ]	- Privies....100 Ft.
[x]	[ ]	[ ]	[ ]	[ ]	- Livestock....50 Ft.
[x]	[ ]	[ ]	[ ]	[ ]	- Canals, streams, ditches, lakes, ponds and tanks used to store nonpotable substances....50 Ft.
[x]	[ ]	[ ]	[ ]	[ ]	- Any other potential source of contamination observed at time of inspection....50 Ft.
[ ]	[x]	[ ]	[ ]	[ ]	7. Are pesticides, herbicides, fertilizers, portable containers of petroleum products, or other toxic or hazardous materials stored on the well lot?
[ ]	[x]	[ ]	[ ]	[ ]	8. Are pesticides, herbicides, or fertilizers applied to the well lot?
[ ]	[x]	[ ]	[ ]	[ ]	9. Is the well in a pit? If yes, Date constructed:
[ ]	[ ]	[x]	[ ]	[ ]	10. Was the well that is located in a pit installed after 11/5/64?
[ ]	[ ]	[x]	[ ]	[ ]	11. If pit was installed prior to 11/5/64 – Does the pit have water tight construction of pit walls and floor, a floor drain and an acceptable pit cover?
[x]	[ ]	[ ]	[ ]	[ ]	12. Is the source protected from unauthorized entry? *(Recommended)*
[x]	[ ]	[ ]	[ ]	[ ]	13. Does the casing extend a minimum of 18 inches above the final ground surface and/ or 12 inches above the well house floor?
[x]	[ ]	[ ]	[ ]	[ ]	14. Is the well vented with the open end of the vent screened and terminated downward at least 18 inches above the final ground surface?
[x]	[ ]	[ ]	[ ]	[ ]	15. Is the well cap sanitary seal properly installed and maintained?
[x]	[ ]	[ ]	[ ]	[ ]	16. Is the well cased and sealed in such a manner that surface water cannot enter the well?

COMMENTS:
(Please indicate question number)

GROUNDWATER SOURCES PG. 2	Common Name	SURVEY DATE		PWS #
	(Senior Avenue Well)	6/10/2010	(mm/dd/yyyy)	ID#5240009

yes	no	n/a	unk	note	GROUNDWATER SOURCE (cont.)
☑	☐	☐	☐	☐	17. Is there a smooth nosed sample tap provided on the well discharge pipe prior to treatment? (Threaded tap is approved with backflow preventer)
☑	☐	☐	☐	☐	18. Is an instantaneous and totalizing flow meter installed on the pump distribution line of the well and is it maintained and working properly? 21220400 gal.
☑	☐	☐	☐	☐	19. Is a pressure gauge provided at all installations and is it maintained and working properly? 70 psi.
☑	☐	☐	☐	☐	20. Can the well be pumped to waste at the design capacity of the well via an approved air gap at a location prior to the first service connection?
☐	☑	☐	☐	☐	21. Has the source been known to have caving or sand problems?

yes	no	n/a	unk	note	WELL HOUSE *(Any structure containing important water system components)*
☑	☐	☐	☐	☐	22. Is the source located in a well house?
☑	☐	☐	☐	☐	23. Is the well house kept clean and in good repair? *(Floor cracks?)*
☑	☐	☐	☐	☐	24. Is the well house protected from unauthorized personnel?
☑	☐	☐	☐	☐	25. Are all non-sample taps installed in the well house equipped with an appropriate backflow prevention device?
☑	☐	☐	☐	☑	26. Is an electrical fan or automated air flow system provided in the well house to remove excess heat and moisture during peak summer temperatures?
☑	☐	☐	☐	☐	27. Is a thermostatically regulated heater installed in the well house to prevent moisture buildup during cold weather?
☑	☐	☐	☐	☐	28. Is the well house protected from flooding, have adequate drainage and is the floor surface at least six (6) inches above the final ground surface?
☐	☑	☐	☐	☐	29. Is the sump for well house floor drains closer than 30 feet from the well?
☐	☑	☐	☐	☐	30. Is the floor drain connected to sewer, storm drains, chlorination room drains, or any other source of contamination?

yes	no	n/a	unk	note	SPRING INFORMATION
☐	☐	☑	☐	☐	31. Is the entire area within one hundred (100) feet of the spring owned by the supplier or controlled by a long term lease?
☐	☐	☑	☐	☐	32. Is the entire area within a one hundred (100) foot radius of the spring box fenced to prevent trespassing of livestock and void of buildings, dwellings and sources of contamination?
☐	☐	☑	☐	☐	33. Is surface water and drainage ditches diverted from the 100 foot protection zone around the spring?
☐	☐	☑	☐	☐	34. Is the spring housed in a permanent structure and protected from contamination including the entry of surface water, animals and dust?
☐	☐	☑	☐	☐	35. Is a sample tap provided?
☐	☐	☑	☐	☐	36. Is a flow meter or other flow measuring device provided?
☐	☐	☑	☐	☐	37. Is there a screened overflow?
☐	☐	☑	☐	☐	38. Is the supply intake located above the floor of the collection chamber?

yes	no	n/a	unk	note	INFILTRATION GALLERY INFORMATION
☐	☐	☑	☐	☐	39. Is there a lid over the gallery?
☐	☐	☑	☐	☐	40. Is the lid watertight and locked?
☐	☐	☑	☐	☐	41. Is the manhole elevated at least 24 inches above the top of the tank or covering sod?
☐	☐	☑	☐	☐	42. Is the collector in sound condition and maintained as necessary?

COMMENTS:
(Please indicate question number)

26. The pump facilities fan had been removed and was being repaired at the time of the inspection.

Page 6 Of 24

IDEQ - Enhanced Sanitary Survey - 5/11/05

Groundwater Source

GROUNDWATER SOURCE

SURVEY DATE: 6/10/2010 (mm/dd/yyyy) | PWS #: ID#5240009

A separate sources form must be filled out for each groundwater source in the PWS.

Tag #: A0004273	Common Name of Source: 13th Avenue	Source: ☑ Well ☐ Spring ☐ Infiltration Gallery	Is this Source Treated? ☐ Yes ☑ No Treatment Objective: ☐ N/A
Physical Location: 13th Avenue & Nevada			Treatment Types: ☑ N/A *(Identify Treatment Train in Comments)*
Is there a well log for the groundwater source? ☑ Yes ☐ No ☐ N/A ☐ Unk			

Pump Capacity (GPM)	Casing Size (In)	Date Drilled:	Well Depth (Ft)	Casing Depth (Ft)	Grout Depth(Ft)	Static Water Depth (Ft)
1,200 ☐ Unk	16 ☐ Unk	1962 ☐ Unk	435 ☐ Unk	162 ☐ Unk	162 ☐ Unk	180 ☐ Unk

Is the Casing Screened? ☐ Yes ☑ No ☐ Unk ☐ N/A	Screen Depth (Ft): ☑ N/A ☐ Unk From: To:	Is the Casing Perforated? ☐ Yes ☑ No ☐ Unk ☐ N/A	Perforation Depth (Ft): ☑ N/A ☐ Unk From: To:

Latitude (Decimal): 42 deg 55' 56.0900"

Longitude (Decimal): 114 deg 42' 59.4500"

(+) IF A GROUNDWATER SOURCE HAS BEEN DETERMINED TO FALL UNDER THE DIRECT INFLUENCE OF SURFACE WATER, THE SURFACE WATER SYSTE INSPECTION RESULTS AND TURBIDITY SECTIONS MUST BE FILLED OUT IN ADDITION TO THE GROUNDWATER SYSTEM INSPECTION RESULTS SECTION.

GROUNDWATER SOURCE

COMMENTS: (Please indicate question number)

1. This source is: ☑ Active ☐ Proposed ☐ Inactive ☐ Emergency (<60 days per year)

yes	no	n/a	unk	note	
☑	☐	☐	☐	☐	2. Has there been a Source Water Assessment conducted for the source? Date: 2002
☐	☐	☑	☐	☐	3. Has a final GWUDI determination been done for this source? Date: ______
☑	☐	☐	☐	☐	4. Is the well on a separate lot that is large enough to provide a minimum distance of 50 feet between the well and the nearest property line? (applicable if constructed after 11/1/77)
☑	☐	☐	☐	☐	5. Is the well lot owned in fee simple by the supplier of water or controlled by lease with a term of not less than the useful life of the well?
					6. Are the following minimum distances from the PWS well being met?
☑	☐	☐	☐	☐	- Sewer line....50 Ft.
☑	☐	☐	☐	☐	- Individual home septic tank....100 Ft.
☑	☐	☐	☐	☐	- Individual home disposal field....100 Ft.
☑	☐	☐	☐	☐	- Individual home seepage pit....100 Ft.
☑	☐	☐	☐	☐	- Privies....100 Ft.
☑	☐	☐	☐	☐	- Livestock....50 Ft.
☑	☐	☐	☐	☐	- Canals, streams, ditches, lakes, ponds and tanks used to store nonpotable substances....50 Ft.
☑	☐	☐	☐	☐	- Any other potential source of contamination observed at time of inspection....50 Ft.
☐	☑	☐	☐	☐	7. Are pesticides, herbicides, fertilizers, portable containers of petroleum products, or other toxic or hazardous materials stored on the well lot?
☐	☑	☐	☐	☐	8. Are pesticides, herbicides, or fertilizers applied to the well lot?
☐	☑	☐	☐	☐	9. Is the well in a pit? If yes, Date constructed:
☐	☐	☑	☐	☐	10. Was the well that is located in a pit installed after 11/5/64?
☐	☐	☑	☐	☐	11. If pit was installed prior to 11/5/64 – Does the pit have water tight construction of pit walls and floor, a floor drain and an acceptable pit cover?
☑	☐	☐	☐	☐	12. Is the source protected from unauthorized entry? *(Recommended)*
☑	☐	☐	☐	☐	13. Does the casing extend a minimum of 18 inches above the final ground surface and/ or 12 inches above the well house floor?
☐	☐	☐	☐	☑	14. Is the well vented with the open end of the vent screened and terminated downward at least 18 inches above the final ground surface?
☐	☐	☐	☐	☑	15. Is the well cap sanitary seal properly installed and maintained?
☐	☐	☐	☐	☑	16. Is the well cased and sealed in such a manner that surface water cannot enter the well?

Page 7 Of 24

IDEQ - Enhanced Sanitary Survey - 5/11/05 | Groundwater Source

GROUNDWATER SOURCES PG. 2

Common Name	SURVEY DATE		PWS #
13th Avenue	6/10/2010	(mm/dd/yyyy)	ID#5240009

yes	no	n/a	unk	note	GROUNDWATER SOURCE (cont.)
✓					17. Is there a smooth nosed sample tap provided on the well discharge pipe prior to treatment? (Threaded tap is approved with backflow preventer)
✓					18. Is an instantaneous and totalizing flow meter installed on the pump distribution line of the well and is it maintained and working properly? 27,401,800 gal.
✓					19. Is a pressure gauge provided at all installations and is it maintained and working properly? 70 psi.
			✓		20. Can the well be pumped to waste at the design capacity of the well via an approved air gap at a location prior to the first service connection?
	✓				21. Has the source been known to have caving or sand problems?
yes	**no**	**n/a**	**unk**	**note**	**WELL HOUSE** *(Any structure containing important water system components)*
✓					22. Is the source located in a well house?
✓				✓	23. Is the well house kept clean and in good repair? *(Floor cracks?)*
✓					24. Is the well house protected from unauthorized personnel?
✓					25. Are all non-sample taps installed in the well house equipped with an appropriate backflow prevention device?
✓					26. Is an electrical fan or automated air flow system provided in the well house to remove excess heat and moisture during peak summer temperatures?
✓					27. Is a thermostatically regulated heater installed in the well house to prevent moisture buildup during cold weather?
✓					28. Is the well house protected from flooding, have adequate drainage and is the floor surface at least six (6) inches above the final ground surface?
	✓				29. Is the sump for well house floor drains closer than 30 feet from the well?
	✓				30. Is the floor drain connected to sewer, storm drains, chlorination room drains, or any other source of contamination?
yes	**no**	**n/a**	**unk**	**note**	**SPRING INFORMATION**
		✓			31. Is the entire area within one hundred (100) feet of the spring owned by the supplier or controlled by a long term lease?
		✓			32. Is the entire area within a one hundred (100) foot radius of the spring box fenced to prevent trespassing of livestock and void of buildings, dwellings and sources of contamination?
		✓			33. Is surface water and drainage ditches diverted from the 100 foot protection zone around the spring?
		✓			34. Is the spring housed in a permanent structure and protected from contamination including the entry of surface water, animals and dust?
		✓			35. Is a sample tap provided?
		✓			36. Is a flow meter or other flow measuring device provided?
		✓			37. Is there a screened overflow?
		✓			38. Is the supply intake located above the floor of the collection chamber?
					INFILTRATION GALLERY INFORMATION
		✓			39. Is there a lid over the gallery?
		✓			40. Is the lid watertight and locked?
		✓			41. Is the manhole elevated at least 24 inches above the top of the tank or covering sod?
		✓			42. Is the collector in sound condition and maintained as necessary?

COMMENTS:
(Please indicate question number)

Page 8 Of 24

IDEQ - Enhanced Sanitary Survey - 5/11/05 Groundwater Source

STORAGE

A separate storage form must be filled out for **each** storage unit in the PWS.

SURVEY DATE	6/10/2010 (mm/dd/yyyy)	PWS #	ID#5240009

Storage Structure Name: 4th Ave/Washington 1.14 MG Bolted Steel Storage Tank	Storage Structure ID #: Not Avail.	COMMENTS: (Please indicate the question number)
Physical Location: Corner of 4th Avenue & Washinton Street	Date in service: ☐ Unk 1989-1990	
	Volume (gal): ☐ Unk 1.14 MG	
Storage Type: ☑ Reservoir/Tank ☐ Standpipe	Construction: ☐ Elevated ☑ Above Ground ☐ Below Ground ☐ Partially Below Ground	Type of material: ☐ Plastic ☐ Fiberglass ☐ Concrete ☐ Wood ☑ Metal ☐ Naturally Contained
Total Days Supply (This structure): Two Days (Average Demand ☐ Unk	Date Last: Inspected: ☐ Unk 2002 - Aqua Divers	Cleaned: ☐ Unk 2002 - Aqua Divers
How is the water level measured? ☐ Unk Transducer		

yes	no	n/a	unk	note	STORAGE
✓					1. Is the storage structure safely accessible to the inspector?
	✓				2. Is the PWS storage tank located within 500 feet of any municipal or Industrial wastewater treatment plant or any land which is spray irrigated with wastewater or used for sludge disposal?
✓					3. Is there a minimum distance of 50 feet between any buried or partially buried storage tank or clear well and any sanitary sewers or septic tank?
✓					4. Is the area surrounding the storage structure graded in a manner to protect it against flooding and prevent water from standing within 50 feet?
✓					5. Are all vents extended 12 inches above the roof and constructed and screened to exclude potential sources of contamination?
✓					6. Is the storage structure provided with an overflow?
		✓			7. **Elevated Storage Structure** - Does the elevated tank overflow open downward and screened with four (4) mesh non-corrodible screen within the overflow pipe, or a flapper valve provided with a screen inside the valve?
✓					8. **Ground-level Storage Structure** - Are all overflows downturned, discharge to daylight, and provided with either a twenty-four (24) mesh noncorrodible screen installed within the pipe when practical, or an expanded metal screen installed within the pipe plus a weighted flapper?
✓					9. Are overflows and drains brought down to an elevation between 12 and 24 inches above the ground surface?
✓					10. Do overflows and drains discharge over a drainage inlet structure or a splash plate and not connected to a sewer? (storm or sanitary)
			✓	✓	11. Do all drains discharge to daylight in a way that will preclude the possibility of backflow to the reservoir and, where practical, provided with an expanded metal screen installed within the pipe to exclude rodents?
✓					12. Is the storage structure secure from unauthorized access?
✓					13. Does the storage reservoir have a watertight roof or cover and is it sloped so that water will drain?
✓					14. Is the storage water protected from contamination?
✓					15. Is the storage structure structurally sound?
	✓				16. Could vegetation in the area potentially impact the storage structure? *(Recommended)*
✓					17. Is the storage structure designed so that it can be isolated from the distribution system without necessitating loss of pressure in the distribution system?
			✓		18. Is the discharge pipe from the water storage structure located in a manner that will prevent the flow of sediment into the distribution system?
	✓				19. Is leakage evident at time of inspection?
	✓				20. Is the storage structure interior coating or liner peeling or cracked?
✓					21. Is the storage structure used to store finished water?
✓					22. Are manhole openings overlapping, water tight, locked and four-inches or greater above the reservoir roof surface?

Page 9 Of 24

IDEQ - Enhanced Sanitary Survey - 5/11/05 Storage

STORAGE

A separate storage form must be filled out for **each** storage unit in the PWS.

.VEY DATE: 6/10/2010 *(mm/dd/yyyy)* PWS #: ID#5240009

Storage Structure Name: Senior Ave 50,000 Welded Steel Storage Tank	Storage Structure ID #: Not Avail.	**COMMENTS:** (Please indicate the question number)
Physical Location: Senior Avenue	Date in service: ☐ Unk — 1971 Volume (gal): ☐ Unk — 50,000 Gal	
Storage Type: ☑ Reservoir/Tank ☐ Standpipe	Construction: ☐ Elevated ☑ Above Ground ☐ Below Ground ☐ Partially Below Ground	Type of material: ☐ Plastic ☐ Fiberglass ☐ Concrete ☐ Wood ☑ Metal ☐ Naturally Contained
Total Days Supply (This structure): Four Hours (Ave. Demand) ☐ Unk	Date Last: Inspected: ☐ Unk — 2002 - Aqua Divers	Cleaned: ☐ Unk — 2002 - Aqua Divers
How is the water level measured? ☐ Unk — Transducer		

yes	no	n/a	unk	note	STORAGE
X					1. Is the storage structure safely accessible to the inspector?
	X				2. Is the PWS storage tank located within 500 feet of any municipal or industrial wastewater treatment plant or any land which is spray irrigated with wastewater or used for sludge disposal?
X					3. Is there a minimum distance of 50 feet between any buried or partially buried storage tank or clear well and any sanitary sewers or septic tank?
X					4. Is the area surrounding the storage structure graded in a manner to protect it against flooding and prevent water from standing within 50 feet?
X					5. Are all vents extended 12 inches above the roof and constructed and screened to exclude potential sources of contamination?
X					6. Is the storage structure provided with an overflow?
		X			7. **Elevated Storage Structure** - Does the elevated tank overflow open downward and screened with four (4) mesh non-corrodible screen within the overflow pipe, or a flapper valve provided with a screen inside the valve?
X				X	8. **Ground-level Storage Structure** - Are all overflows downturned, discharge to daylight, and provided with either a twenty-four (24) mesh noncorrodible screen installed within the pipe when practical, or an expanded metal screen installed within the pipe plus a weighted flapper?
X					9. Are overflows and drains brought down to an elevation between 12 and 24 inches above the ground surface?
X					10. Do overflows and drains discharge over a drainage inlet structure or a splash plate and not connected to a sewer? (storm or sanitary)
X					11. Do all drains discharge to daylight in a way that will preclude the possibility of backflow to the reservoir and, where practical, provided with an expanded metal screen installed within the pipe to exclude rodents?
X					12. Is the storage structure secure from unauthorized access?
X					13. Does the storage reservoir have a watertight roof or cover and is it sloped so that water will drain?
X					14. Is the storage water protected from contamination?
X					15. Is the storage structure structurally sound?
	X				16. Could vegetation in the area potentially impact the storage structure? *(Recommended)*
X					17. Is the storage structure designed so that it can be isolated from the distribution system without necessitating loss of pressure in the distribution system?
			X		18. Is the discharge pipe from the water storage structure located in a manner that will prevent the flow of sediment into the distribution system?
	X				19. Is leakage evident at time of inspection?
	X				20. Is the storage structure interior coating or liner peeling or cracked?
X					21. Is the storage structure used to store finished water?
X					22. Are manhole openings overlapping, water tight, locked and four-inches or greater above the reservoir roof surface?

Page 10 Of 24

IDEQ - Enhanced Sanitary Survey - 5/11/05 Storage

DISTRIBUTION DATA

One form for all distribution systems in the PWS.

SURVEY DATE: 6/10/2010 (mm/dd/yyyy) PWS #: ID#5240009

What are water lines made of:
Material(s): ☐ Unk
☑ Steel ☐ HDPE (black) ☐ Asbestos/Cement
☑ PVC ☐ Ductile Iron ☐ Other:

Size(s): ☐ Unk
90% Cast Iron, 10%pvc
60% 4", 15%6", 15% 8", 5% 10" and 5% 12"

How many services are metered?
1450 out of 1450

Number of Fire Hydrants:
131 Hydrants

COMMENTS:
(Please indicate the question number)

yes	no	n/a	unk	note	DISTRIBUTION
☐	☑	☐	☐	☐	1. Have there been any interruptions in service during the past year? (including pressure loss)
☐	☐	☑	☐	☐	2. If a loss of pressure occurred (>20 psi), did the PWS provide public notice and disinfect the system? (Reminder)
☑	☐	☐	☐	☐	3. Is the PWS able to maintain a minimum pressure of twenty (20) psi throughout the distribution system (including fire flow), or forty (40) psi for PWSs constructed after 7/1/1985 (excluding fire flow), during maximum hourly demand conditions?
☐	☑	☐	☐	☐	4. Was the pressure observed at a service connection?
					5. If yes, psi: ______ Location: ______ Time: ______ ☐ A.M. ☐ P.M.
☑	☐	☐	☐	☐	6. Do all water mains that provide fire flow have a diameter of at least 6 inches?
☑	☐	☐	☐	☐	7. Are valves exercised regularly? *(Recommended)* If yes, how often? ______
☑	☐	☐	☐	☐	8. Is there a leak detection program? *(Recommended)*
☐	☐	☐	☑	☐	9. Is 15% or more of the water unaccounted for?
☑	☐	☐	☐	☐	10. Is a water conservation program in effect? *(Recommended)*
☑	☐	☐	☐	☐	11. Is an adequate map of the distribution system maintained? *(Recommended)*
☑	☐	☐	☐	☐	12. Does the system flush all main lines annually? *(Recommended)*
☑	☐	☐	☐	☐	13. Are all dead end water mains equipped with a means to flush
☑	☐	☐	☐	☐	14. If yes, are the deadends flushed at least semiannually?
☐	☑	☐	☐	☐	15. Are there any distribution materials used that should not be in contact with the drinking water? If yes, explain in comments section.
☑	☐	☐	☐	☐	16. Is the system adequately protected from freezing?
☑	☐	☐	☐	☐	17. Is there a cross connection control program? (Community PWSs Only)
☑	☐	☐	☐	☐	18. Is the operator trained in cross connection control? *(Recommended)*
☐	☑	☐	☐	☐	19. Is the operator aware of any cross connections or were any cross connections observed during the course of the survey?
☐	☐	☑	☐	☐	20. If a separate non-potable irrigation system is provided for the consumer, are all mains, hydrants, and appurtenances easily identified as non-potable? (Purple Tape or other) *(Recommended)*
					Air/Vacuum Relief Valves - Placed at high points in water mains.
☐	☐	☑	☐	☐	21. Is the open end of the **automatic** air relief valve(s) extended to at least one foot above grade and provided with a screened, downward-facing elbow?
☐	☐	☑	☐	☐	22. Is the discharge pipe from the air relief valve(s) connected directly to any storm sewer, or sanitary sewer? (manual or automatic)

Page 11 Of 24

IDEQ - Enhanced Sanitary Survey - 5/11/05 Distribution

PUMPING DATA

SURVEY DATE		PWS #
6/10/2010	(mm/dd/yyyy)	ID#5240009

One form for all Pumps.

PUMPS, PUMPHOUSES, AND CONTROLS

Pump ID#	Physical Location:	Type of Pump:	Brand:	Frame Model:	Horsepower:	Purpose:
Well 1	4th Avenue/Washington Street	Vertical Turbine	US Motor	404TP	100	Increase Source Hd
Well 2	Senior Avenue	Vertical Turbine	G.E. - Westinghouse	5R6267XH1A	100	Increase Source Hd
Well 3	13th Street	Vertical Turbine	G.E. - Westinghouse	L405TP16	125	Increase Source Hd
Boost 1	4th Avenue/Washington Street	Vertical Turbine	US Motor	286TC	30HP	380475-700
Boost 2	4th Avenue/Washington Street	Vertical Turbine	US Motor	326TSCDP	60HP	610940
Boost 3	4th Avenue/Washington Street	Unavailable				
Boost 4	4th Avenue/Washington Street	Split Case	TECO	4451	150HP	Variable Controlled
Boost 5	Senior Avenue	Vertical Turbine	Continental	651281	60 HP	

COMMENTS:
(Please indicate the question number)

yes	no	n/a	unk	note	PUMPING
✓					1. Are all pumps capable of providing the maximum pumping demand of the system?
	✓				2. Does the pump(s) cycle excessively?
✓				✓	3. Is the pumphouse(s) clean and orderly?
✓					4. Are there spare pump parts or a replacement pump that is capable of providing the maximum daily pumping demand?
✓					5. Are gate valves located on the suction and/or discharge sides of each pump?
✓					6. Is a positive-acting check valve located above ground on the discharge side between each pump and the shut-off valve?
✓					7. Is the pump station(s) adequately lighted throughout?
✓					8. Is a water pressure relief valve installed where the pump is directly connected to the distribution system?
✓					9. If the system has a vertical turbine motor driven pump(s), is an air release-vacuum relief valve located upstream from the check valve, with exhaust/relief piping terminating in a down-turned position at least 18 inches above the floor and covered with a 24 mesh corrosion resistant screen?
		✓			10. If the pump(s) is "oil lubricated", is the oil NSF approved and suitable for human consumption?

yes	no	n/a	unk	note	AUXILIARY POWER
✓					11. Is there auxiliary power on-site?
✓					12. Is auxiliary power tested? *(Recommended)*
✓					13. If a diesel or gasoline fueled engine is used on the well lot; is the fuel tank and connecting piping double walled?
✓					14. Is the fuel tank above ground?
✓					15. Is a certified operator present during the filling of the fuel tank?
					16. If the engine is in the well house:
✓					- Is the engine exhaust directly discharged outside the well house?
✓					- Is a spill containment structure surrounding all fuel tanks adequate? (Secondary containment - 110% fuel tank capacity)

	SURVEY DATE		PWS #
PUMPING DATA PG. 2	6/10/2010	(mm/dd/yyyy)	ID#5240009

yes	no	n/a	unk	note	BOOSTER PUMPS	COMMENTS: (Please indicate the question number)
☑	☐	☐	☐	☐	17. Is the pump facility properly protected against unauthorized entry?	
☑	☐	☐	☐	☐	18. Does the booster pump maintain an operating pressure of 20 psi or greater (>40 psi for systems built after 7/1/1985)?	
☑	☐	☐	☐	☐	19. Is a standard pressure gauge installed on the discharge line?	
☑	☐	☐	☑	☐	20. Are all in-line booster pumps supplied with an automatic cutoff that activates when intake pressure is less than or equal to 5 psi ?	
☑	☐	☐	☐	☐	21. Is the booster pump located on a suction line that is directly connected to any storage reservoir?	
☑	☐	☐	☑	☐	22. If yes, are all booster pumps protected by an automatic cutoff to prevent pump damage and avoid excessive reservoir drawdown?	
☑	☐	☐	☐	☐	23. Is a water pressure relief valve installed where the pump is directly connected to the distribution system?	
☑	☐	☐	☐	☐	24. Is an instantaneous and totalizing flow meter installed where the booster pump is directly connected to the distribution system?	
☑	☐	☐	☐	☐	25. Is the building that encloses the booster pump provided with an electric ventilation fan or an automated air flow system that will remove heat and moisture during peak summer temperatures?	
☑	☐	☐	☐	☐	26. Is a thermostatically regulated heater installed in the booster pump house to prevent moisture buildup during cold weather?	
☑	☐	☐	☐	☐	27. Is proper drainage provided? (Outside the pumphouse)	
☑	☐	☐	☐	☐	28. Is the pump station properly protected from flooding? (Inside the pumphouse)	

Page 13 Of 24

IDEQ - Enhanced Sanitary Survey - 5/11/05 Pumping

FINANCIAL CAPACITY

SURVEY DATE		PWS #
6/10/2010	(mm/dd/yyyy)	ID#5240009

yes	no	n/a	unk	note	FINANCIAL CAPACITY
☑	☐	☐	☐	☐	1. Is the PWS current with the payment of drinking water fees?
☑	☐	☐	☐	☐	2. Does the PWS charge a drinking water fee to the user? If yes, what is the fee: $8.60/13,000 Gal & $.10/100 thereafter
☑	☐	☐	☐	☑	3. Is the PWS in the business of selling water? - If no, identify why in the comments section and mark "N/A" on questions 4 - 21.
☑	☐	☐	☐	☐	4. Does the PWS provide and use an annual budget? *(Recommended)*
☑	☐	☐	☐	☐	5. If applicable, is the PWS fund separate from the waste water/sewer utility fund? *(Recommended)*
☑	☐	☐	☐	☐	6. Do water system revenues exceed expenditures? *(Recommended)*
☑	☐	☐	☐	☐	7. Are controls established to prevent expenditures from exceeding revenues? If yes, describe in the comments section.
☑	☐	☐	☐	☐	8. Has an independent financial audit been completed? *(Recommended)*
☑	☐	☐	☐	☐	9. If yes, is a copy of the most recent balance sheet for the water system available? *(Recommended)*
☑	☐	☐	☐	☐	10. Does the water system include a cash budget within its annual budget for cash flow? *(Recommended)*
☑	☐	☐	☐	☐	11. Does the water system management review the user fee, user charge, or rate system at least annually? *(Recommended)*
					12. When was the last user fee, user charge, or rate system adjustment? Jan-00 *mm/dd/yyyy*
☑	☐	☐	☐	☐	13. Does the water system management review financial reports at least monthly? *(Recommended)*
☑	☐	☐	☐	☐	14. Does the PWS provide and use a capital budget? *(Recommended)*
☑	☐	☐	☐	☐	15. Has this PWS produced and does it currently utilize a capital improvements plan? *(Recommended)*
					16. If yes, when was the capital improvements budget produced? Unknown *mm/dd/yyyy*
☑	☐	☐	☐	☐	17. Has the capital improvement budget been updated in the last 18 months? *(Recommended)*
☑	☐	☐	☐	☐	18. Does the water system budget provide funding for depreciation of existing plant in service and/or for the funding of reserves for system replacement?
☑	☐	☐	☐	☐	19. Are there sufficient funds for training personnel?

COMMENTS:
(Please indicate the question number)

3. Not for profit business

Page 14 Of 24

IDEQ - Enhanced Sanitary Survey - 5/11/05 Financial Capacity

SURVEY DATE		PWS #
06/10/2010	(mm/dd/yyyy)	ID#5240009

MANAGERIAL CAPACITY

yes	no	n/a	unk	note	MANAGERIAL CAPACITY
☑	☐	☐	☐	☐	1. Is a licensed operator available at all times? (N/A for TNC PWS)
☐	☑	☐	☐	☐	2. Is there a Certified Drinking Water Protection Plan developed for this system? Date: ____________
☑	☐	☐	☐	☐	3. Does this PWS have a governing body or board of directors? If no, please indicate:

☐ Sole Proprietorship
☐ Partnership
☐ Limited Liability Corp.
☑ Other: City Council

4. How often does the board meet? ☐ N/A

☐ weekly	☐ semi-annually	☐ never
☐ monthly	☐ annually	☐ other: ____________
☑ bimonthly	☐ as necessary	☐ unknown

yes	no	n/a	unk	note	5. Are the following records maintained onsite or located near by?
☑	☐	☐	☐	☐	- Bacteriological Analysis - **5 years retention.**
☑	☐	☐	☐	☐	- Chemical Analysis - **10 years retention.**
☑	☐	☐	☐	☐	- Records of actions taken to correct violations - **3 years retention.**
☑	☐	☐	☐	☐	- Copies of reports, summaries or communication related to sanitary surveys - **10 years retention.**
☑	☐	☐	☐	☐	- Reports concerning variances or exemptions - **5 years retention.**
☑	☐	☐	☐	☐	- Copies of public notices issued - **3 years retention.**
					- Daily free chlorine residuals *(required disinfection)* - **1 year retention.**
☑	☐	☐	☐	☐	6. Are routine maintenance schedules established? *(Recommended)*
☑	☐	☐	☐	☐	7. Are routine operation and maintenance records kept? *(Recommended)*
☑	☐	☐	☐	☐	8. Is there a clear plan of organization and control among the people responsible for management and operations of the water system? *(Recommended)*

yes	no	n/a	unk	note	9. Are any samples of the following parameters past due?
☐	☑	☐	☐	☐	Coliform
☐	☑	☐	☐	☐	Nitrates
☐	☑	☐	☐	☐	Nitrites
☐	☑	☐	☐	☐	Lead and Copper
☐	☑	☐	☐	☐	IOCs
☐	☑	☐	☐	☐	VOCs
☐	☑	☐	☐	☐	SOCs
☐	☑	☐	☐	☐	Disinfection Byproducts
☐	☑	☐	☐	☐	Radionuclide
☑	☐	☐	☐	☐	10. Is a written total coliform rule (TCR) sample site plan available for review?
☐	☐	☑	☐	☐	11. Does the (TCR) sample site plan meet the minimum requirements?
☑	☐	☐	☐	☐	12. Does the system have a sufficient supply of approved sampling bottles properly stored? *(Recommended)*
☑	☐	☐	☐	☐	13. Does the PWS provide stairways, ladders and handrails where needed?
☑	☐	☐	☐	☐	14. Are treads of non-slip material provided where needed?
☐	☑	☐	☐	☐	15. Is a health hazard produced from inadequately protected electrical wiring?
☑	☐	☐	☐	☐	16. Are all confined space entry requirements considered? *(Recommended)*
☐	☑	☐	☐	☐	17. Are there any unused subsurface water storage tanks that need to be abandoned?
☐	☑	☐	☐	☐	18. Are there any water supply wells that are no longer being used that need to be abandoned?

COMMENTS:
(Please indicate the question number)

IDEQ - Enhanced Sanitary Survey - 5/11/05

Page 15 Of 24
Managerial Capacity

TREATMENT APPLICATION & CONTROL

A separate form must be filled out for **each** Treatment Application in the PWS.		Survey Date: 6/10/2010	(mm/dd/yyyy)	PWS #: ID#5240009
Purpose of Treatment: Distribution Residual	Treatment Facility Location: 4th Avenue/Washington Street	Date Online: ☐ Unk 1996	Treated Water (GPD): ☐ Unk 450,000	

Identify **one** process in the treatment train for inspection: ☐ N/A

☐ Sedimentation Basin ☐ Filtration ☐ Blending ☐ Oxidation ☐ Ion Exchange ☐ Aeration ☐ Sequestration by Polyphosphates
☐ Detention Basin ☐ Chemical Coagulation ☐ Softening ☑ Disinfection (Complete Disinfection Mod.) ☐ Sequestration by Sodium Silicates

Sources Treated by Facility: (Tag #)	Equipment Manufacturer:	Model #:
1. Well Source Before Storage	1. Regal	1. SC401
2.	2.	2.
3.	3.	3.

Chemical Trade Name:	Chemical Manufacturer:	NSF/ANSI certified?
1. Chlorine Gas	1. RQ Chlorine Un 1017 Zone B	☑ Yes ☐ No ☐ N/A ☐ Unk
2.	2.	☐ Yes ☐ No ☐ N/A ☐ Unk
3.	3.	☐ Yes ☐ No ☐ N/A ☐ Unk

yes	no	n/a	unk	note	Question
					WASTE HANDLING and DISPOSAL
☐	☐	☑	☐	☐	1. Are provisions made for proper disposal of water treatment plant waste such as sanitary, laboratory, clarification sludge, softening sludge, iron sludge, filter backwash water, brines and treatment media?
		☑		☐	2. If yes, how are wastes being disposed of? (Identify in comments)
					SAMPLE TAPS
☑	☐	☐	☐	☐	3. Are smooth-nosed sampling taps provided prior to and after each form of treatment?
		☐ N/A 4-26			**CHEMICAL APPLICATION** If no chemical applied, questions 4-26 are n/a
☑	☐	☐	☐	☐	4. Are spare parts available for all feeders to replace parts which are subject to wear and damage?
		☐			5. Are the feeders manually or automatically controlled? ☐ Manual ☑ Automatic
☑	☐	☐	☐	☐	6. Are chemical feed rates proportional to flow?
☑	☐	☐	☐	☐	7. Is a means to measure water flow provided in order to determine chemical feed rates?
☑	☐	☐	☐	☐	8. Are provisions made for measuring the quantities of chemicals used?
☐	☐	☑	☐	☐	9. Is cross-connection control provided on the service water lines that discharge to the solution tanks?
☑	☐	☐	☐	☐	10. Is cross-connection control provided so that liquid chemical solutions cannot be siphoned through solution feeders into the water supply?
☑	☐	☐	☐	☐	11. Is the chemical feed equipment readily accessible for servicing, repair, and observation of operation?
☑	☐	☐	☐	☐	12. Is space provided for convenient/efficient storage and handling of chemicals? *(Recommende*
☐	☐	☑	☐	☐	13. Are chemicals that are incompatible stored or handled together?
☐	☐	☑	☐	☐	14. Are chemical solution tanks kept covered?
☐	☐	☑	☐	☐	15. Are chemical solution tank overflow pipes, when provided, turned downward with the end screened? *(Recommended)*
☐	☐	☑	☐	☐	16. Do chemical solution tank overflow pipes, when provided, have free fall discharge? *(Recommended)*
☐	☐	☑	☐	☐	17. Are day tanks and tank refilling line entry points properly labeled to designate the chemical contained?
☐	☐	☑	☐	☐	18. Do feed lines have problems with scale-forming or solids deposits?
☑	☐	☐	☐	☐	19. Are floor surfaces smooth and impervious, slip-proof and well drained?
☑	☐	☐	☐	☐	20. Are vents from feeders, storage facilities and equipment exhaust discharged to the outside atmosphere above grade and remote from air intakes?
☑	☐	☐	☐	☐	21. Are chemical shipping containers fully labeled to include chemical name, purity, concentration, supplier name and address?
☐	☐	☑	☐	☐	22. Are acids and caustics kept in closed corrosion-resistant shipping containers or storage units?
☐	☐	☑	☐	☐	23. Are at least one pair of rubber gloves, a dust respirator of a type certified by NIOSH for toxic dusts, an apron or other protective clothing and goggles or face mask provided for each operator as required by the reviewing authority?
☐	☐	☑	☐	☐	24. Is a deluge shower and/or eyewashing device installed where strong acids and alkalis are used or stored? *(Recommended)*

Comments:
(Please indicate the question number)

Page 16 Of 24

IDEQ - Enhanced Sanitary Survey - 5/11/05 Treatment Application

TREATMENT APPLICATION & C TROL

A separate form must be filled out for **each** Treatment Application in the PWS.

Sur)ate	6/10/2010	(mm/dd/yyyy)	PWS # ID#5240009
Purpose of Treatment: Distribution Residual	Treatment Facility Location: Senior Avenue Well	Date Online: ☐ Unk 1980s	Treated Water (GPD): ☐ Unk 200,000

Identify **one** process in the treatment train for inspection: ☐ N/A

☐ Sedimentation Basin ☐ Filtration ☐ Blending ☐ Oxidation ☐ Ion Exchange ☐ Aeration ☐ Sequestration by Polyphosphates
☐ Detention Basin ☐ Chemical Coagulation ☐ Softening ☑ Disinfection (Complete Disinfection Mod.) ☐ Sequestration by Sodium Silicates

Sources Treated by Facility: (Tag #)	Equipment Manufacturer:	Model #:
1. Well Source Before Storage	1. Wallace Tiernan	1. V-741U
2.	2.	2.
3.	3.	3.

Chemical Trade Name:	Chemical Manufacturer:	NSF/ANSI certified?
1. Chlorine Gas	1. RQ Chlorine Un 1017 Zone B	☑ Yes ☐ No ☐ N/A ☐ Unk
2.	2.	☐ Yes ☐ No ☐ N/A ☐ Unk
3.	3.	☐ Yes ☐ No ☐ N/A ☐ Unk

Comments:
(Please indicate the question number)

WASTE HANDLING and DISPOSAL

yes	no	n/a	unk	note	
☐	☐	☑	☐	☐	1. Are provisions made for proper disposal of water treatment plant waste such as sanitary, laboratory, clarification sludge, softening sludge, iron sludge, filter backwash water, brines and treatment media?
		☑		☐	2. If yes, how are wastes being disposed of? (Identify in comments)

SAMPLE TAPS

yes	no	n/a	unk	note	
☑	☐	☐	☐	☐	3. Are smooth-nosed sampling taps provided prior to and after each form of treatment?

☐ N/A 4-26 **CHEMICAL APPLICATION** If no chemical applied, questions 4-26 are n/a

yes	no	n/a	unk	note	
☑	☐	☐	☐	☐	4. Are spare parts available for all feeders to replace parts which are subject to wear and damage?
		☐			5. Are the feeders manually or automatically controlled? ☐ Manual ☑ Automatic
☑	☐	☐	☐	☐	6. Are chemical feed rates proportional to flow?
☑	☐	☐	☐	☐	7. Is a means to measure water flow provided in order to determine chemical feed rates?
☑	☐	☐	☐	☐	8. Are provisions made for measuring the quantities of chemicals used?
☐	☐	☑	☐	☐	9. Is cross-connection control provided on the service water lines that discharge to the solution tanks?
☑	☐	☐	☐	☐	10. Is cross-connection control provided so that liquid chemical solutions cannot be siphoned through solution feeders into the water supply?
☑	☐	☐	☐	☐	11. Is the chemical feed equipment readily accessible for servicing, repair, and observation of operation?
☑	☐	☐	☐	☐	12. Is space provided for convenient/efficient storage and handling of chemicals? *(Recommende*
☐	☐	☑	☐	☐	13. Are chemicals that are incompatible stored or handled together?
☐	☐	☑	☐	☐	14. Are chemical solution tanks kept covered?
☐	☐	☑	☐	☐	15. Are chemical solution tank overflow pipes, when provided, turned downward with the end screened? *(Recommended)*
☐	☐	☑	☐	☐	16. Do chemical solution tank overflow pipes, when provided, have free fall discharge? *(Recommended)*
☐	☐	☑	☐	☐	17. Are day tanks and tank refilling line entry points properly labeled to designate the chemical contained?
☐	☐	☑	☐	☐	18. Do feed lines have problems with scale-forming or solids deposits?
☑	☐	☐	☐	☐	19. Are floor surfaces smooth and impervious, slip-proof and well drained?
☑	☐	☐	☑	☑	20. Are vents from feeders, storage facilities and equipment exhaust discharged to the outside atmosphere above grade and remote from air intakes?
☑	☐	☐	☐	☐	21. Are chemical shipping containers fully labeled to include chemical name, purity, concentration, supplier name and address?
☐	☐	☑	☐	☐	22. Are acids and caustics kept in closed corrosion-resistant shipping containers or storage units?
☐	☐	☑	☐	☐	23. Are at least one pair of rubber gloves, a dust respirator of a type certified by NIOSH for toxic dusts, an apron or other protective clothing and goggles or face mask provided for each operator as required by the reviewing authority?
☐	☐	☑	☐	☐	24. Is a deluge shower and/or eyewashing device installed where strong acids and alkalis are used or stored? *(Recommended)*

Page 17 Of 24

IDEQ - Enhanced Sanitary Survey - 5/11/05 Treatment Application

DISINFECTION - Systems Using Only Gı lwater Survı ate 1/0/1900 PWS #

A separate form must be filled out for **each** disinfection unit in the PWS. 6/10/2010 (mm/dd/yyyy) ID#5240009

Treatment Facility Name:	Treatment Facility Location:	Date Online: ☐ Unk	Treated Water (GPD): ☐ Unk
4th Avenue/Washington Street	4th Avenue/Washington Street	1996	450,000

Select all disinfection types used:

☑ Gas cl2 ☐ UV Light ☐ Sodium Hypochlorite ☐ Calcium Hypochlorite ☐ Miox ☐ Other

yes	no	n/a	unk	note	DISINFECTION
☑	☐	☐	☐	☐	1. Is disinfection used on a voluntary basis to prevent bacterial contamination of the distribution system?
☑	☐	☐	☐	☑	2. Any interruptions in disinfection in the past year? If yes, comment.
☐	☑	☐	☐	☐	3. Have any changes been made to this treatment facility since the last ESS?
☐	☐	☑	☐	☐	4. If yes, were plans and specs submitted to DEQ? Date approved:____________
☑	☐	☐	☐	☐	5. Does the system have a means of measuring the residual disinfectant concentrations of free chlorine, combined chlorine (chloramines), and/or chlorine dioxide? Digital Residual Meter
☑	☐	☐	☐	☐	6. At automatically operated facilities, are chemical feeders electrically interconnected with the well or service pump?
☑	☐	☐	☐	☐	7. Is a smooth nosed sample tap provided before and after treatment?
☑	☐	☐	☐	☐	8. Is a chlorine residual being recorded when all compliance total coliform samples are being taken?

yes	no	n/a	unk	note	VOLUNTARY DISINFECTION
☑	☐	☐	☐	☐	9. Is a measurable free chlorine residual maintained throughout the distribution system? *(0.2 - 0.6)*
☐	☑	☐	☐	☑	10. Is the free chlorine residual being measured daily? *(Recommended)*
☐	☐	☑	☐	☐	11. Is an automatic proportioning chlorinator being used where the rate of flow is not reasonably constant?
☐	☐	☑	☐	☐	12. Is the analysis for free chlorine residual being made at a frequency that is sufficient to detect variations in chlorine demand or changes in water flow?

yes	no	n/a	unk	note	REQUIRED DISINFECTION
☐	☐	☑	☐	☐	13. Is the free chlorine residual being measured daily?
☐	☐	☑	☐	☐	14. Is the daily free chlorine residual being recorded and kept on file for a minimum of 1 year?
☐	☐	☑	☐	☐	15. Is a detectable chlorine residual maintained throughout the distribution system?
☐	☐	☑	☐	☐	16. Is an automatic proportioning chlorinator being used where the rate of flow is not reasonably constant?
☐	☐	☑	☐	☐	17. Where chlorination is required for protection of the supply, is there standby equipment of sufficient capacity available to replace the largest unit?
☐	☐	☑	☐	☐	18. If primary disinfection is accomplished using ozone or some other chemical that does not provide a residual disinfectant, is chlorine added to provide a residual disinfectant?

Comments:
(Please indicate the question number)

2. System was temporarily off line for replacement of booster pump system.

10. The operator measures the chlorine residual weekly

Page 18 Of 24

DISINFECTION PG. 2

T nent Facility Location:	Survı ate		PWS #
4th Avenue/Washington St	6/10/2010	(mm/dd/yyyy)	ID#5240009

GAS DISINFECTION ONLY - Fill out any time Gas Chlorination is connected to the PWS.

Comments:
(Please indicate the question number)

PROTECTIVE EQUIPMENT

yes	no	n/a	unk	note	
☑	☐	☐	☐	☐	19. Is respiratory protection equipment, meeting the requirements of NIOSH available where chlorine gas is handled, and is it stored at a convenient location, but not inside any room where chlorine is used or stored?
☑	☐	☐	☐	☐	20. Does the respiratory protection equipment consist of compressed air, that has at least a 30 minute capacity, and is compatible with or exactly the same as units used by the fire department responsible for the plant?

CHLORINE LEAK DETECTION

yes	no	n/a	unk	note	
☑	☐	☐	☐	☐	21. Is a bottle of ammonium hydroxide (56 percent ammonia solution) available for chlorine leak detection?
☐	☐	☑	☐	☑	22. Where ton containers are used, is a leak repair kit approved by the Chlorine Institute provided?
☑	☐	☐	☐	☐	23. Is continuous chlorine leak detection equipment provided? *(Recommended)*
☑	☐	☐	☐	☐	24. Where a leak detector is provided, is it equipped with both an audible alarm and a warning light?

CHLORINE ROOM

yes	no	n/a	unk	note	
☑	☐	☐	☐	☐	25. Is a separate room provided for gas chlorination equipment?
☐	☑	☐	☐	☐	26. Do pressurized chlorine feed lines carry chlorine gas beyond the chlorinator room?
☑	☐	☐	☐	☐	27. Is the chlorine room provided with a shatter resistant inspection window installed in an interior wall?
☑	☐	☐	☐	☐	28. Is the chlorine room constructed in such a manner that all openings between the chlorine room and the remainder of the plant are sealed?
☑	☐	☐	☐	☐	29. Are the chlorine room doors equipped with panic hardware, assuring ready means of exit and opening outward only to the building exterior?
☑	☐	☐	☐	☐	30. Where chlorine gas is used, does each room have a ventilating fan.
☑	☐	☐	☐	☐	31. Does the ventilating fan take suction near the floor and discharge away from any air inlets?
☐	☐	☑	☐	☐	32. Are all air inlets through louvers near the ceiling? *(Recommended)*
☑	☐	☐	☐	☐	33. Are there separate switches for the fan and lights located outside of the chlorine room and at the inspection window?
☑	☐	☐	☐	☐	34. Are outside switches protected from vandalism?
☑	☐	☐	☐	☐	35. Are chlorinator rooms heated to 60 °F, and protected from excessive heat? *(Recommended)*

CHLORINE GAS CYLINDERS

yes	no	n/a	unk	note	
☑	☐	☐	☐	☐	36. Are full and empty cylinders of chlorine gas isolated from operating areas? *(Recommended)*
☑	☐	☐	☐	☐	37. Are full and empty cylinders of chlorine gas restrained in position to prevent upset? *(Recommended)*
☑	☐	☐	☐	☐	38. Are full and empty cylinders of chlorine gas stored in rooms separate from ammonia storage? *(Recommended)*
☑	☐	☐	☐	☐	39. Are full and empty cylinders of chlorine gas stored in areas that are not in the direct sunlight or exposed to excessive heat? *(Recommended)*
☑	☐	☐	☐	☐	40. Is a reasonably precise weight scale provided for weighing cylinders, at all plants utilizing chlorine gas?
☑	☐	☐	☐	☐	41. Is there an automatic switch-over of chlorine cylinders provided, where necessary, to assure continuous disinfection?

DISINFECTION - Systems Using Only Gr water

Surve ite 1/0/1900 PWS #

A separate form must be filled out for each disinfection unit in the PWS. 6/10/2010 (mm/dd/yyyy) ID#5240009

Treatment Facility Name:	Treatment Facility Location:	Date Online: ☐ Unk	Treated Water (GPD): ☐ Unk
Senior Avenue	Senior Avenue	1980s	200,000

Select all disinfection types used:
☑ Gas cl2 ☐ UV Light ☐ Sodium Hypochlorite ☐ Calcium Hypochlorite ☐ Miox ☐ Other

Comments:
(Please indicate the question number)

yes	no	n/a	unk	note	DISINFECTION
☑	☐	☐	☐	☐	1. Is disinfection used on a voluntary basis to prevent bacterial contamination of the distribution system?
☐	☑	☐	☐	☐	2. Any interruptions in disinfection in the past year? If yes, comment.
☐	☑	☐	☐	☐	3. Have any changes been made to this treatment facility since the last ESS?
☐	☐	☑	☐	☐	4. If yes, were plans and specs submitted to DEQ? Date approved:__________
☑	☐	☐	☐	☐	5. Does the system have a means of measuring the residual disinfectant concentrations of free chlorine, combined chlorine (chloramines), and/or chlorine dioxide? Digital Residual Meter
☑	☐	☐	☐	☐	6. At automatically operated facilities, are chemical feeders electrically interconnected with the well or service pump?
☑	☐	☐	☐	☐	7. Is a smooth nosed sample tap provided before and after treatment?
☑	☐	☐	☐	☐	8. Is a chlorine residual being recorded when all compliance total coliform samples are being taken?

yes	no	n/a	unk	note	VOLUNTARY DISINFECTION
☑	☐	☐	☐	☐	9. Is a measurable free chlorine residual maintained throughout the distribution system? *(0.2 - 0.6)*
☑	☐	☐	☐	☐	10. Is the free chlorine residual being measured daily? *(Recommended)*
☐	☐	☑	☐	☐	11. Is an automatic proportioning chlorinator being used where the rate of flow is not reasonably constant?
☐	☐	☑	☐	☐	12. Is the analysis for free chlorine residual being made at a frequency that is sufficient to detect variations in chlorine demand or changes in water flow?

yes	no	n/a	unk	note	REQUIRED DISINFECTION
☐	☐	☑	☐	☐	13. Is the free chlorine residual being measured daily?
☐	☐	☑	☐	☐	14. Is the daily free chlorine residual being recorded and kept on file for a minimum of 1 year?
☐	☐	☑	☐	☐	15. Is a detectable chlorine residual maintained throughout the distribution system?
☐	☐	☑	☐	☐	16. Is an automatic proportioning chlorinator being used where the rate of flow is not reasonably constant?
☐	☐	☑	☐	☐	17. Where chlorination is required for protection of the supply, is there standby equipment of sufficient capacity available to replace the largest unit?
☐	☐	☑	☐	☐	18. If primary disinfection is accomplished using ozone or some other chemical that does not provide a residual disinfectant, is chlorine added to provide a residual disinfectant?

Page 20 Of 24

IDEQ - Enhanced Sanitary Survey - 5/11/05 Disinfection

DISINFECTION PG. 2	Treatment Facility Location: Senior Avenue	Survey Date: 6/10/2010 (mm/dd/yyyy)	PWS #: ID#5240009

GAS DISINFECTION ONLY - Fill out any time Gas Chlorination is connected to the PWS.

Comments:
(Please indicate the question number)

PROTECTIVE EQUIPMENT

yes	no	n/a	unk	note	
☑	☐	☐	☐	☐	19. Is respiratory protection equipment, meeting the requirements of NIOSH available where chlorine gas is handled, and is it stored at a convenient location, but not inside any room where chlorine is used or stored?
☑	☐	☐	☐	☐	20. Does the respiratory protection equipment consist of compressed air, that has at least a 30 minute capacity, and is compatible with or exactly the same as units used by the fire department responsible for the plant?

CHLORINE LEAK DETECTION

yes	no	n/a	unk	note	
☑	☐	☐	☐	☐	21. Is a bottle of ammonium hydroxide (56 percent ammonia solution) available for chlorine leak detection?
☐	☐	☑	☐	☑	22. Where ton containers are used, is a leak repair kit approved by the Chlorine Institute provided?
☑	☐	☐	☐	☐	23. Is continuous chlorine leak detection equipment provided? *(Recommended)*
☑	☐	☐	☐	☐	24. Where a leak detector is provided, is it equipped with both an audible alarm and a warning light?

CHLORINE ROOM

yes	no	n/a	unk	note	
☑	☐	☐	☐	☐	25. Is a separate room provided for gas chlorination equipment?
☐	☑	☐	☐	☐	26. Do pressurized chlorine feed lines carry chlorine gas beyond the chlorinator room?
☑	☐	☐	☐	☐	27. Is the chlorine room provided with a shatter resistant inspection window installed in an interior wall?
☑	☐	☐	☐	☐	28. Is the chlorine room constructed in such a manner that all openings between the chlorine room and the remainder of the plant are sealed?
☑	☐	☐	☐	☐	29. Are the chlorine room doors equipped with panic hardware, assuring ready means of exit and opening outward only to the building exterior?
☑	☐	☐	☐	☐	30. Where chlorine gas is used, does each room have a ventilating fan.
☑	☐	☐	☐	☐	31. Does the ventilating fan take suction near the floor and discharge away from any air inlets?
☑	☐	☐	☐	☐	32. Are all air inlets through louvers near the ceiling? *(Recommended)*
☑	☐	☐	☐	☐	33. Are there separate switches for the fan and lights located outside of the chlorine room and at the inspection window?
☑	☐	☐	☐	☐	34. Are outside switches protected from vandalism?
☑	☐	☐	☐	☐	35. Are chlorinator rooms heated to 60 °F, and protected from excessive heat? *(Recommended)*

CHLORINE GAS CYLINDERS

yes	no	n/a	unk	note	
☑	☐	☐	☐	☐	36. Are full and empty cylinders of chlorine gas isolated from operating areas? *(Recommended)*
☑	☐	☐	☐	☐	37. Are full and empty cylinders of chlorine gas restrained in position to prevent upset? *(Recommended)*
☑	☐	☐	☐	☐	38. Are full and empty cylinders of chlorine gas stored in rooms separate from ammonia storage? *(Recommended)*
☑	☐	☐	☐	☐	39. Are full and empty cylinders of chlorine gas stored in areas that are not in the direct sunlight or exposed to excessive heat? *(Recommended)*
☑	☐	☐	☐	☐	40. Is a reasonably precise weight scale provided for weighing cylinders, at all plants utilizing chlorine gas?
☑	☐	☐	☐	☐	41. Is there an automatic switch-over of chlorine cylinders provided, where necessary, to assure continuous disinfection?

Page 21 Of 24

IDEQ - Enhanced Sanitary Survey - 5/11/05

Disinfection

Appendix M Irrigation Committee Recommendation Letter

Irrigation Committee Recommendation
December 15, 2009

The Irrigation Committee was formed by the Mayor and charged to review the irrigation study and recommendations by the city engineers and make a recommendation to the City Council on which option would be best for Gooding.

In order to accomplish this we met with the following individuals:

David Adair, who provided us with a historical perspective and concerns he had with the irrigation system.
Todd Bunn, who addressed the status of the irrigation system, how it was being maintained and the limits of the current maintenance system. He also outlined the current funding of the system. The funding has not kept pace with the need to repair and or maintain the system. The status of the irrigation system has been a concern since 1960. Mr. Bunn also explained the desirability of one system for both potable and non potable water since they were both linked to the need for water drawn from wells. We also learned about surface and ground water rights.
Roy Mink, who talked about the Eastern Snake Plain Aquifer (ESPA) Comprehensive Aquifer Management Plan (CAMP). He was concerned that we would devalue the City's Surface Water rights and put additional stress on the aquifer by drilling additional wells. We discussed the purchase of ground water rights and he agreed that that was possible since there would be no additional stress on the aquifer. Mr. Mink also thought we should become involved with both the CAMP Committee and the recharge studies underway.
Jim Mullen, the City engineer. Mr. Mullen met with the committee on two occasions and was very helpful in detailing out the options and looking at potential funding sources.

The Irrigation system is part of the City's history and a part of its culture. It has been decaying for 50 years and nothing has been done because of the financial impact. Now there are only a few users who understand their responsibilities in managing the irrigation system and fewer people staying home to manage it if they knew how. And now, the system is in such decay that action must be taken. The committee realizes that the potential fiscal impact on the people of Gooding, especially those on fixed income, will be significant. Therefore, every possible state or federal grant or loan option should be explored

After careful consideration, the committee is recommending option 3a. This option augments the current potable system, upgrades the under sized water lines, allows the City to ultimately abandon the existing flood irrigation system, and the cost of water will be charged on a usage basis. This is the most cost effective approach. The committee also recommends that the City of Gooding continue to assess the availability for any significant federal funding that might become available that would allow the City to implement option 3c, augmenting the potable water system by constructing a Surface Water Treatment Plant. The Committee recognizes the value of the existing surface water rights and recommends that those rights be protected and not traded or encumbered.

The Committee also recommends the following.

The City must have numerous public information meetings and hearings. It is imperative that the citizens of Gooding fully understand the need for this new system and the financial impact it will have on them individually.
The City must find ways to provide information to the community in a simple manner so that people can both determine the financial impact of the new system on them personally and determine ways to lower their water consumption. Price per gallon or a calculator of some kind people could use might be helpful.
The City stress that water is a precious resource and must be used wisely and conservatively.
The City should implement opportunities for the citizens of Gooding to learn about water conservation and water conscious landscaping.

That concludes our committee's recommendations.

The Following individuals participated on the committee: Kent Dunn, Phil Williams, Devin Rigby, Stephen Medaris, and Ken Allison.

Appendix N Detailed Costs Estimates

Gooding, ID
Priority 1 Improvements

Item	Unit	Unit Price	Estimated Quantity	Cost
Priority 1: New Wells No. 5 and No. 6 with Transmission Imrpovements				**Priority 1**
1.1 Construct New Well No. 5 Near Hospital Site				
Site development	LS	$60,000	1	$60,000
Drilling of Well hole with casing	LS	$350,000	1	$350,000
Well mechanical and electrical	LS	$80,000	1	$80,000
Construction of Well House	LS	$130,000	1	$130,000
1,500 gpm Well Pump	EA	$90,000	1	$90,000
Chlorination facilities: Onsite Generation	LS	$40,000	1	$40,000
Standby Power	LS	$90,000	1	$90,000
Construction and Materials Cost Subtotal				*$840,000*
Mobilization as percentage of Construction and Materials	%	6%		$50,400
Total Construction Costs				*$890,400*
Contingency as percent of total construction costs	%	2.6%		$22,811
SCADA Setup for Site	LS	$20,000	1	$20,000
Land Acquistion	AC	$35,000	1	$35,000
Total Construction Costs, Contingency, SCADA, and Land Acquisition Subtotal				*$968,211*
Engineering and CMS as percentage of total construction costs	%	16%		$154,914
3.34 cfs Water Rights	EA	$200,000	3.34	$668,000
Legal and Permitting	LS	$10,000	1	$10,000
Priority 1.1: New Well No. 5 Total Cost				***$1,801,124***
1.2 Construct New Well No. 6 in North East Corner of System				
Site development	LS	$60,000	1	$60,000
Drilling of Well hole with casing	LS	$350,000	1	$350,000
Well mechanical and electrical	LS	$80,000	1	$80,000
Construction of Well House	LS	$130,000	1	$130,000
1,500 gpm Well Pump	EA	$90,000	1	$90,000
Chlorination facilities: Onsite Generation	LS	$40,000	1	$40,000
Standby Power	LS	$90,000	1	$90,000
Construction and Materials Cost Subtotal				*$840,000*
Mobilization as percentage of Construction and Materials	%	6%		$50,400
Total Construction Costs				*$890,400*
Contingency as percent of total construction costs	%	2.6%		$22,811
SCADA Setup for Site	LS	$20,000	1	$20,000
Land Acquistion	AC	$35,000	1	$35,000
Total Construction Costs, Contingency, SCADA, and Land Acquisition Subtotal				*$968,211*
Engineering and CMS as percentage of total construction costs	%	16%		$154,914
3.34 cfs Water Rights	EA	$200,000	3.34	$668,000
Legal and Permitting	LS	$10,000	1	$10,000
Priority 1.2: New Well No. 6 Total Cost				***$1,801,124***

Gooding, ID
Priority 1 Improvements

Item	Unit	Unit Price	Estimated Quantity	Cost
1.3 Transmission Imrprovements				
12-inch lines (Refer to figure for allignment and connectivity)	LF	$70	4,200	$294,000
10-inch lines (Refer to figure for allignment and connectivity)	LF	$60	1,800	$108,000
8-inch lines (Refer to figure for allignment and connectivity)	LF	$50	1,000	$50,000
Additional cost for sections requiring rock cutting	LF	$50	2,000	$100,000
Canal Crossing - bore	EA	$10,000	2	$20,000
Note: Unit costs include fitting, hydrants, excavation, backfill, pavement repair, and traffic control.				
Construction and Materials Cost Subtotal				*$572,000*
Mobilization as percentage of Construction and Materials	%	6%		$34,300
Total Construction Costs				*$606,300*
Contingency as percent of total construction costs	%	2.6%		$15,532
Easment Acquistion	LF	$7	2,700	$18,900
Total Construction Costs, Contingency, and Easement Acquisition Subtotal				*$640,732*
Engineering and CMS as percentage of total construction costs	%	16%		$102,517
Legal and Permitting	LS	$50,000	1	$50,000
Priority 1.3: Transmission Improvements				***$793,250***
1.4 SCADA Base Setup				
Set-up station at shop and program wells and tanks	LS	$30,000	1	$30,000
Engineering and CMS as percentage of total construction costs	%	16%		$4,800
Priority 1.4: SCADA Base Setup				***$34,800***
Priority 1 Total: Well No. 5, Well No. 6, and Transmission				***$4,430,298***

The cost estimate herein is based on our perception of current conditions at the project location. This estimate reflects our opinion of probable costs at this time and is subject to change as the project design matures. Keller Associates has no control over variances in the cost of labor, materials, equipment, services provided by others, contractor's methods of determining prices, competitive bidding or market conditions, practices or bidding strategies. Keller Associates cannot and does not warrant or guarantee that proposals, bids, or actual construction costs will not vary from the cost presented herein. Cost sums are rounded up to the nearest ten thousand.

Gooding, ID
Priority 2 Improvements

Item	Unit	Unit Price	Estimated Quantity	Cost
Priority 2: New Well No. 7 with Transmission				
Site development	LS	$60,000	1	$60,000
Drilling of Well hole with casing	LS	$350,000	1	$350,000
Well mechanical and electrical	LS	$80,000	1	$80,000
Construction of Well House	LS	$130,000	1	$130,000
1,500 gpm Well Pump	EA	$90,000	1	$90,000
Chlorination facilities: Onsite Generation	LS	$40,000	1	$40,000
Standby Power	LS	$90,000	1	$90,000
Well Construction Subtotal				*$840,000*
12-inch Transmission (Refer to figure for allignment and connectivity)	LF	$70	3,200	$224,000
Mobilization as percentage of Well Construction and Materials				*$50,400*
Mobilization as percentage of Transmission	%	6%		$13,440
Total Construction Costs				*$1,127,840*
Contingency as percent of total construction costs	%	2.6%		$28,893
SCADA Setup at site	LS	$20,000	1	$20,000
Land Acquistion	AC	$35,000	1	$35,000
Total Construction Costs, Contingency, SCADA and Land Acquisition Subtotal				*$1,211,733*
Engineering and CMS as percentage of total construction costs	%	16%		$193,877
3.34 cfs Water Rights	EA	$200,000	3.34	$668,000
Legal and Permitting	LS	$10,000	1	$10,000
Priority 2.1: New Well No. 7 Total Cost				***$2,083,611***
Priority 2 Total: New Well No. 7				***$2,083,611***

The cost estimate herein is based on our perception of current conditions at the project location. This estimate reflects our opinion of probable costs at this time and is subject to change as the project design matures. Keller Associates has no control over variances in the cost of labor, materials, equipment, services provided by others, contractor's methods of determining prices, competitive bidding or market conditions, practices or bidding strategies. Keller Associates cannot and does not warrant or guarantee that proposals, bids, or actual construction costs will not vary from the cost presented herein. Cost sums are rounded up to the nearest ten thousand.

Gooding, ID
Priority 2.5 Improvements

Item	Unit	Unit Price	Estimated Quantity	Cost
Priority 2.5: Improve Fire Flow and Transmission				
12-inch lines (Refer to figure for allignment and connectivity)	LF	$70	12,000	$840,000
10-inch lines (Refer to figure for allignment and connectivity)	LF	$60	2,500	$150,000
8-inch lines (Refer to figure for allignment and connectivity)	LF	$50	10,000	$500,000
Additional cost for sections requiring rock cutting	LF	$50	5,800	$290,000
HWY Crossing - bore	LF	$200	200	$40,000
RR Crossing - bore	LF	$200	210	$42,000
Canal Crossing - bore	EA	$10,000	3	$30,000
Transmission Subtotal				*$1,892,000*
Mobilization	%	6%		$113,520
Transmission Total				*$2,005,520*
Miscellaneous Valves and Fittings	LS	$187,000	1	$187,000
Total Construction Costs				*$2,192,520*
Easement Acquistion	LF	$7	2,600	$18,200
Contingency	%	2.6%		$56,169
Total Construction Costs and Easement Acquisition Subtotal				*$2,266,889*
Engineering and CMS	%	16%		$362,702
Priority 2.5: Fire Flow Improvements and Future Transmission				***$2,629,591***
Priority 2.5 Total: Improve Fire Flow, and Transmission				***$2,629,591***

Note: Unit costs include fitting, hydrants, excavation, backfill, pavement repair, and traffic control.

The cost estimate herein is based on our perception of current conditions at the project location. This estimate reflects our opinion of probable costs at this time and is subject to change as the project design matures. Keller Associates has no control over variances in the cost of labor, materials, equipment, services provided by others, contractor's methods of determining prices, competitive bidding or market conditions, practices or bidding strategies. Keller Associates cannot and does not warrant or guarantee that proposals, bids, or actual construction costs will not vary from the cost presented herein. Cost sums are rounded up to the nearest ten thousand.

Appendix O Open House and Public Education Material

NOTICE of Town Hall Meeting

Walker Center
605 11th Ave E
Gooding, ID 83330
August 22, 2012
7:00 P.M.

The City is applying for a low interest loan from the Department of Environmental Quality to address the numerous problems with the City water system infrastructure. Improving and maintaining our infrastructure is an ordinary and necessary expense that impacts the health and safety of every citizen. This is an important project for the City and the Council is looking forward to working with you to make it a reality.

Any person requiring special accommodations should call City Hall at least three days prior to the meeting. 208 934-5669

CITY OF GOODING
NOTICE OF HEARING TO CONSIDER A RESOLUTION AUTHORIZING THE FILING OF A PETITION FOR JUDICIAL CONFIRMATION UNDER THE IDAHO JUDICIAL CONFIRMATION LAW

NOTICE IS HEREBY GIVEN that on Wednesday, the 26th day of September, 2012, at 7:00 o'clock P.M., or as soon thereafter as the matter may be heard, at the Gooding Municipal Building, 308 5th Avenue West, Gooding, Idaho, the City Council of the City of Gooding, Idaho (the "City"), will conduct a public hearing to consider the adoption of a resolution authorizing the filing of a petition for judicial confirmation under the Idaho Judicial Confirmation Law, Title 7, Chapter 13, Idaho Code.

The proposed petition would seek judicial confirmation of the power of the City (1) to incur an indebtedness as an "ordinary and necessary expense" of the City authorized by the general laws of the State, within the meaning of Article 8, Section 3, of the Idaho Constitution, in a principal amount not to exceed $9,454,000, for the purchase of improvements to the water system; (2) to issue revenue bonds or other evidence of indebtedness of the City for the same, for the purpose of financing the cost of necessary improvements to the public water system of the City; and (3) to pledge the City's water system revenues for the payment of such indebtedness for a term of not more than thirty (30) years.

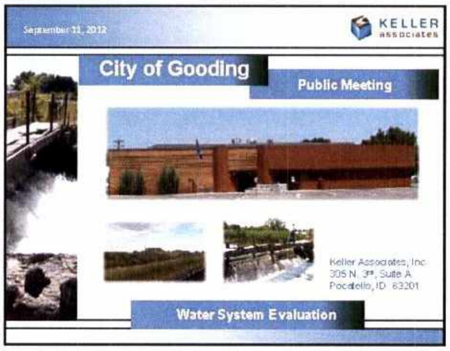
Information relating to the proposed petition is available at the office of the City Clerk, 308 5th Avenue West, Gooding, Idaho, during normal business hours of the City. Interested persons are encouraged to attend the public hearing and to present comments. Comments may also be submitted in writing to the Mayor and Council, City of Gooding, 308 5th Avenue West, Gooding, Idaho 83330.

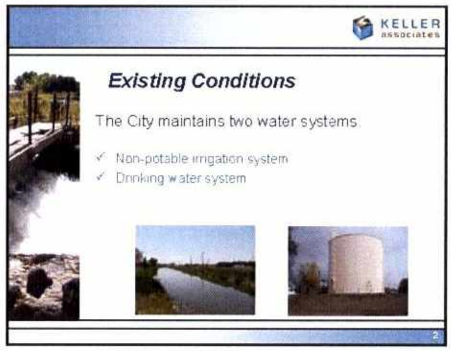
DATED the 4th day of September, 2012.

CITY OF GOODING
Gooding County, Idaho

By: City Clerk

Page 1

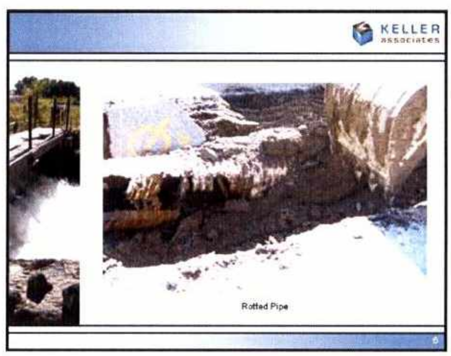

September 11, 2012
KELLER associates
City of Gooding
Public Meeting
Keller Associates, Inc
305 N. 3rd, Suite A
Pocatello, ID 83201
Water System Evaluation

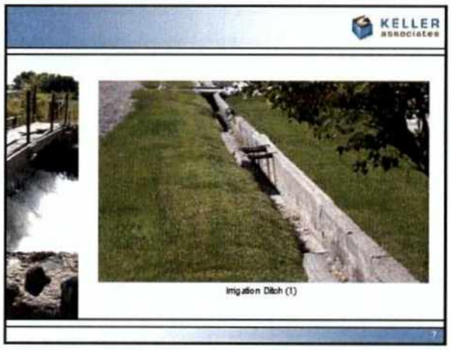

KELLER associates
Existing Conditions
The City maintains two water systems.
✓ Non-potable irrigation system
✓ Drinking water system
2

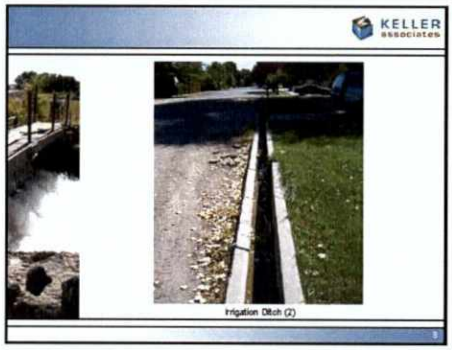

KELLER associates
Non-potable Irrigation System
Water Rights:
✓ 9 cubic feet per second (cfs)
✓ 4,039 gallons per minute (gpm)
✓ 5,820,000 gallons per day (gpd)
3

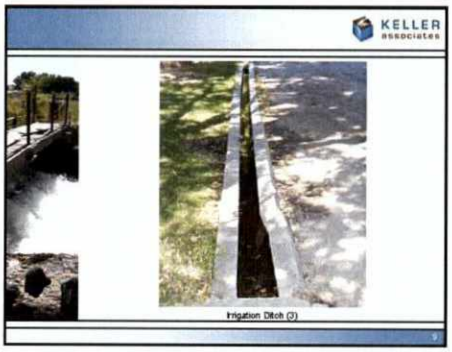

KELLER associates
Non-potable Irrigation System
Piping Network:
✓ 21 miles of piping and ditches
4

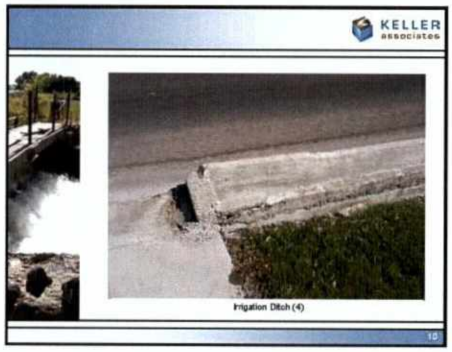

KELLER associates
Non-potable Irrigation System
Current Charges:
✓ $39.91 per lot per year
Maintenance
✓ 12-17 hours per day, 6 days per week
✓ 11 people 5 months/year
5


KELLER associates
Rotted Pipe
6

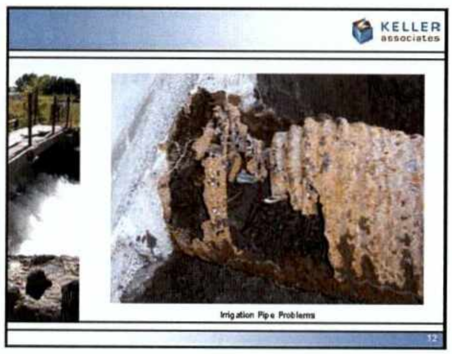

Irrigation Ditch (1)


Irrigation Ditch (2)

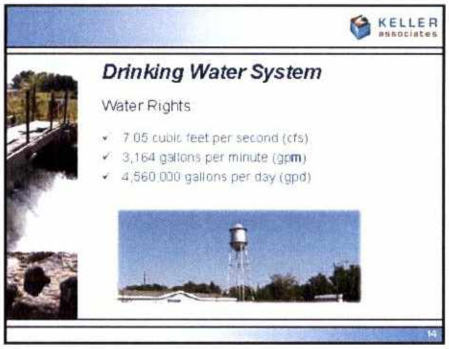

Irrigation Ditch (3)

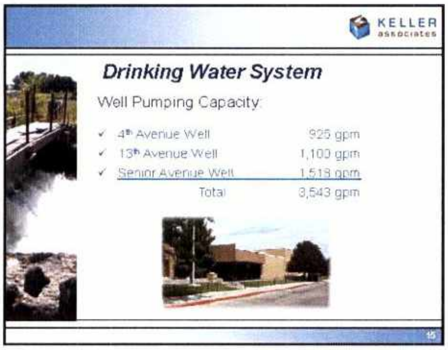

Irrigation Ditch (4)

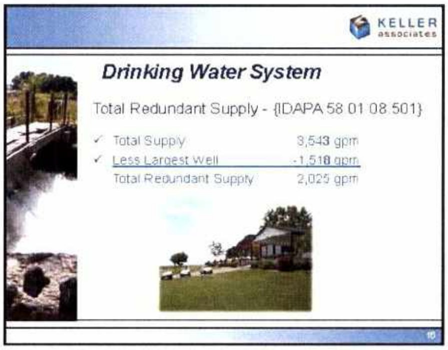

Irrigation Ditch (5)

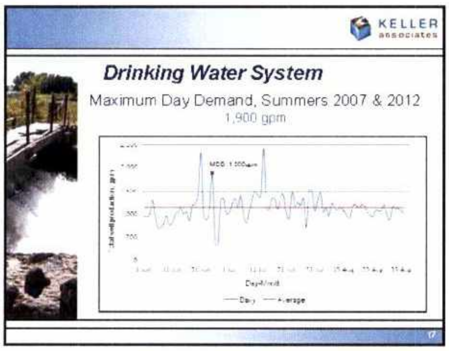

Irrigation Pipe Problems

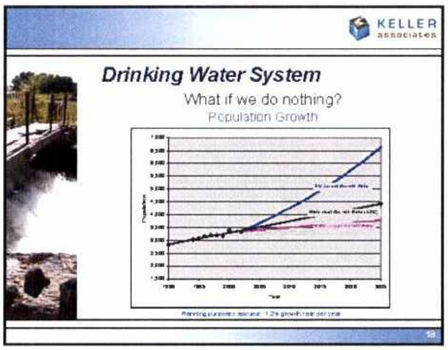

KELLER associates
Irrigation System Summary:
Continued breakdown and collapse of system
Increasing operational and management effort
City has determined continued system use in current state is not practical
13


KELLER associates
Drinking Water System
Water Rights
7.05 cubic feet per second (cfs)
3,164 gallons per minute (gpm)
4,560,000 gallons per day (gpd)
14


KELLER associates
Drinking Water System
Well Pumping Capacity:
4th Avenue Well 925 gpm
13th Avenue Well 1,100 gpm
Senior Avenue Well 1,518 gpm
Total 3,543 gpm
15


KELLER associates
Drinking Water System
Total Redundant Supply - {IDAPA 58.01.08.501}
Total Supply 3,543 gpm
Less Largest Well -1,518 gpm
Total Redundant Supply 2,025 gpm
16


KELLER associates
Drinking Water System
Maximum Day Demand, Summers 2007 & 2012
1,900 gpm
Day/Month
Daily
Average
17


KELLER associates
Drinking Water System
What if we do nothing?
Population Growth
Year
18

Current Potable Water System

Year	Population	Max Day Demand (gpm)	Redundant Well Supply (gpm)	Surplus/Deficiency (gpm)
2010	3,567	1,900	2,025	125
2012	3,653	2,001	2,025	24
2017	3,878	2,264	2,025	-239
2032	4,637	3,154	2,025	-1,129
2042	5,225	3,842	2,025	-1,817
2052	5,887	4,617	2,025	-2,592

✓ By 2017, demand is greater than Redundant Supply *while using gravity irrigation system*

19

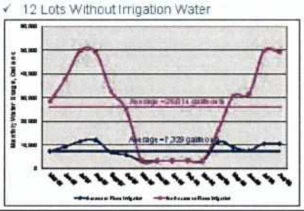
Redundant Supply Deficiency

Year	Population	Max Day Demand (gpm)	Redundant Well Supply (gpm)	Deficiency (gpm)
2010	3,567	4,178	2,025	-2,153
2012	3,653	4,279	2,025	-2,254
2017	3,878	4,542	2,025	-2,517
2032	4,637	5,431	2,025	-3,406
2042	5,225	6,120	2,025	-4,095
2052	5,887	6,895	2,025	-4,870

✓ Current deficiency *if the irrigation system is abandoned*

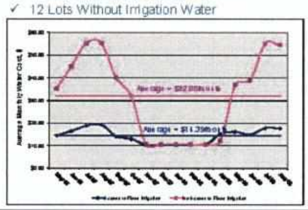
20

Typical Potable Water Demand Patterns:
- ✓ 12 Lots Using Irrigation Water
- ✓ 12 Lots Without Irrigation Water



21

Typical Potable Water Costs:
- ✓ 12 Lots Using Irrigation Water
- ✓ 12 Lots Without Irrigation Water



22

Considered Alternatives:

Alternative	Description
• 1	Maintain existing gravity irrigation system
• 2	Install pressurized irrigation system
• 3	Abandon irrigation system and use existing potable water system
✓ **3a**	**Augment potable water system by drilling new wells**
✓ 3b	Augment potable water system by constructing potable water treatment plant to treat surface water rights
✓ 3c	Augment potable water system by constructing potable water treatment plant to treat surface water and by drilling an additional well

23

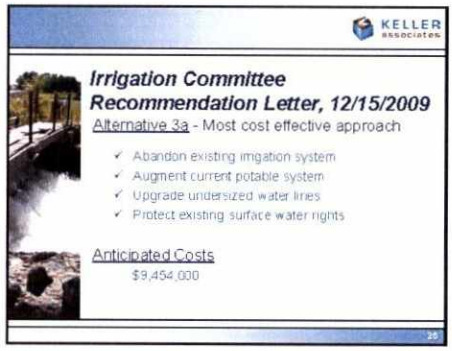
Summary of Alternatives

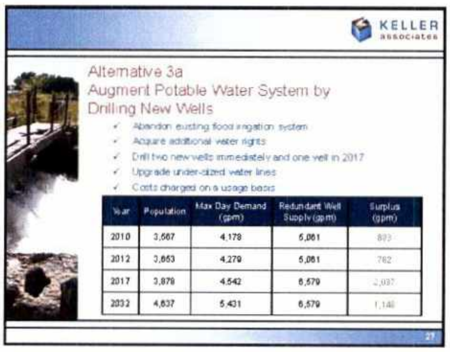
Alternative	Description	Estimated Cost*
Utilize Surface Water for Irrigation		
1	Replace existing gravity irrigation system	$14,125,000
2	Install pressurized irrigation system	$12,052,000
Augment Potable Water System		
3a	Drill additional wells & upgrade distribution system	$9,454,000**
3b	Construct surface water treatment plant & upgrade distribution system	$19,053,000
3c	Construct surface water treatment plant & a new well & upgrade distribution system	$14,736,000

*Cost estimates are considered to be order of magnitude for alternative comparison purposes. More refined cost estimates will be prepared during the pre-design process.

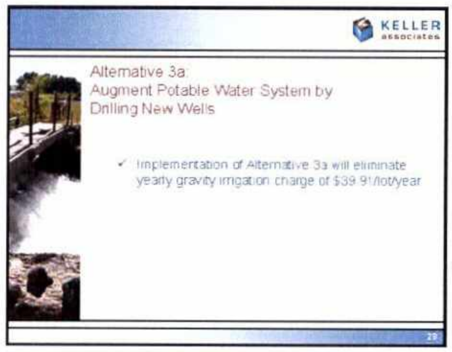
**Total Alternative 3a cost is $12,169,000 to complete all anticipated improvements. City decided to tackle $9,454,000 of the $12,169,000.

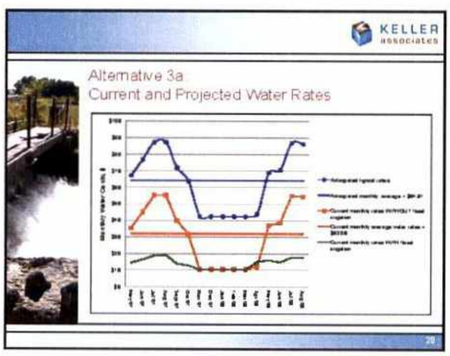
24

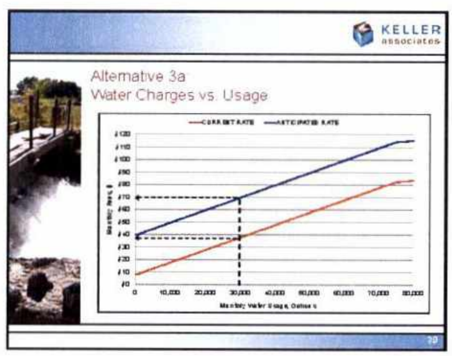




Year	Population	Max Day Demand (gpm)	Redundant Well Supply (gpm)	Surplus (gpm)
2010	3,567	4,178	5,061	883
2012	3,653	4,279	5,061	782
2017	3,879	4,542	6,579	2,037
2032	4,637	5,431	6,579	1,148







KELLER associates

Alternative 3a
Addresses Health and Safety Issues

- ✓ **No backup supply:**
  - DEQ requirement for a redundant water supply in the event a well goes out of service
- ✓ **Low fire flows in town:**
  - Need to increase fire flow for fire hydrants and building fire sprinkler systems maintained by some of our larger users such as our schools, Walker Center, and hospital
- ✓ **Low pressure:**
  - Need ability to maintain pressure during peak demands to prevent possible back flow contamination
- ✓ **Supply deficiency:**
  - Within 24 gpm of our redundant water needs now and in 5 years we could be -239 gpm

31

KELLER associates

Recommendations

- ✓ Implement Alternative 3a
- ✓ City should pursue financial assistance to help finance project
  - Received Idaho Department of Environmental Quality loan ($7M, 1%, 20 years)
  - Idaho Department of Commerce (up to $350,000 in grants)
  - Others
- ✓ City should acquire additional groundwater rights
- ✓ City will pursue judicial confirmation to enable indebtedness

32

KELLER associates

Next Steps

- ✓ Public hearing for comment: **September 26, 2012**

"The City Council of the City of Gooding, Idaho will conduct a public hearing to consider the adoption of a resolution authorizing the filing of a petition for judicial confirmation under the Idaho Judicial Confirmation Law"

33

KELLER associates

Thank You

Mayor William Morton
Michael Arkoosh
Vern France
Diane Houser
Mel Magnelli
308 5th Avenue West
City of Gooding, ID 83330
(208) 934-5669

Jim Mullen, P.E.
Oksana Roth, E.I.
Keller Associates, Inc.
305 N. 3rd Avenue, Suite A
Pocatello, ID 83201
(208) 238-2146

DEQ Twin Falls Regional Office
1363 Fillmore St.
Twin Falls, ID 83301
(208) 736-2190

34

City of Gooding

WATER FACILITIES PLANNING STUDY – PUBLIC MEETING
AUGUST 22, 2012 – 7:00 PM

Name: (Please Print)	Address:	Phone:
1. [illegible]	[illegible]	[illegible]
2. [illegible]	[illegible]	[illegible]
3. [illegible]	[illegible]	[illegible]
4. [illegible]	245 [illegible]	934-4335
5. [illegible]	[illegible] St Gooding	[illegible]
6. [illegible]	[illegible]	[illegible]
7. [illegible]	[illegible]	[illegible]
8. [illegible]	[illegible]	[illegible]
9. Donald K. [illegible]	[illegible] California Gooding	934-4557
10. [illegible]	[illegible]	[illegible]
11. Cheryl Stevens	533 Oregon Gooding	316 4050
12. John Jr. [illegible]	1103 ~~Idaho~~ st. "	934-5210
13. [illegible] King	1230 Wyoming Street Gooding	431 5094
14. Marie [illegible]	[illegible] St Gooding	316 2813
15. [illegible]	[illegible]	[illegible]
16. Walt Nelson	401 14th Ave W Gooding	934-5345
17. [illegible]	1041 Wyoming [illegible]	934-5247
18. Kathy Lehr	1214 Nevada St Gooding	934-5832

KELLER associates

City of Gooding

WATER FACILITIES PLANNING STUDY – PUBLIC MEETING

AUGUST 22, 2012 – 7:00 PM

Name/ Representing: (Please Print)	Address:	Phone:
19. [illegible]	5?? California St.	934-5984
20. Jack Amen	238 Main	934-5626
21. Brenna Andrew	666 Montana	934-8564
22. [illegible]	317 Cal. St.	934-5152
23. Claire Bryan	429 Montana St	934-8351
24. [illegible] Arnold	207 Oregon St.	934-4773
25. [illegible]	734 4th Ave West	358-3296
26. Tonje Herman	PO Box 537	731-5131
27. Teresa Thiemann	PO Box 303 Gooding	358-0781
28. Tally Hooper	2225 S, 1200E Bliss	837-4950
29.		
30.		
31.		
32.		
33.		
34.		
35.		
36.		

KELLER associates

City of Gooding

WATER FACILITIES PLANNING STUDY – PUBLIC MEETING
AUGUST 22, 2012 – 7:00 PM

37. [illegible]		
38. [illegible]	[illegible]	[illegible]-5727
39. Jack Hansen	1016 ID ST Gooding	734 3257
40. Carolyn Boyd	421 Michigan Gooding	[illegible]
41. [illegible]	[illegible] Gooding	[illegible]
42. [illegible]	[illegible] Gooding	[illegible]
43. [illegible]	[illegible] DL	358-2217
44. KEN Anderson	237 orchard Gooding	208 944 2413
45. [illegible]	119 Nevada	[illegible]-[illegible]687
46. [illegible]	525 [illegible]	316 5459
47. [illegible]	918 Utah St	308 3615
48. [illegible]	1521 7th E	934-4607
49. [illegible]	208 Orchard	934-4714
50. [illegible] Crews	614 Wyoming	934-5942
51. JOHN CREWS	614 WYOMING	208 490 4852
52. [illegible]	[illegible]	208-934-[illegible]
53. [illegible]	1404 Idaho St.	208-934-5507
54. Stan Cole	541 California St.	934 5984
55. [illegible]	[illegible]	934-460[illegible]

KELLER associates

City of Gooding

WATER FACILITIES PLANNING STUDY – PUBLIC MEETING
SEPTEMBER 11, 2012 – 7:00 PM

Name: (Please Print)	Address:	Phone:
1. [illegible]	[illegible]	[illegible]
2. Raymond S[illegible]	[illegible]	[illegible]
3. [illegible]	3[illegible] Main St Gooding	[illegible]
4. [illegible]	[illegible]	[illegible]
5. [illegible]	[illegible] Gooding	[illegible]
6. [illegible]	556 E [illegible] Gooding	934-33[illegible]
7. Alice Kathryn Wright	339 Arizona St Gooding	421-5832
8. [illegible]	P O Box [illegible] 83303	[illegible]-5707
9. [illegible]	[illegible]	[illegible]-5942
10. [illegible]	[illegible] Wyoming Gooding [illegible]	934-5559
11. [illegible]	[illegible] Montana St	
12. CLARE [illegible]	426 MONTANA ST	934-8351
13. [illegible]	[illegible]	
14.		
15.		
16.		
17.		
18.		

KELLER associates

City of Gooding

Water Facilities Planning Study – Public Meeting

September 11, 2012 – 7:00 pm

37. Ron Larson		
38. [illegible]	[illegible]	[illegible]
39. [illegible]	[illegible]	[illegible]
40. Jeanne Braun	[illegible]	[illegible]
41. Paul Braun	" " "	" "
42. [illegible]	[illegible]	[illegible]
43. [illegible]		
44. [illegible]	[illegible]	[illegible]
45. [illegible]	[illegible]	[illegible]
46. [illegible]	[illegible]	[illegible]
47. [illegible]	[illegible] Gooding	[illegible]
48. [illegible]	[illegible] Gooding	[illegible]
49. [illegible]	[illegible]	[illegible]
50. [illegible]	[illegible]	[illegible]
51. [illegible]	[illegible]	[illegible]
52. [illegible]	[illegible]	
53. [illegible]		
54. [illegible]	[illegible]	
55. [illegible]	Gooding	

KELLER associates

City of Gooding

WATER FACILITIES PLANNING STUDY – PUBLIC MEETING

SEPTEMBER 11, 2012 – 7:00 PM

56. Duke Morton II	918 Utah	
57. Donna Morton	904 Utah	
58. [illegible]	5?3 Colorado St	
59. JOHN CREWS	P.O. Box 113 (6?1 Wyoming St) GOODING	
60. [illegible]	[illegible] Gooding	
61. [illegible]	[illegible] Ave, [illegible]	
62. [illegible] White	301 [illegible] Street [illegible]	
63. [illegible] Burr	1430 Idaho St. Gooding	
64. [illegible]	330 Utah Gooding	
65.		
66.		
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KELLER associates

PLEASE TELL US HOW YOU FEEL . . .

The purpose of this public meeting is to provide the residents of the City of Gooding with detailed information regarding the water system. We hope that you have had the opportunity to learn more about the existing water condition and seek answers to your questions or concerns. We would like to hear your comments and questions. Please write them in below and either give to a member of the City Council or send your comments or questions to the following:

Keller Associates, Inc.
305 N. 3rd Avenue, Suite A
Pocatello, ID 83201
Phone: (208) 238-2146
Fax: (208) 238-2162

Name: Marie Baucum Phone: 316-2813
Address: 1110 Washington St.
Email Address: mmsova@aol.com

After attending the public meeting last week and reading through the handout, I feel you have made the best decision. And, I appreciate that you, City Council, are acting now & not putting the problem off any longer.

I suggest that you partner with the Extension Office (U of I) and offer some classes to educate the public on a couple of topics: Xeriscaping and How To Water Lawns, Gardens & Trees (how much, best time, etc.). Learning how to water efficiently might lessen some citizens concerns about the change.

KELLER associates

PLEASE TELL US HOW YOU FEEL . . .

The purpose of this public meeting is to provide the residents of the City of Gooding with detailed information regarding the water system. We hope that you have had the opportunity to learn more about the existing water condition and seek answers to your questions or concerns. We would like to hear your comments and questions. Please write them in below and either give to a member of the City Council or send your comments or questions to the following:

Keller Associates, Inc.
305 N. 3rd Avenue, Suite A
Pocatello, ID 83201
Phone: (208) 238-2146
Fax: (208) 238-2162

Name: Alice Kathryn Wright Phone: 208-421-5832
Address: 339 Arizona ST Gooding
Email Address:

I am a new widow and
I moved here from Idaho Falls (Ucon)
farm & live in a town now. I have
never figured out how to use the Irrigation
canal. But I'm still paying for it. (ITS a mess.)
It sounds like Gooding has a
problem that needs to be addressed
& solved... LOTS of Broken irrigation systems.
I think your solution sounds like
the best cure.
I'm getting ready to put in a lawn,
it would be nice to have the new
plan sooner than 2015

KELLER associates

TIMES-NEWS
(magicvalley.com)

Gooding to Send Water Debt Request to Judge

3 HOURS AGO • BY JULIE WOOTTON JWOOTTON@MAGICVALLEY.COM

GOODING • Despite opposition from residents, the city of Gooding will file a petition to finance water system improvements without a public vote.

Gooding City Council members voted unanimously Monday night to seek a 5th District Court judge's permission to take on long-term debt for the project.

The estimated project cost is about $9.45 million, though that doesn't include potential grant funding.

Mayor Duke Morton told the Times-News that there isn't a timetable yet for the judicial process.

After city officials submit information to the attorneys handling the petition, "they'll give us a timetable back," he said.

During a quiet meeting Monday, there wasn't any discussion before the council voted.

The decision comes after dozens of residents attended three town hall meetings and a public hearing on the topic.

Fewer than 10 people attended the meeting Monday.

Gooding resident Jo Ann Doerr told the council there's a petition circulating.

Residents signing it don't want work done on the water system without a public vote, she said.

Doerr asked to be kept updated on the judicial confirmation process.

City officials are pursuing water system improvements because pipe is rotting in the water delivery system, Morton told the Times-News last month.

Also, he said sediment has risen so high that water has trouble moving and has flooded some residential basements.

Water users would have to repay the loan for the project with a 1 percent interest rate. Morton said last month that water rates could double.

Improvements to the water system are needed for the health, safety and welfare of citizens, according to the resolution approved by the City Council.

The city also has to comply with state water system requirements.

What Is Judicial Confirmation?

Idaho's constitution limits how local government entities such as cities can take on long-term debt — essentially, a protection for the taxpayers who have to pay that debt.

One option is to have the public vote on the debt in one of Idaho's four regular yearly elections. Another alternative is asking a judge to review the debt and deem it an ordinary and necessary expense of the city. In the latter case, the judge renders his decision in an open court setting much like any other court proceeding would be conducted.

Andre Leonard 2 hours ago Report Abuse

This is a tough one, but I support the city of Gooding in seeking judicial confirmation. It's tough because the city council realizes they are elected to uphold the will of the people. However, they also have a duty to provide for the health, safety and welfare of the people. Clean water is a necessity for living, as trustees of the city they (council) have to ensure that they provide a clean drinking water source and that the city is in compliance with the EPA and all requirements for the treatment of water.

If the city does not make the improvements and is held liable for fines and penalties or lawsuits resulting from failure to comply with state water system mandates. Would the citizens who disagree want to pay for the non-compliance? I think not.

Municipal government mandates can often run a course that conflicts the will of the people, no one wants to pay more in taxes or levies, when your faced with a mandate versus the will of a vote, municipal government has it's work cut out for themselves. In this case an old water system where the pipes are so old they are rotting.

The county of Jerome is facing a similar problem. Utilizing a jail built in 1974, unable to provide adequate jail space for inmates, unable to meet modern jail standards, the County of Jerome is forced to pay over $500,000 a year placing it's inmates in neighboring county's. The voters in Jerome have voted down proposals to fund a new jail, forcing themselves to continue to pay in the end, an even higher amount of money to send their inmates to other county's.

In Goodings case, the judge who is considered a neutral arbitrator of facts will hear the issue, look at the merits and then decide, what is good for the health, safety and welfare of the city of Gooding and balance that with the law..

I applaud the City Council for putting safety over popularity in making this tough decision. To be a good prudent steward of the public's trust, often requires making unpopular decisions.

TIMES-NEWS
magicvalley.com

Public Hearing Leaves Gooding Residents Frustrated

September 28, 2012 2:10 am • BY STEVE KADEL - skadel@magicvalley.com (3) Comments

GOODING • Residents opposed to a city of Gooding water improvement project voiced their feelings during a public hearing Wednesday night but came away frustrated, according to two people who attended.

At issue is a proposed new residential water delivery system to replace the current one, which Mayor Duke Morton said has rotting pipes, high sediment levels causing poor water movement and flooding into some basements. He estimates the cost of replacement at between $7 million and $9 million, compared to $14 million to revamp the current system.

Citizen Jo Ann Doerr was among those who were upset about the hearing.

"It was a terrible meeting," she said. "The mayor refused to answer questions."

Ken Huber, a Gooding resident since 1958, said 16 of about 30 people who attended spoke about their concerns with the project. Most mentioned the same issues — a significant increase in water bills to pay for the new system and worry that drilling a new backup well, required by the state Department of Environmental Quality, will lower water levels of residential wells.

Huber said many also were angry that city officials wouldn't respond to questions and that the project is being pushed ahead without a vote of Gooding citizens. Higher water bills will be particularly difficult for the town's senior citizens, he noted.

"There were three or four people who left during the meeting because they were disgusted," Huber said. "(city council and mayor) weren't in the mood to listen to anything. They all just hunkered down like they were ashamed to be there and ashamed of what they're doing to us."

Morton said the public hearing format doesn't allow for comment by city officials. That was provided during past town hall meetings, he said.

"It wasn't really a meeting for explanation, and that was a problem," Morton said.

As for the new well's effect on the aquifer, the mayor is confident there will be no problem. He acknowledged the new system would raise water bills, but said there's no other option.

"The best way to care for our city is to do what we're doing," Morton said.

The next step comes during the Oct. 15 city council meeting when members will vote to authorize a judicial review process, which seeks a judge's approval to bypass a public vote for permission to assume a long-term loan from DEQ at 1 percent interest.

If the issues goes before a judge, Morton said, the city will be represented by a Boise law firm experienced in judicial review cases. The firm will make its case for approval and citizens opposed to the plan may hire an attorney to argue against it, Morton said.

(3) Comments

DianaR - October 06, 2012 8:39 pm Report Abuse

Three points:

First, to those who are just noticing this issue NOW... that is ON YOU. This is NOT the Mayor's or the city's fault. This has been an ongoing issue for DECADES. Over the years, I've talked to Todd about my concerns and he's kept me updated. I've been to different community meetings where I've heard about city concerns and updates. I've been to city council meetings and learned about ongoing issues. I've chatted with the Mayor about current events. I've read the notices. I attended town hall meetings. All of this over the past 12 years AT LEAST. This is NOT a surprise to anybody has been paying attention. The information has been provided in not one but THREE town hall meetings. The times and dates were advertised. Questions were asked, answers were given. They may not have been the answers you wanted, but that's how it is.

Second, Gooding has no other choice. Just like anybody who realized their home or their car is finally on its last legs and repairs are no longer fiscally wise, the city has to look at our irrigation system and make that same call. We do not have the funds to repair it. Period. Cry all you want, unless you have gold bullion in your tears to donate to the city, there is nothing that can be done about it. If you want to yell at someone, go back thirty years when the city fathers decided that there wasn't enough money to repair it back then. We've tried to make do for three more decades and we are now beating a dead horse.

Finally, yes, our water costs will go up. Our new water costs are right about in the middle of all other communities. Not the lowest and not the highest. When our electric or fuel or food costs go up, we make changes. We use more efficient light bulbs, we turn off lights and turn down thermostats, we eat more chicken and less steak, we travel less. We adjust. If we cannot afford to live in three lots with lawn and flowers and a garden... we downsize. That's what we are telling our government to do... to stop spending money on things that really aren't necessary because it's too expensive. Maybe that's what we have to ask ourselves? Maybe we should cut some of the "pork" out our own lives, if we can't afford it.

It comes down to this... our infrastructure is no longer sustainable as it is. Our leaders have spent thousands of hours trying to come up with a solution. No matter what the solution, it will cost us. They identified the best solution for the needs and available resources. Now it's our turn to step up and tighten our belts like mature adults and accept the reality of the situation.

I appreciate all of the efforts done by the Mayor, City Council members, employees and others for their dedication and hard work for our city. It isn't easy but you do it for the good of all. Thank you.

platts - September 28, 2012 8:08 am Report Abuse

doerrjo, I could recommend a class in remedial reading at our middle school, try again more slowly. This water proposition has been before the public for years, asking for comments. The meetings have been well advertised and attended. Now after it is all over a few people have decided to comment. Of course the same ones will be out November 7th saying what election? We want to vote now!

doerrjo - September 28, 2012 5:07 am Report Abuse

The Gooding city would use our money to hire a Boise Law firm to fight the people of the city? To take away our rights to VOTE? The interest on 14 million at 1% is about $149.000 a year without paying the loan down. Voting was ok when the Mayor Morton was voted in.

ADD COMMENT

You must Login to comment.

Click here to get an account it's free and quick

More Region Stories

NOTICE OF PUBLIC HEARING

The City of Gooding will hold a public hearing on April 15, 2013 at City Hall, 308 5th Ave West, Gooding at 6:00 pm. The purpose of the public hearing is to present the Gooding Facility Planning Study. The main purposes of the meeting are to explain the proposed upgrades to the drinking water delivery system, costs involved, potential financial impact on the public, and to solicit verbal and written comments regarding the alternatives under consideration. A copy of the plan is available at City Hall beginning April 4, 2013 for review. Written comments will be accepted for a period of fourteen (14) days following this date. After considering and addressing comments, the City Council will select an alternative and document the selection.
Publish April 4 & 11

April 15, 2013

Gooding City Council Minutes

Public Hearing

The public hearing of the Mayor and Council of the City of Gooding, Idaho was called to order at 6:00 pm in the Gooding Municipal Building, 308 5th Ave West, Gooding, Idaho on April 15, 2013.

Moment of Silence

Mayor Duke Morton observed a moment of silence in honor of the victims of the Boston Marathon bombings.

Roll Call

Present were Mayor Morton, Councilpersons France, Houser and Magnelli. Councilman Arkoosh was not present.

Visitors

Present were Bob Harkins, Dorothy Harkins, Casey Hobdey, Connie Jacobson, Mary Condie, Perry Wolfe, Don Mays, Shellie Amundson, Bill Harding, Jeff Harding, Carleen Herring, Alfred Eichholz, Kent Novinger and George Dains.

Purpose

The purpose of the public hearing was to present the Gooding Facility Planning Study. The main purposes of the meeting were to explain the proposed upgrades to the drinking water delivery system, costs involved, potential financial impact on the public, and to solicit verbal and written comments regarding the alternatives under consideration. A copy of the plan was available at City Hall beginning April 4, 2013 for review and written comments were accepted for a period of fourteen (14) days following this date.

Mayor Duke Morton announced the City plans to hold another series of informational town hall meetings to address a broad range of questions regarding the City water and irrigation systems. He explained that this hearing is a specific requirement from the Department of Environmental Quality (DEQ) to elicit public comments on the alternatives under consideration in the Gooding Facility Planning Study.

Public Comment

Casey Hobdey: Mr. Hobdey addressed the council by stating he came into the City office to look over the Facility Planning Study and after looking at the different alternatives, he believes the Council is probably choosing the right plan. However, Mr. Hobdey feels the City should have been putting money back for many years to pay for upgrades and maintenance of the water and irrigation system instead of going into debt. Mr. Hobdey feels

April 15, 2013

Gooding City Council Minutes

the City needs to have a Plan B in mind because he doesn't feel the City will win the vote in November to go into debt.

George Dains: Mr. Dains asked how the City can continue to move forward with this project when the judge ruled against the case for judicial confirmation. Mayor Morton explained that this hearing is a requirement through DEQ regarding the facility planning study and that the City cannot incur long term debt until after either the voters or a judge approve it. Mr. Dains would like to know why the City can't put $400,000 to$600,000 in savings a year and repair the system one section at a time instead of all at once.

Kent Novinger: Mr. Novinger wanted to know how much the water bills will go up? He feels times are tight for everyone and that the government should be more disciplined with money. Mr. Novinger stated that government cannot continue to tax and punish people who are on fixed incomes. People on fixed incomes will have to pay for the increase out of their grocery bills. Mr. Novinger feels the water system has continued to deteriorate and has not been maintained properly through the years. He wants more notification of meetings and asked if there is a charge to put meeting announcements on the radio or television.

Alfred Eichholz: Mr. Eichholz gave the suggestion for the City to have fund raisers to help make extra money as a Plan C. He also suggested the City use volunteers to help with the project.

Connie Jacobson: Mrs. Jacobson would like to see the irrigation system repaired in smaller sections instead of one big project that we have to go into debt for. She doesn't understand why the system cannot be repaired one section at a time like a road.

Don Mays: Mr. Mays said he is confused whether the City water improvement project is about domestic water or irrigation.

Jeff Harding: Mr. Harding feels the City is lacking contact with the people and that the people of Gooding do not understand what is going on with the water improvement project. Mr. Harding feels the City needs to build a stronger relationship with the people and spend more time answering questions. Otherwise people feel the Council is trying to slide things through.

There being no further business, the hearing adjourned.

Regular Meeting

The regular meeting of the Mayor and Council of the City of Gooding, Idaho was called to order at 7:00 pm in the Gooding Municipal Building, 308 5th Ave West, Gooding, Idaho on April 15, 2013.

April 15, 2013

Gooding City Council Minutes

Roll Call

Present were Mayor Morton, Councilpersons France, Houser and Magnelli. Councilman Arkoosh was not present.

Visitors

Present were Carleen Herring, Alfred Eichholz, Heather Wright and Derrick Wright.

Changes to Agenda (Idaho Code 67-2343 Sec 4 (b))

Councilman France moved to add "Sale of Airport Land" and "Library Director- Cindy Bigler" to the agenda. Motion seconded by Councilman Magnelli. Upon roll call, Councilpersons France, Houser, and Magnelli voted aye. Motion carried.

Consent Calendar

(Consent Calendar contains items which require formal Council action, but which are typically routine or not of great controversy. Council members can approve the items listed on the consent calendar as one item or, if finding a correction needs to be made, can pull that item for discussion. There will be no separate discussion on these items unless a Council Member or a member of the audience requests removal of the items from the Consent Calendar.)

Mayor Morton asked, "Consent Calendar Items numbered are before you, are there any items to be removed?" There being no objection, Councilman Magnelli moved to approve:

1. Minutes of the April 1, 2013 meeting
2. Sign Permit- Romero Valencia- 337 Main Street

Motion seconded by Councilwoman Houser. Motion carried unanimously.

Visitors Business

None

Public Comment

None

Unfinished Business

Lincoln Inn Parking Lot Lease: Mayor Morton wrote a letter to the new owner of the Lincoln Inn to meet with the Council to discuss writing a new lease for the parking lot. The council tabled this agenda item pending a discussion with the new owner.

Customer Service Policy: The customer service policy puts in place fair and equitable policies to ensure the financial health and stability of the City of Gooding. The Council has tabled this item until a separate work session can be scheduled to discuss it further.

April 15, 2013

Gooding City Council Minutes

Schedule Work Session- Customer Service Policy: The customer service policy is a requirement from DEQ for the water improvement project. However, since there is no specific timeline for when this policy needs to be complete the work session was not scheduled at this time.

Gooding Dog Group: On March 18, 2013, Nan Reedy addressed the Council regarding the adoption of dogs in Gooding as well as Municipal fees associated with dogs. Mrs. Reedy suggested the City change the cost to license dogs from $10.00 per dog to $10.00 for unneutered/unspade dogs and $5.00 for neutered/spade dogs. Mrs. Reedy also suggested that the Council add a line in the current dog ordinance #666 stating that if an approved dog rescue group exists and the vet deems the impounded dogs fit for adoption that the dogs are to be given to the dog group instead of being euthanized. The Council would like the clerk to prepare a comparison of the revenues and expenses from 2011, 2012 and 2013 for dog enforcement.

Budget Workshop: Budget Workshops for Fiscal Year 2013-2014 were scheduled for May 6, 2013 and May 20, 2012 at 6:00 pm in the Gooding Municipal Building, 308 5th Ave West, Gooding, Idaho.

Spring Cleanup Week: Spring Cleanup Week was set as April 22-26, 2013. The City will pick up yard waste, clippings, limbs, leaves, etc.

Southern Idaho Rural Development- Julia Oxarango-Ingram: Southern Idaho Rural Development (SIRD) is a division of Region IV Development Association, Inc. (RIVDA). SIRD provides community development and economic development assistance to rural cities. In the April 1, 2013 meeting Mrs. Oxarango-Ingram asked the Council to consider becoming an active local partner with SIRD for a yearly cost of $2,000.00.

Mayor Morton has spoken to the Gooding Chamber of Commerce and they would like to partner with the City of Gooding to focus on developing Main Street. Councilman Magnelli has also been approached by citizen regarding the need for economic development.

Councilman France moved to become an active partner with Southern Idaho Rural Development for a yearly cost of $2,000.00. Motion seconded by Councilman Magnelli. Motion carried unanimously.

Sale of Airport Property: Robert Meyers would like an extension for the closing on the airport property purchased on March 18, 2013. He would like an extension from April 5, 2013 to June 14, 2013. Councilwoman Houser moved to allow the Mayor to sign the paperwork extending the closing on airport property from April 5, 2013 to June 14, 2013. Motion seconded by Councilman France. Motion carried unanimously.

April 15, 2013

Gooding City Council Minutes

New Business

Library Director- Pat Hamilton: After 14 years of dedicated service to the Gooding City Library, Library Director Pat Hamilton will be retiring as of May 31, 2013. Her retirement party will be held on May 31, 2013 from 3:00-5:00 pm in the Gooding Municipal Building at 308 5th Ave W. Thank you for all the hard work in promoting literacy in our community.

Library Director- Cindy Bigler: Mayor Morton asked for the Council's approval to appoint Cindy Bigler as the new Library Director. Councilman Magnelli moved to approve Cindy Bigler's appointment to Library Director for the City of Gooding starting June 1, 2013. Motion seconded by Councilwoman Houser. Motion carried unanimously. Cindy Bigler will be at the next meeting to accept her certificate of appointment.

Library Board- Heather Wright: Mayor Morton asked for the Council's approval to appoint Heather Wright to finish out the term of Library Board Trustee vacated by Taryn Massa on February 28, 2013. Heather's appointment will run to October 2015. Councilman Magnelli moved to approve Heather Wright's appointment to the Library Board for the City of Gooding starting immediately to October 2015. Motion seconded by Councilman France. Motion carried unanimously. Heather was welcomed to her new position on the Library Board.

Facility Planning Study- Alternative Selection: The City of Gooding published notice of a public hearing regarding the Facility Planning Study on April 4th & 11th in City's official newspaper. A copy of the plan was available at City Hall beginning April 4, 2013 for review and written comments were accepted for a period of fourteen (14) days following this date. After considering public comment, Councilman France moved to approve the Facility Planning Study as written and the City approves the recommended Alternative 3a which includes 3 new ground water wells, a managed aquifer recharge and withdrawal project, and upgrade of undersized distribution pipes. Motion seconded by Councilwoman Houser. Motion carried unanimously.

Managed Surface Water Recharge: An evaluation of the feasibility of a managed recharge mitigation project for the City of Gooding has been completed. The primary finding of the study was that the project appears to be feasible, and if approved would provide mitigation for the City's current and reasonably anticipated future groundwater usage. Brockway Engineering submitted an estimate to prepare the required applications and the development of the formal mitigation plan and technical analysis as required by the Idaho Department of Water Resources on a time-and-materials basis with a not-to-exceed amount of $11,253.

Councilman France moved to accept the estimate from Brockway Engineering to prepare the required applications and the development of the formal mitigation plan and technical

April 15, 2013

Gooding City Council Minutes

analysis as required by the Idaho Department of Water Resources on a time-and-materials basis with a not-to-exceed amount of $11,253. Motion seconded by Councilman Magnelli. Motion carried unanimously.

Planning and Zoning Commission: The City Council discussed lowering the number of members required on the Planning and Zoning Commission from seven (7) members to five (5) members. Attorney Craig Hobdey will prepare the revised ordinance for the next meeting for the Council to discuss.

Fireworks for July 4th Celebration: Public Works Director Todd Bunn presented a bid from Fireworks West Internationale for $2,000 for the Fourth of July Celebration. Councilman Magnelli moved to accept the bid from Fireworks West Internationale for $2,000 worth of fireworks. Motion seconded by Councilwoman Houser. Councilpersons Houser and Magnelli voted aye, France, abstained. Motion carried.

Addresses Displayed on Homes: There are many homes in Gooding that do not display their addresses on their homes. This makes it difficult for the police, ambulance and fire department to find a specific address in the event of an emergency. Fire Chief Brandon Covey mentioned the volunteer firemen may work on this project as time allows. Heather Wright mentioned the Eagle Scouts may be willing to take on part of this issue as an Eagle Scout Project.

AIC Annual Youth Program Conference: City of Gooding intern Kallie Shadwick would like to attend the AIC Annual Youth Program Conference to learn to work with local elected officials, accurately identify, understand and respect the feelings of others, develop skills to identify and solve problems and ethical dilemmas, learn how to work as a team, develop a positive self-concept, create a positive mental attitude, recognize the importance of school and community service and learn how to delegate and include others effectively. The registration fee is $280. This covers lodging, transportation at the conference, workshops, materials, all meals and activities during the conference.

Councilman France moved to allow City of Gooding Intern Kallie Shadwick to attend the AIC Annual Youth Program Conference from June 19-22, 2013 for a cost of $280.00. Motion seconded by Councilman Magnelli. Motion carried unanimously.

Department Reports

Mayor Duke Morton: None

Police Chief Jeff Perry: None

Fire Chief Brandon Covey: None

April 15, 2013

Gooding City Council Minutes

Public Works Director Todd Bunn: Public Works Director Todd Bunn clarified that the engineering fees for the baseball field improvements were not paid out of the airport fund even though the airport engineer created the drawings; those charges were paid out of the parks department.

City Clerk Morri Hall: None

There being no further business, the meeting adjourned.

ATTEST:

Morri Hall
Morri Hall- City Clerk

Duke Morton- Mayor

Affidavit of Publication

STATE OF IDAHO)
COUNTY OF TWIN FALLS) SS.

I, Ruby Aufderheide, being first duly sworn upon oath, depose and say that I am Legal Clerk of the TIMES-NEWS,published daily at, Twins Falls, Idaho, and do solemnly swear that a copy of the notice of advertisement, as per clipping attached, was published in the regular and entire issue of said newspaper, and not in any supplement thereof, for two consecutive weeks, commencing with the issue dated 4th day of April, 2013 and ending with the issue dated 11th day of April, 2013

And I do further certify that said newspaper is a consolidation, effective February 16, 1942, of the Idaho Evening Times, published theretofore daily except Sunday, and the Twin Falls News, published theretofore daily except Monday, both of which newspapers prior to consolidation had been published under said names in said city and county continuously and uninterruptedly during a period of more than twelve consecutive months, and said TIMES-NEWS, since such consolidation, has been published as a daily newspaper except Saturday, until July 31, 1978, at which time said newspaper began daily publication under said name in said city and county continuously and uninterrupted.

And I further certify that pursuant to Section 60-108 Idaho Code, Thursday of each week has been designated as the day on which legal notice by law or by order of any court of competent jurisdiction within the state of Idaho to be issued thereof Thursday is announced as the day on which said legal will be published.

Ruby Aufderheide
Ruby Aufderheide, Legal Clerk

STATE OF IDAHO
COUNTY OF TWIN FALLS

On this 16th day of April, 2013, before me,

a Notary Public, personally appeared Ruby Aufderheide,
known or identified to me to be the person whose name subscribed to the within instrument, and being by me first duly sworn, declared that the statements therein are true, and acknowledged to me that he executed the same.

Linda Capps McGuire
Notary Public for Idaho
Residing at Twin Falls, Idaho.

My commision expires: 5-19-15

LINDA CAPPS-McGUIRE
NOTARY PUBLIC
STATE OF IDAHO

NOTICE OF PUBLIC HEARING

The City of Gooding will hold a public hearing on April 15, 2013 at City Hall, 308 5th Ave West, Gooding at 6:00 pm. The purpose of the public hearing is to present the Gooding Facility Planning Study. The main purposes of the meeting are to explain the proposed upgrades to the drinking water delivery system, costs involved, potential financial impact on the public, and to solicit verbal and written comments regarding the alternatives under consideration. A copy of the plan is available at City Hall beginning April 4, 2013 for review. Written comments will be accepted for a period of fourteen (14) days following this date. After considering and addressing comments, the City Council will select an alternative and document the selection.

PUBLISH: April 4 and 11, 2013

Appendix P Open House and Public Education Material 2013

Town Hall Meeting Schedule

The City of Gooding invites you to attend the Town Hall meetings for in-depth information about water system improvements.

Dates

September 5, 2013 @ 7:00-9:00 PM

October 2, 2013 @ 7:00-9:00 PM

October 29, 2013 @ 7:00-9:00 PM

Location

Walker Center
605 11th Ave East
Gooding, ID 83330

COMING TOGETHER
SHARING TOGETHER
WORKING TOGETHER
SUCCEEDING TOGETHER

City of Gooding
308 5th Ave West
Gooding, ID 83330

FIRST CLASS MAIL
U.S POSTAGE PAID
PERMIT NO. 1
GOODING, IDAHO

City of Gooding

FLOOD IRRIGATION SYSTEM

Support each other and your community by being
ACTIVE PARTICIPANTS
in a TOWN HALL MEETING on

September 5, 2013 @ 7:00 - 9:00 PM

Learn about
DEGRADING IRRIGATION SYSTEM
and deficiencies of the potable water system that put you and your families at risk.

Walker Center
605 11th Ave East
Gooding, ID 83330

The GOAL of the Town Hall Meeting is to INFORM citizens about issues with the water system and INTRODUCE SOLUTIONS designed to eliminate these issues. The City Council will be at the Town Hall meeting to present information, DISCUSS CONCERNS and answer questions about the following topics:

Old Failing System

1. Challenges with Irrigation System

- ◊ Degrading condition
- ◊ Not self-supporting
- ◊ Finding and training ditch riders
- ◊ Delivery of irrigation water
- ◊ Change in elevation of yards
- ◊ Many properties do not use irrigation

2. Challenges with Potable Water System

- ◊ Demand will exceed supply by 2017
- ◊ Low water pressure = health risk
- ◊ Low fire flows

OLD SYSTEM

November 5, 2013

BOND ELECTION

Bond = $5,000,000

NEW RELIABLE SYSTEM

LEARN

COMMIT

PARTICIPATE

ENJOY

New Reliable System

- Three new ground water wells
- Upgraded water lines
- Surface water rights
  - lease
  - convert to ground water rights
- Engineering costs and impacts

More detailed information is available at City Hall:
308 5th Ave West
Gooding, ID 83330
(208) 934-5669

City of Gooding

FLOOD IRRIGATION SYSTEM

Town Hall Meeting
September 5, 2013

Condition of the Irrigation System

- Work Projects Administration (WPA) installed concrete ditches in 1940s
- Corrugated metal pipe (CMP) – life expectancy
- Concrete irrigation pipes and irrigation boxes – condition& locations
- Open ditches – safety & maintenance

2

Condition of the Irrigation System

Corrugated Metal Pipe - Life expectancy

- Large sections of CMP (corrugated metal pipe) installed from 60's – 80's have deteriorated away from metal rot and rust.
- Many times a pipe will start leaking in one spot and several hundred feet must be replaced in order to find pipe that still has some integrity.

3

Condition of the Irrigation System

Irrigation Boxes and Concrete Irrigation Pipes - Condition & Locations

- Hundreds of concrete irrigation boxes made of hand mixed cement are deteriorating.
- Irrigation boxes exposed to traffic are being damaged by large vehicles.
- Concrete pipes installed between 1950-1970 are in poor condition and have fallen victim to stress cracking caused by freezing, thawing and vehicle travel.

4

Condition of the Irrigation System

Open Ditches- Safety & Maintenance

Repairs are completed on a yearly basis but the 75 year old infrastructure is no longer holding up to repeated repairs.

5

Condition of the Irrigation System

Repairs & Maintenance

Repairs are complicated by:
- Inability to evaluate repairs during the off season
- Difficulty to bypass sections of the system to perform repairs
- Necessity to shut down large sections of the system for several days

6

Not Self Supporting Financially

- The City's Irrigation Department
  - not self-sufficient
  - relies heavily on the employees and equipment from other departments
- If the Irrigation Department does not become self-sufficient, the streets as well as the water and sewer systems are going to fall into disrepair.


7

Finding & Training Ditch Riders

- Low prospective employee interest
- Seasonal position – long hours, low pay
- Extensive training period
- Replacement ditch rider
- Overtime wages - unemployment



8

Delivery of Water

Changes in Society

- People are not home to receive / manage the water during the time period required.
- Impossible to guarantee a specific irrigation time because the number of users taking the water as well as the amount of water available varies every week.

- Ditch riders can no longer irrigate lawns as the City cannot risk the liability of flooded basements.

9

Increased Yard Elevations

- Increased yard elevations from silt and dirt accumulated over the years
- Flooding of streets
- Flooding of neighbors
- Lowering of yards

The increased elevation of yards has created two problems:

1. Caused water to travel slower across yards increasing watering times as well as flooding in the streets and adjacent properties.
2. Every year the City has had to raise various ditches, boxes and berms to prevent unwanted flooding.

10

Properties that Do not Use Irrigation

- Users with sprinkler systems
- Users unable to use flood irrigation safely
- Business district – book keeping fee
- Have impact on rates

Eliminating these users from the irrigation tax roll will increase assessments for the actual users.

11

Surface Water Rights

Several options have been evaluated regarding surface water rights:

1. Lease to farmers and other potential users
2. Convert to additional groundwater rights
3. Groundwater recharge
4. Maintain under City control

12

Old Failing System ⟹ New Reliable System

Engineering Study

Alternatives Considered

Alternative 1- Replace existing gravity irrigation system. Estimated cost is $14,162,000. The irrigation assessment would go up to approximately $24.50 per lot per month ($294 per lot per year) to cover the cost to replace the existing gravity irrigation system and will leave the City open to future deficiencies in DEQ regulations on the water system.

Alternative 2- Install pressurized irrigation system. Estimated cost is $12,052,000. The irrigation assessment would go up to approximately $19.50 per lot per month ($234 per lot per year) to cover the cost to install a pressurized gravity irrigation system and will leave the City open to future deficiencies in DEQ regulations on the water system.

Alternative 3a- Abandon existing irrigation system & augment potable water system by drilling new wells. In this scenario the City would provide irrigation water through the drinking water infrastructure and the yearly irrigation assessments would no longer be charged to citizens. Estimated cost is $3,400,789 - $6,820,409. The City will need to raise water user rates approximately $6.30 – $14.30 per month to drill new wells in order to abandon the existing irrigation system.

Alternative 3b - Augment potable water system by constructing surface water treatment plant. This alternative consider abandoning the existing irrigation system, augmenting the potable water system and constructing a surface water treatment plan to treat water to drinking water standards. Estimated cost is $19,068,000. The City will need to raise water user rates approximately $64.50 per month to construct a surface water treatment plant.

Alternative 3c - Augment potable water system by constructing surface water treatment plant and a new well. This alternative considers abandoning the existing irrigation system, constructing one new well and a surface water treatment plant. Estimated cost is $14,770,000. The City will need to raise water user rates approximately $46.50 per month to construct a surface water treatment plant and a new well.

Engineering Study

Citizen's Committee

Following a public hearing held in May 2009, the irrigation committee was formed by Mayor Duke Morton and charged to review the irrigation study and make a recommendation to the City Council which option would be best for Gooding.

The committee found there are only a few users who understand their responsibilities in managing the system; fewer people staying home to manage it; and that the system has been decaying for 50 years. After careful consideration, the committee recommended:

1. Alternative 3a. This alternative augments the current potable system by **drilling new wells**; **upgrades the undersized water lines**; allows the City to ultimately **abandon the existing flood irrigation system**; and allows that **water will be charged on a usage basis**.
2. Recognizing the value of the existing surface water rights, the committee recommends that the City's **water rights be protected** and not traded or encumbered.
3. Recommends that the City have **numerous public informational meetings and hearings** as it is imperative for the citizens to fully understand the need for the new system and the financial impact it will have on them individually.
4. Also that the City find ways to **provide information** to those who do not attend the hearings.
5. Recommends the City implement opportunities for the community to learn about **water conservation and water conscious landscaping**.

Engineering Study

Council Decision

After reviewing the independent engineering study, taking in consideration the Citizen's Committee recommendation and holding various Town Hall meetings over the last 4 years the City Council has chosen Alternative 3a. The current average water rate is $32.06 and the anticipated increase will be approximately $6.30 – $14.30 per month. In addition, the irrigation assessment will be eliminated.

Alternative 3a

- **Abandon existing irrigation system**
- **Augment potable water system by drilling new wells**
- ✓ Irrigation water provided through the drinking water infrastructure
- ✓ Eliminates yearly irrigation assessments
- ✓ Estimated project cost: $3,400,789 - $6,820,409
- ✓ Anticipated user rates increase: $6.30 – $14.30 per month

Next Steps

Town Hall Meetings

October 2, 2013 @ 7:00-9:00 PM

October 29, 2013 @ 7:00-9:00 PM

Bond Election

November 5, 2013

Gooding Mayor and City Council
Walt Nelson, Mayor
Vern France
Mitch Arkoosh
Diane Houser
Mel Magnelli

Thank you!

Keller Associates, Inc.
Jim Mullen, P.E.
Oksana Roth, E.I.
(208) 238-2146

Irrigation/ Water Improvement Information Meeting Attendance
SIGN IN SHEET - September 5, 2013

Name	Address	Phone	Email
Cerrick Hathaway	113 11th ave W	934-5751	
Alfred E Eichhof	532th ave W	961-1953	
Donna Hathaway	113 11th ave W	934-5751	
Tom + Gail Lowman	506 California		
Kathy Lehr			
Ben Peck	Region IV		Ben@r4da.org
K Anderson	237 orchard	944 2413	
Gary Wolfe	534 6th ave West		
Walt Rumo	1750 S 2150 E		
John Althea Howard	821 michigan ST	9345327	Johnathea@cableone.net
Rod Glasner		934-5152	
Kipp Miles			
Jon Bolton			
Annie Edwards			
Ernie P Waldrup			
Nathan Van Sant		944-4975	
Paul Klingler		539-4796	
Dave White	505 Nevada St. Gooding ID	961-1492	
Marta Thompson	606 3rd Ave. W.	481-2440	

Irrigation/ Water Improvement Information Meeting Attendance
SIGN IN SHEET - September 5, 2013

Name	Address	Phone	Email
Lara L Rose	733 7th Ave W	352.7543	
Diane Houser	1016 2d St	934-8557	
Jack Houser	"	"	
Marcy Peterson	705 Idaho		
[illegible]	730 Idaho		
Al Strande	1020 [illegible]		
Mary L Brooks	501 Montana		
R E Brooks	501 Montana		
Tina Huber	134 nebrasua	316-4120	
Bob & Dorothy Harkins	201 Wyoming	358-0588	
Bill Harding	434 4TH AV WEST	934-4385	
Mary Lou Jerdine	557 Nebraska	934-8540	
Cheryl Stevens	222 Oregon	934-5549	Gooding
J Baldwin	whipkey		
Roberta Canine			
Bill Canine			
JEFF McCurry	REGION IV Development	732-5727	
Bryan R. Rample Sr.	Gooding		
Connie Jacobson	202 Nebr. St Gdg		

Irrigation/ Water Improvement Information Meeting Attendance
SIGN IN SHEET - September 5, 2013

Name	Address	Phone	Email
Jennifer Wheeler	437 Wyoming ST	208-9344455	
Mark [illegible]	606 3Rd Ave	Cell 208-481-2443	
Jesus Nino	518 2nd Ave E	961-1208	

City of Gooding
Town Hall Meeting
October 2, 2013

WATER SYSTEM EVALUATION

Objectives

OLD SYSTEM

November 5, 2013
BOND ELECTION
Bond = $5,000,000

NEW RELIABLE SYSTEM

Old System

- Non-potable irrigation system

- Drinking water system

Old System

- Non-potable irrigation system
  - Deteriorated beyond repair
  - Continued use is not practical
- Drinking water system
  - Non-compliant

New Drinking Water System

- Water Facility Planning Study (WFPS)
  - Evaluate existing system
  - Develop alternatives to improve the system
  - Select preferred alternative
- Design selected alternative
- Project Construction

W F P S

New Drinking Water System

- Existing water system

Ground Water Rights	Well Pumping Capacity	Redundant Supply	Max Day Demand
3,164 gpm	**3,543 gpm**	**2,025 gpm**	**2,264 gpm**

  - Insufficient water rights

W F P S

New Drinking Water System

W F P S

Year	Population	Max Day Demand (gpm)	Redundant Well Supply (gpm)	Surplus / Deficiency (gpm)
2010	3,567	1,900	2,025	125
2012	3,653	2,001	2,025	24
2017	3,878	2,264	2,025	-239
2032	4,637	3,154	2,025	-1,129
2042	5,225	3,842	2,025	-1,817
2052	5,887	4,617	2,025	-2,592

By 2017 demand is greater than redundant supply ***while using gravity irrigation system***

New Drinking Water System

W F P S

Alternative	Estimated Cost
Alternative 1 – Maintain existing gravity irrigation system	$14,162,000
Alternative 2 – Install pressurized irrigation system	$12,052,000
Alternative 3a – Drill additional wells & upgrade distribution system	**$5,000,000**
Alternative 3b – Construct surface water treatment plant & upgrade distribution system	$19,068,000
Alternative 3c – Construct surface water treatment plant & add new well & upgrade distribution system	$14,770,000

- Preferred alternative – Alternative 3A

New Drinking Water System

W F P S

- Estimated increase in monthly user rates

Alternative	Monthly Rate Impact for Users
Alternative 1	$24.38/lot
Alternative 2	$19.47/lot
Alternative 3A	$9.81
Alternative 3B	$64.49
Alternative 3C	$46.48

- Alternative 3A eliminates yearly gravity irrigation charge of $39.91/lot/year

Selected Alternative Cost

W F P S

Item	Cost
Well & Well House #5	$890,400
Well & Well House #6	$890,400
Transmission improvements	$257,050
Construction Subtotal	*$2,037,850*
Contingency (2.59%)	$52,819
Construction Total	**$2,090,669**
Land and Easement Acquisition	$88,900
SCADA	$70,000
Land and SCADA Subtotal	*$158,900*
Construction Total, Land, and SCADA Subtotal	*$2,249,569*
Water Rights	$2,004,000
Engineering, legal, permitting and administrative	$746,431
Total	**$5,000,000**

- Aquifer Recharge project – Water Rights – additional Transmission Improvements

New Drinking Water System

W F P S

Event	Date
Town Hall Meeting	September 5, 2013
Town Hall Meeting	October 2, 2013
Town Hall Meeting	October 29, 2013
Submit Grant Application	November 2013
Bond Election	November 5, 2013
User Rate Increase	Spring 2014
Grant Eligibility Determination	May 2014
Finalize water rights	Spring 2014
Design	Summer 2014
Begin Construction	Fall 2014
Complete Construction	Summer 2015

NEXT STEPS

Town Hall Meeting

October 29, 2013 @ 7:00-9:00 PM

Bond Election

November 5, 2013

THANK YOU!

<u>Gooding Mayor and City Council</u>
Walt Nelson, Mayor
Vern France
Mitch Arkoosh
Diane Houser
Mel Magnelli

Keller Associates, Inc.
Jim Mullen, P.E.
Oksana Roth, E.I.
(208) 238-2146

Irrigation/ Water Improvement Information Meeting Attendance
SIGN IN SHEET - October 2, 2013

	Name	Address	Phone	Email
1	Alvin Kuitz	1735 Main	208 934-8565	akuitz@HTSI.com
2	Alfred E Eichlrotz	532 7th ave W	961-1953	
3	Jason Neil	1462 Idaho	227-3389	jason.neil@alwood jones.com
4	Pat Nelson	401 14th Ave West	934-5345	wcnelson@cableone.net
5	Walt Nelson	401 14th Ave West	934-5345	
6	Shirley B.	821 Nevada		
7	Bob & Dorothy Harkins	701 Wyoming	358-0588	
8	Cecil & Donna Hathaway	113 11th Ave West	934-5751	
9	[illegible]	226 Wyoming	934-4187	
10	Dave Kamenstra	4th ave	539-6843	
11	Kathy Lehr		732-5727	
12	CARLEEN HERRING	P.O. 5079 TF 83303-5079		cherring@csi.edu
13	Ken Allison	816 8th Ave East	934-5933	
14	Paul Koonce	741 Idaho St	934-8687	
15	Duane & Coral Clemons	208 Orchard	934-4714	
16	Mary Corder	1906 Calif	934 8369	
17	[illegible]	627 Elm Circle		
18	Eileen Shaffer	509 13 Ave W	~~537~~	
19	D R Mayo	102 Mich		

Irrigation/ Water Improvement Information Meeting Attendance
SIGN IN SHEET - October 2, 2013

	Name	Address	Phone	Email
20	Bill Dayley	521 Toponis	934-4759	
21	Reta Strout	310 19th A	934-8140	
22	Robert Snow	248 Rice Ave.	934-5691	
23	[illegible]	721 Arizona	[illegible]	
24	Marcel Pearson	905 Idaho		
25	[illegible]	1109 Montana St		
26	Ben Peck	P.O box 781	732-5777	ben@ivda.org
27	Jim McLin	134 Montana St	539-5415	
28	Mary Bishop			
29	Barbara Burns	119 Nevada		
30	Helen P Edwards	214 Wyo.		clehell@aol.com
31	Barbara Hain	329 Montana St		hainb69@yahoo.com
32	Alice Kathryn Wright	339 Arizona St.		
33	Michelle Spezziali	706 4th Ave W		michellesp[illegible]@yahoo[illegible]
34	May Heucock	514 9th Ave E Gooding		
35	Ray Mays	103 Michigan Gooding		
36	VJ Kunz	701 8th Ave. E. Gooding		
37	Melva Simmons	146 Nebraska Gooding		
38	[illegible]	317 Caly		

Irrigation/ Water Improvement Information Meeting Attendance
SIGN IN SHEET - October 2, 2013

	Name	Address	Phone	Email
39	LeRoy Renner	909 Oregon	934 5094	
40	Glenna Grover	1409 Idaho	934-5509	
41	Doug Wood	1342 Ave East	9348425	
42	Floyd K Miles	Gooding		
43	Daunda Baums	322 Calif Good	934-5432	
	John & Deby Anfanger,			
	David Philips			

Irrigation/ Water Improvement Information Meeting Attendance
SIGN IN SHEET - October 2, 2013

Name	Address	Phone	Email
44 Jennifer Graves	638 Pine	9344171	jgraves@ddtsi.com
45 J Mottys	634 13th Ave		Gooding ID
46 Lonnie Zuadell	1824E 1750 S	934 9020	Gooding

City of Gooding
Town Hall Meeting
October 29, 2013

WATER SYSTEM EVALUATION

Objectives

OLD SYSTEM

November 5, 2013
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Bond = $5,000,000

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W F P S

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By 2017 demand is greater than redundant supply ***while using gravity irrigation system***

New Drinking Water System

W F P S

Alternative	Estimated Cost
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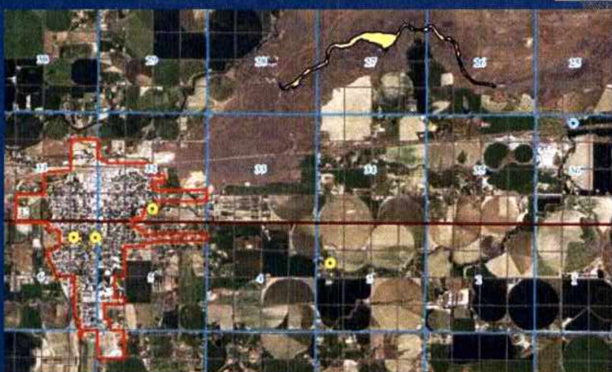
Alternative 2 – Install pressurized irrigation system	$12,052,000
Alternative 3a – Drill additional wells & upgrade distribution system	**$5,000,000**
Alternative 3b – Construct surface water treatment plant & upgrade distribution system	$19,068,000
Alternative 3c – Construct surface water treatment plant & add new well & upgrade distribution system	$14,770,000

- Preferred alternative – Alternative 3A

New Drinking Water System



New Drinking Water System

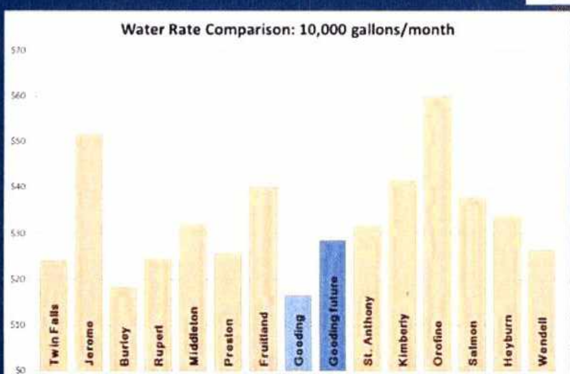
W F P S

- Estimated increase in monthly user rates

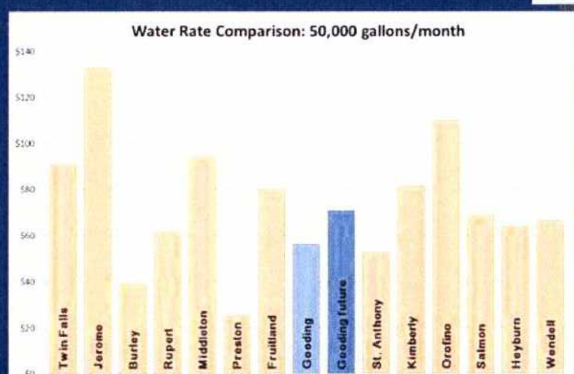
Alternative	Monthly Rate Impact for Users
Alternative 1	$24.38/lot
Alternative 2	$19.47/lot
Alternative 3A	$9.81
Alternative 3B	$64.49
Alternative 3C	$46.48

- Alternative 3A eliminates yearly gravity irrigation charge of $39.91/lot/year

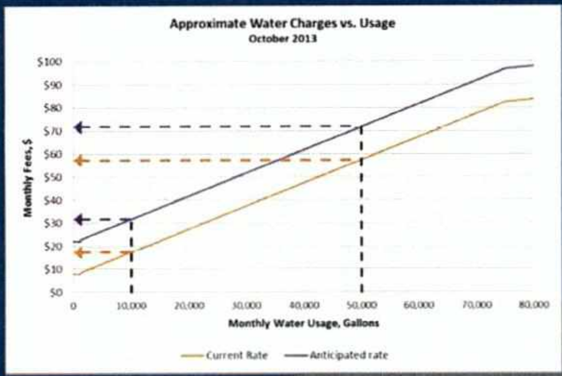
Water Rate Comparison



Water Rate Comparison



Water Rate Comparison



W F P S

Selected Alternative Cost

Item	Cost
Well & Well House #5	$890,400
Well & Well House #6	$890,400
Transmission improvements	$257,050
Construction Subtotal	*$2,037,850*
Contingency (2.59%)	$52,819
Construction Total	***$2,090,669***
Land and Easement Acquisition	$88,900
SCADA	$70,000
Land and SCADA Subtotal	*$158,900*
Construction Total, Land, and SCADA Subtotal	*$2,249,569*
Water Rights	$2,004,000
Engineering, legal, permitting and administrative	$746,431
Total	**$5,000,000**

- Aquifer Recharge project – Water Rights – additional Transmission Improvements

W F P S

New Drinking Water System

Event	Date
Town Hall Meeting	September 5, 2013
Town Hall Meeting	October 2, 2013
Town Hall Meeting	October 29, 2013
Submit Grant Application	November 2013
Bond Election	November 5, 2013
User Rate Increase	Spring 2014
Grant Eligibility Determination	May 2014
Finalize water rights	Spring 2014
Design	Summer 2014
Begin Construction	Fall 2014
Complete Construction	Summer 2015

W F P S

NEXT STEP:

Bond Election

November 5, 2013

Keller Associates, Inc.
Jim Mullen, P.E.
Oksana Roth, E.I.
(208) 238-2146

Gooding Mayor and City Council
Walt Nelson, Mayor
Vern France
Mitch Arkoosh
Diane Houser
Mel Magnelli

GOODING TOWN HALL MEETING #3 October 29, 2013

Sign in

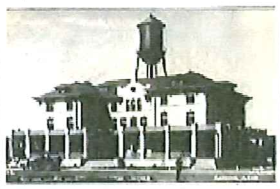
Walt + Julie White	301 Texas ST.
Harold + Lois Wantuyt	567 Nebraska
Jeff Gibbons	801 N 8th Ave
Larry Gibbons	" " "
JOHN & ROSE CREWS	416 WYOMING ST.
SHARON SEIFERT	545 Washington ST.
Terance Z Kulhanek	530 W 3Rd
Kimberlee Carter	530 3rd Ave West
Pat Nelson	401 14th ave West
Paul Koonce	741 Idaho St.
Tom Lorman	506 California
Carly + David Keever	525 Arizona
Bonnie Runyan	538 13th Ave
Mike Fehl	736 Idaho St
Don Hardman	642 OREGON St
Ernest Waddaugh	1109 Montana St.
Tana Arnold	207 Oregon St.
W Savage	1447 Id St.
Carl Boyer	1030 Main
Dean VanAmburg	1030 Main
Melba New Simmons	146 Nebraska
Daryl E White	505 NEVADA ST

TOTAL = 55 PEOPLE

Appendix Q Water Facilities Planning Supplement 2013

City of Gooding, Idaho
Supplement to Water Facilities Planning Study
DEQ Grant No. DWG 126-2012-7
PWS No. ID5240009





March 2013

PROFESSIONAL ENGINEER
REGISTERED
9056
STATE OF IDAHO

3/25/13

KELLER
associates

Introduction

This supplement to the Water Facilities Planning Study (WFPS) reviews an aquifer recharge project as a means of utilizing City's surface water rights in a managed aquifer recharge and withdrawal project.

Implementation of Alternative 3a (construction of three ground water wells and upgrade of transmission lines) is designed to eliminate current and future deficiencies of the potable water distribution system. However, existing ground water rights are insufficient for development of new wells. Therefore, the City hired Brockway Engineering to examine various options to permit implementation of Alternative 3a, as described in Sections 6.5.1 and 7.2 of the Water Facilities Planning Study.

Recharge Scope and Use of Surface Water Rights

According to the "Evaluation of the Feasibility of a Managed Recharge Project for the City of Gooding" (Attachment A), the Eastern Snake Plain Aquifer (ESPA) moratorium makes it difficult to obtain "a new groundwater permit having a consumptive component". Therefore, the next most feasible alternative for the City is to consider utilization of irrigation surface water rights in a managed aquifer recharge and withdrawal project. Brockway Engineering states this alternative will not result in a "new net depletion of the aquifer" and, therefore, will not violate the ESPA moratorium.

The City holds decreed and surface water rights for a total of 9.0 cfs. These water rights can be used in a managed aquifer recharge and withdrawal project proposed by Brockway Engineering. The recharge area is an existing diversion from the Little Wood River, approximately 4.5 miles east of the City of Gooding, as shown in Figure 1 prepared by Brockway Engineering. The existing diversion, designed to 300 cfs (Personal Communication, Todd Bunn, Public Works Director, March 14, 2013), is utilized by the City as part of the flood control system and has been in the City's ownership since 1909 (Attachment B – The Original 1909 Flood Control Project Agreement).

Diversion of Water to an Existing BLM Stream Bed

It was reported by Brockway Engineering as a result of a site inspection held on October 2, 2012, that the channel bed is well defined and has multiple areas for water infiltration. The stream bed is under the jurisdiction of the Bureau of Land Management (BLM). Presently, the City of Gooding is negotiating with BLM regarding the feasibility of the proposed aquifer recharge and withdrawal project.

Recharge into the Aquifer

As water enters the aquifer through the recharge site, it will cause formation of a recharge "mound". The "mound" will dissipate and be conveyed down-gradient upon completion of recharge. Brockway Engineering states that aquifer recharge is similar to storing water in a reservoir. Nonetheless, some of the recharged water may not reach City wells as the water moves down-gradient. Thus, 100% recovery of recharged water may not be achievable. For details consult the report prepared by Brockway Engineering (Attachment A).

Ground Water Rule

The purpose of the Ground Water Rule, as defined by the Environmental Protection Agency (EPA), is to "provide for increased protection against microbial pathogens in public water systems that use ground water sources" (EPA, 2006). The Rule targets those ground water systems that are "susceptible to fecal contamination" indicating potential presence of microbial pathogens that may pose threat to public health. The City of Gooding is current on ground water monitoring required for a public water system. For water quality records refer to Appendix C in the WFPS. The managed aquifer recharge and withdrawal project is not anticipated to negatively affect the present water quality of the public water system.

Cost Estimate

Since the existing City-owned diversion will be utilized for the proposed aquifer recharge project, no major work, such as construction, earthwork or structural modifications, is expected. An estimated cost of approximately $25,000 required for installation of a sluice gate and meter vault and box improvements is not included in the cost of Alternative 3a and will be entirely funded by the City (Personal Communication, Todd Bunn, Public Works Director, March 14, 2013).

References

EPA. (2006). *40 CFR Parts 9, 141, and 142 National Primary Drinking Water Regulations: Ground Water Rule; Final Rule.* Federal Register/ Volume 71, No. 216/ Wednesday, November 8, 2006/Rules and Regulations.

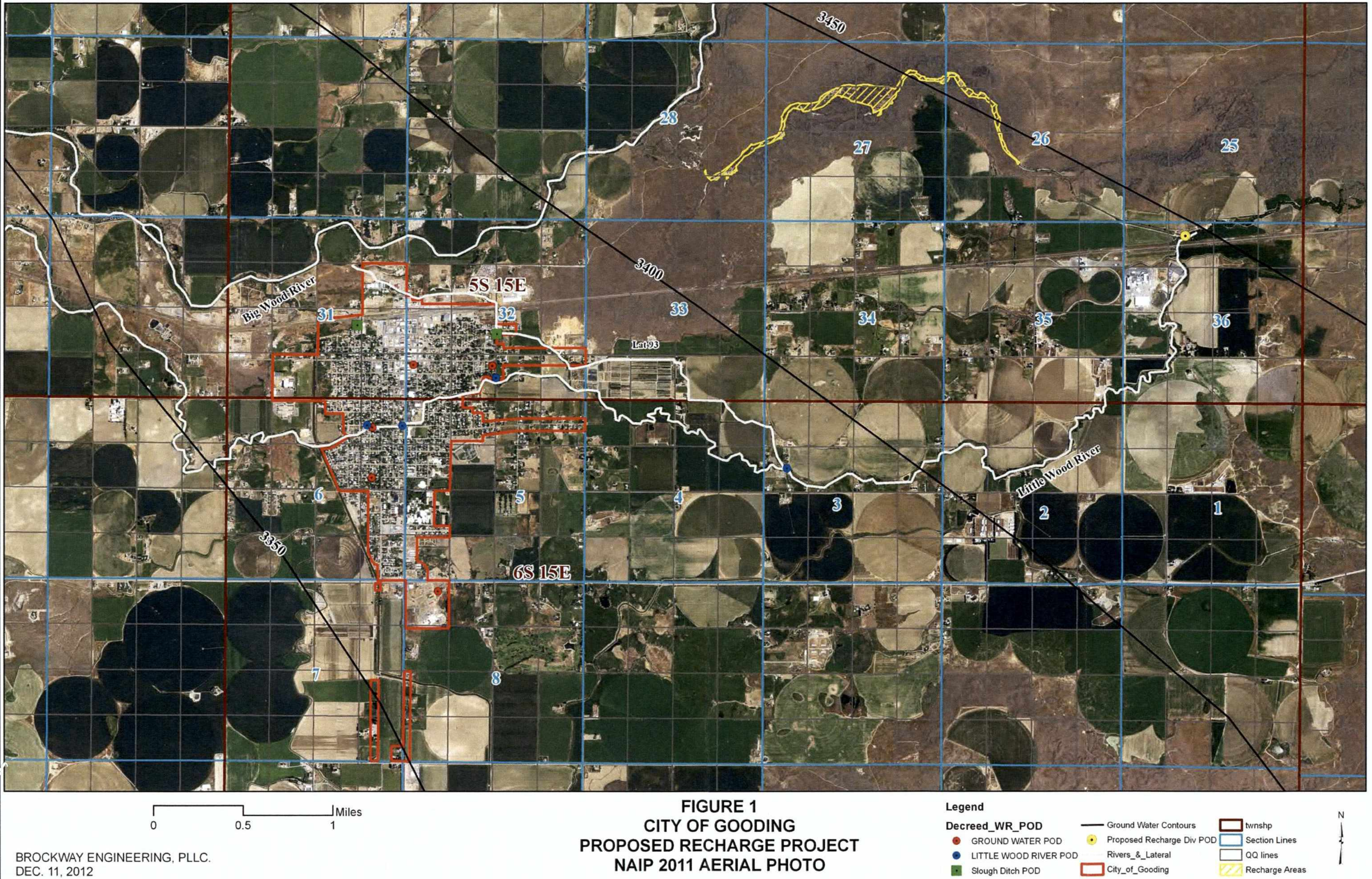


FIGURE 1
CITY OF GOODING
PROPOSED RECHARGE PROJECT
NAIP 2011 AERIAL PHOTO

BROCKWAY ENGINEERING, PLLC.
DEC. 11, 2012

Attachment A – Evaluation of the Feasibility of a Managed Recharge Project for the City of Gooding

Project No. 1176-01-2012

Evaluation of the Feasibility of a Managed Recharge Project for the City of Gooding

Prepared for:
City of Gooding, Idaho
March 22, 2013

For information concerning this report, contact
Charles G. Brockway, Ph.D., P.E.

PROFESSIONAL ENGINEER
REGISTERED
9195
3/22/2013
STATE OF IDAHO
CHARLES G. BROCKWAY

BROCKWAY ENGINEERING P.L.L.C.

Charles E. Brockway, Ph.D., P.E.
Charles G. Brockway, Ph.D., P.E.

2016 North Washington, Suite 4
Twin Falls, Idaho 83301

Evaluation of the Feasibility of a Managed Recharge Project for the City of Gooding

Brockway Engineering, PLLC
Charles G. Brockway, Ph.D., P.E. March 22, 2013

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1. Overview

The City of Gooding owns and operates both a potable water system and a gravity irrigation system throughout the City's water service area (Figure 1). Potable water supply is provided by three (3) deep wells diverting from the Eastern Snake River Plain aquifer (ESPA). Gravity irrigation is supplied by water diverted from the Little Wood River. At present, approximately 47% of the City's customers are served irrigation water from the gravity system, while another 27% are served partly from the gravity system and partly from the potable system.

The gravity system has deteriorated significantly since its construction in the 1930s. Maintenance of the system requires disproportionate use of scare resources and ensuring uniform and reliable delivery of irrigation water to the City's residents has become difficult or impossible in some cases. Upgrading the gravity irrigation system to current engineering standards would be cost-prohibitive and disruptive to City services. The preferred alternative is to abandon the gravity system altogether and expand the existing potable system to supply all water demands including in-house and irrigation.

In order to accomplish this objective, the City would need to develop new wells in addition to increasing the pump-out from the existing wells. However, insufficient water right authorization is in place for the wells to supply all of the potable and irrigation demands. It is not possible to obtain a new groundwater permit having a consumptive component, e.g. irrigation, due to the ESPA moratorium. Therefore, it is proposed to utilize all or part of the existing surface irrigation rights in a managed aquifer recharge and withdrawal project. Conceptually, such a plan would involve recharging (i.e. sinking) surface water to the aquifer as mitigation for a new groundwater appropriation. Since the new appropriation would result in no new net depletion of the aquifer, the ESPA moratorium would not be violated and IDWR could approve the new permit.

In addition to mitigating for a new pumping authorization, the recharge water, if sufficient, could mitigate for depletions occurring under existing water rights and impacts from this depletion on the reach gain in the Snake River. Such mitigation could afford protection from a water call by earlier-priority surface water rights. This objective is valuable since recent calls by users of springflow and natural flow rights on the Snake

River have raised the specter of curtailment of groundwater rights, including those held by municipalities. Implementing a mechanism by which existing and future consumptive uses are mitigated could essentially insulate the City from any present or future water calls by any user later in time than the priority dates of the water rights used for mitigation.

The City holds both decreed surface rights and shares in the American Falls Reservoir District #2 totaling 9.0 cfs, which could potentially be used in a recharge project. The City has identified an existing recharge area which appears to have adequate capacity based on historical diversion and observation. This site will be the focus of Phase 1; no other sites are proposed to be investigated at this time.

In this study, the feasibility of developing a managed recharge and withdrawal plan was investigated. The study included the following components:

- Analysis of existing conditions within the city, including recent city water usage from both groundwater and surface water sources.
- Estimation of current irrigated area served from the City systems and current consumptive use.
- Development of a monthly water balance incorporating current and proposed groundwater withdrawals reflecting increased demand from existing wells and new wells, and proposed recharge
- Groundwater modeling, both on a local scale to estimate the effect of the recharge and withdrawal on local water levels, and on a aquifer-wide scale using the State of Idaho ESPA groundwater model to investigate the effect on Snake River reach gain.
- Determination of the likely structure and administrative requirements for new groundwater right with recharge mitigation.
- Evaluation of any other constraints or concerns that may affect the project

2. Regulatory Framework

Any recharge plan or mitigation plan must be approved by the Idaho Department of Water Resources and is subject to the statutory constraints imposed for the appropriation of new permits and approval of water right transfers, and by the conjunctive management rules. Each mitigation plan is evaluated on a case-by-case basis and the rules allow a considerable amount of discretion to determine whether the criteria are adequately met. In general, the considerations that IDWR evaluates include:

- The quantity of mitigation water must be sufficient to replace the use to mitigated, and the water right used for mitigation must come from valid rights authorizing sufficient consumptive use.

- The seasonal timing of the proposed mitigation must be such that adverse net impacts are avoided.

- In terms of mitigating for impacts on the Snake River, which is the primary objective in this case, the proposed plan must not result in a net depletion of any reach of the Snake River, calculated using the ESPA groundwater model.

- The proposed plan should consider the impacts on local groundwater levels. Ideally, no adverse impact on groundwater levels should occur, although it may not be necessary to strictly meet this criteria and each case is evaluated on its merits.

- Ancillary considerations related to the "local public interest" are also evaluated, such as protection of groundwater quality, avoidance of water-related nuisances, etc.

3. Existing City Water Rights

Groundwater rights held by the City are described in Table 1. These rights are diverted from three wells and pumped to the pressurized distribution system. The rights have been decreed in the Snake River Basin Adjudication and are therefore valid for use within the City's service area for any water use fall under the umbrella of "municipal" use. This includes domestic in-house use, residential irrigation, commercial, and industrial. In addition, neither of the rights have any restriction regarding irrigation of non-residential parcels. Therefore, they can be used to irrigate large tracts such as schools, parks, and cemeteries.

Table 1. City of Gooding groundwater rights.

Right No.	Diversion Rate	Beneficial Use	Priority Date
37-4080	2.8 cfs (1,257 gpm)	Municipal	9/28/1928
37-11221	5.9 cfs (2,648 gpm)	Municipal	4/20/1977
Combined limit	7.05 cfs (3,164 gpm)		

Surface water rights held by the City are described in Table 2. All rights are diverted from the Little Wood River at one of five diversions.

Table 2. City of Gooding surface water rights.

	Right No.	Diversion Rate	Beneficial Use	Priority Date
Group 1: 207 acre limit	37-709A	0.74 cfs	Irrigation	2/22/1883
	37-960A	0.57 cfs	Irrigation	4/1/1883
	37-262A	3.16 cfs	Irrigation	2/22/1883
Group 2: 331 acre and 1070.6 ac-ft limit	37-271A	0.32 cfs	Irrigation	6/30/1882
	37-282	1.00 cfs	Irrigation	4/1/1877
	37-662	1.42 cfs	Irrigation	6/15/1885
Canal shares	n/a	143.64 shares 1.8 cfs	Irrigation	
Total authorized diversion rate		9.01 cfs		

The rights are structured as two groups, each with a combined-acre limit. The total allowable irrigation is the sum of the acres under the two groups, or 538 acres. In addition, Group 2 is subject to an annual volume limit of 1070.6 acre-feet which was placed on the rights in a transfer in the 1990s. No combined-use restriction on diversion rate exists, so the total authorized diversion from the Little Wood River is the sum of the individual flow rates, or 7.21 cfs. Canal shares in the Big Wood Canal Company and American Falls Reservoir District No. 2 provide an additional 1.8 cfs to the total authorized diversion rate. No acres are directly associated with the shares, but typically 1 share per acre is assumed. The total diversion rate is therefore 9.01 cfs.

All of the surface water rights are authorized for irrigation only. No other beneficial use such as recharge would be allowed by IDWR unless the water rights were accepted for use in an approved mitigation plan. Thus, the rights may be used directly for irrigation at this time, but authorization is required by IDWR to utilize them to any extent in a mitigation plan. Administrative requirements to effect this authorization are described in Section 12.

4. Current City Water Usage

a. Groundwater

Records of groundwater pumping were obtained from City staff for the period January 2008 through July 2012. Three wells were utilized during this period, with the primary source being the 4th Avenue Well. All data is provided in Appendix A and the pumping volumes are summarized in Table 3.

Table 3. Summary of annual groundwater diversions by the City of Gooding. Values are total volumes in acre feet.

Year	4th Ave	13th Ave	Senior Ave	TOTAL
2008	543.4	152.3	302.1	997.8
2009	448.1	38.2	486.2	972.4
2010	772.1	1.3	240.1	1013.6
2011	633.9	6.9	385.5	1026.3
Average	599.4 (60%)	49.7 (5%)	353.5 (35%)	1002.6

Annual pumping volume has been relatively stable but has increased 3% since 2008. On average, the 4th Avenue Well has supplied 60% of the total demand. The 13th Avenue Well supplies only 5% of the total, with 35% being supplied by the Senior Avenue Well.

Monthly distribution of groundwater pumping is important to determine for purposes of modeling the proposed recharge and withdrawal scenarios. Pumping records were analyzed to determine monthly diversions from all wells. Baseline non-irrigation demand was assumed to be the average demand from January through March and is equal to 45.9 ac-ft/month or 551 ac-ft/year, which is 55% of the total annual pumping. Irrigation usage is the difference between the baseline value, assumed to be constant throughout the year, and the actual recorded diversion. The monthly distribution of pumping is shown in Table 4 and Figure 2.

Table 4. Monthly groundwater pumping in acre-feet.

Month	Year				Average Total	Irrigation Usage
	2008	2009	2010	2011		
January	35.0	49.2	48.9	49.6	45.7	0.0
February	48.0	41.3	48.5	43.8	45.4	0.0
March	45.5	44.2	50.9	46.5	46.8	0.0
April	55.3	54.6	58.3	47.4	53.9	8.0
May	104.8	102.3	90.2	71.3	92.1	46.2
June	130.0	98.9	119.5	129.9	119.6	73.7
July	171.0	168.5	168.2	178.5	171.5	125.6
August	140.9	140.7	151.5	168.2	150.4	104.5
September	122.7	115.8	112.2	124.1	118.7	72.8
October	54.7	58.5	70.2	67.8	62.8	16.9
November	61.4	50.5	67.7	48.6	57.1	11.2
December	28.6	47.8	27.5	50.5	38.6	0.0

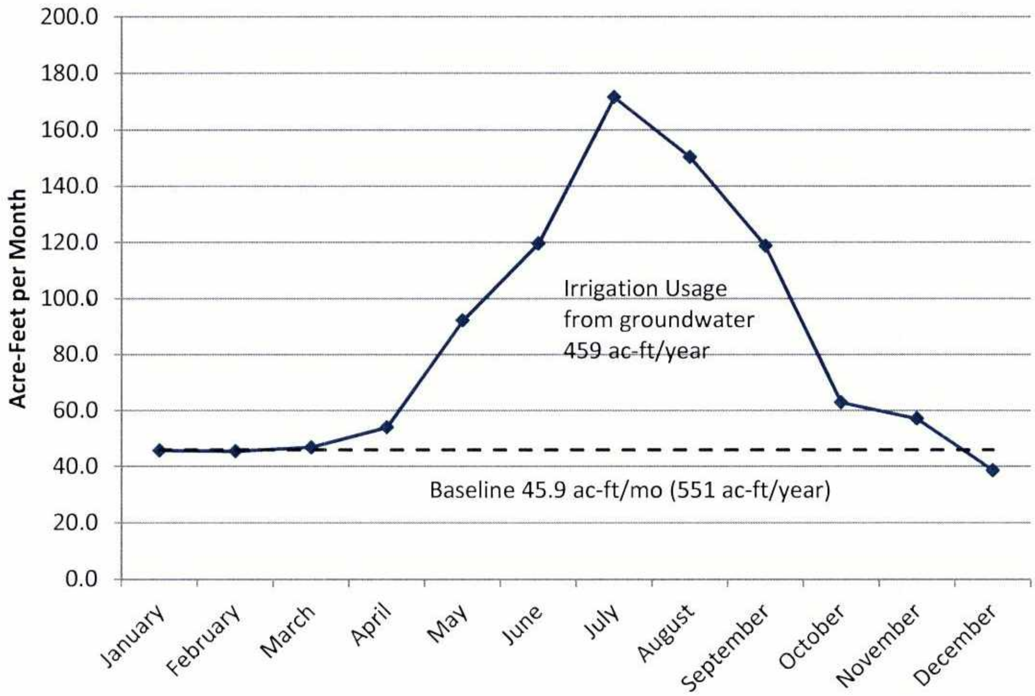


Figure 2. Monthly distribution of groundwater pumping.

b. Surface Water

Surface water is diverted from the Little Wood River at five locations and diversions are measured and recorded by the Watermaster of District 37M. Records of diversions were obtained for the years 2001 through 2011; the 2012 annual report from the watermaster was not complete at the time of this writing. Annual total diversions are summarized in Table 5.

Table 5. Annual surface water diversions from the Little Wood River in acre-feet.

Year	95-P1 City Pump	95-P Jr High	96 Woodworth	96-P Main St	97-P Nevada	Total	Peak CFS
2001	No data	168	1801	125	202	2296	10.3
2002	No data	71	2411	48	101	2631	15.0
2003	558	32	1533	93	91	2307	16.8
2004	756	44	1097	73	24	1994	12.8
2005	1161	77	1301	16	10	2565	11.1
2006	1204	105	1747	17	8	3081	13.6
2007	1198	74	1440	24	20	2756	11.4
2008	1125	85	1374	12	24	2620	11.0
2009	1549	28	1469	16	7	3069	12.5
2010	1181	80	974	13	23	2271	9.4
2011	1264	107	1354	11	29	2765	11.0
					Average	2578	
					Max	3081	
					Min	1994	

Diversions from the river have remained relatively consistent, with the average for years 2003 through 2011 being 2,603 acre-feet. The maximum annual total occurred in 2006 and the minimum occurred in 2004. The peak diversion rate has equaled or exceeded the rate authorized by the water rights and canal shares in every year.

Based on this data it is concluded that the surface rights have been utilized fully on a continuous basis in the recent past. This data should mitigate concerns which may arise relative to the validity of the irrigation rights for use in a recharge mitigation plan.

5. Reliability of Surface Rights

An important determinant of the feasibility of a recharge plan is the reliability of the surface rights to supply the required mitigation volume on a consistent basis. Rights with early priority dates will be subject to a priority cut later in the year, if at all, and can therefore provide a reliable source of recharge water for a longer period. To evaluate this factor, an analysis was made of the historic cutoff dates of the City's surface water rights. Data on priority cuts was available from the watermaster for the years 1948 through 2012; the results of the analysis are shown in Table 6.

Table 6. Priority cuts on the City's surface water rights.

Water right priority date	4/1/1877	6/30/1882	2/22/1883	4/1/1883	6/15/1885
No. years record	64	64	64	64	64
% of years cut	0%	0%	0%	3%	28%
Earliest cutoff date	Never	Never	Never	21-Jun	29-Apr

This analysis demonstrates that the City's surface water rights are extremely reliable. The three earliest-priority rights have never been cut. The two later-priority rights have been cut only 3% and 28% of the years, respectively. Further, even if these two rights were unavailable, the earliest-priority rights could supply 5.52 cfs and all of the required recharge volume. The analysis does not include additional volume supplied by the Big Wood Canal Company share and AFRD #2 shares. The available supply under the shares depends on water supply conditions in the Big Wood River and upper Snake River and the storage fill in the reservoir system. Generally, the shares are reasonably reliable but in years when the reservoir(s) do not fill, may be cut back to some percentage of the face value.

The conclusion of this analysis and the analysis described in Section 5 is that the City's surface rights are highly reliable and can provide more than an adequate supply for the proposed recharge plan.

6. Groundwater Pumping Requirements and Aquifer Depletion with Proposed Project

If the proposed recharge plan is implemented, all of the irrigation water supply will be provided by the potable system and supplied by groundwater pumping. The objective of the recharge plan will be to fully mitigate the depletion of the aquifer by replacing it with infiltrated surface water. The total aquifer withdrawal required to be provided by the wells and the net withdrawal (depletion) of the aquifer is a direct function of the irrigated area served by the system.

a. Irrigated Area

No measurement or estimate of irrigated area within the City was readily available for this study. Therefore, an estimate was made using GIS methods and the latest hi-resolution aerial photo from 2011 provided by the USDA-Farm Service Agency. While large tracts such as parks can be delineated directly from the aerial photo, it is not reasonably feasible to delineate each and every residential irrigated area. Therefore, the following methodology was utilized:

1. Delineate every large tract irrigation directly.
2. Using Gooding County tax parcel data, divide the residential lots into three size categories: 0 to 0.25 acres, 0.25 to 0.5 acres, and greater than 0.5 acres.
3. Select five representative lots within each of the three categories, delineate the irrigated area for each individual lot, and calculate an average for each category.
4. Multiply by the number of lots in each category to estimate the total residential irrigated area.
5. Add the large tract irrigation to estimate the overall total.

Using this method, the irrigated area was calculated to be 190.6 acres for residential lots, and 51.8 acres for large tracts, with an overall total of 242.4 acres.

b. Monthly Water Demand

The monthly water requirement for irrigation usage with the recharge project in place was calculated using monthly crop consumptive use data from Allen & Robison (2012), which is the standard reference used and accepted by IDWR. A crop of turfgrass was assumed. There is no station at Gooding in the Allen & Robison study; therefore the two nearest stations (Bliss and Shoshone) were combined using a distance-weighted average to the center of the City of Gooding.

All irrigation throughout the city was assumed to occur by sprinkler methods. The efficiency of the irrigation is defined as

$$E = P_{def} / V_{app}$$

Where P_{def} is the precipitation deficit as defined in Allen & Robison (2012), essentially equal to the consumptive demand of the crop which is supplied by the irrigation water in excess of that supplied by precipitation, and V_{app} is the volume of irrigation water actually applied.

Residential sprinkler irrigation is generally less efficient than agricultural irrigation, but values typically range from 0.60 to 0.75. Large tract irrigation, which is managed by experienced city staff, will likely have a higher efficiency but not greater than 0.8. An overall irrigation efficiency of 0.7 was assumed for the entire City.

Water applied in excess of the crop requirement (a result of the irrigation efficiency being less than 100%) will return to the aquifer via irrigation recharge. This amount is important since it will provide a benefit to the aquifer and a reduction in the amount of recharge that must be accomplished.

Calculations for the monthly analysis are provided in Appendix A, and the results are summarized in Table 7.

Table 7. Monthly irrigation and total water demands.

Month	Crop Pdef (ac-ft)	Irrigation Div. Reqm't (ac-ft)	Irrigation Recharge (ac-ft)	Baseline Potable (ac-ft)	Total Well Pumping (ac-ft)
January	0	0	0	46.6	46.6
February	0	0	0	42.1	42.1
March	0	0	0	46.6	46.6
April	53.8	76.8	23.0	45.1	121.9
May	119.9	171.2	51.4	46.6	217.8
June	146.2	208.8	62.7	45.1	253.9
July	180.2	257.4	77.2	46.6	304.0
August	157.2	224.6	67.4	46.6	271.2
September	111.2	158.8	47.6	45.1	203.9
October	59.3	84.7	25.4	46.6	131.2
November	0	0	0	45.1	45.1
December	0	0	0	46.6	46.6
Total	**827.7**	**1182.4**	**354.7**	**548.5**	**1730.9**

The total estimated pump-out with the project will be 1730.9 ac-feet, which is a 73% increase over the present average groundwater withdrawal. The values in Table 7 represent current conditions. Increases in population over the City's planning horizon will increase these numbers proportionately.

c. Peak Demand Estimation

Implementation of the aquifer recharge and withdrawal project will also increase the City's peak demand from the groundwater wells. The peak monthly demand occurs in July, and is equal to 257.4 ac-ft for irrigation and 46.6 ac-ft for in-house. In terms of a flow rate, these values equate to 1,879 gpm and 340 gpm for a total peak monthly demand of 2,219 gpm. To convert from a peak monthly to a peak day demand, a multiplier of 1.46 was used, which was calculated from the observed pumping pattern derived from the data provided by the City. Using this multiplier, the peak day demand would be 3,240 gpm (7.22 cfs). Current maximum day demand is 1,900 gpm, so the project will result in a 71% increase in required well capacity at current population. The anticipated peak day demand is slightly greater than the existing groundwater right authorization of 3,164 gpm, and the peak instantaneous diversion rate will be greater than the peak day demand. Also, with growth in population these demands will increase proportionately. Therefore, an additional groundwater appropriation must be sought.

7. Managed Recharge Concept

a. Diversion System and Measurement

An existing diversion from the Little Wood River is the proposed point of diversion for the project. The location of the diversion is about 4.5 miles east of the City as shown on Figure 1. At this point, a concrete structure is in place which was constructed by the Corps of Engineers several decades ago as part of a flood control system. Under an agreement with the Corps, the City of Gooding maintains this structure.

The diversion system consists of a 3-bay concrete check structure across the stream channel of the Little Wood River, with the two outer bays being check board devices and the center bay containing a hydraulically-actuated sluice gate. The check board bays are normally obstructed and the gate is utilized to maintain a relatively constant head in the channel under various discharges. A second concrete structure forms the entrance to a man-made channel on the north side of the river. This structure contains three 6-foot manually-operated headgates. The concrete of both structures appears to be in good condition. The structures are protected from erosion with wingwalls adequately keyed into the channel banks, and are stable. With ongoing maintenance, this diversion is adequate will allow the City's water rights to be safely diverted from the Little Wood River.

The recharge plan will require measurement of the diversion to recharge, including instantaneous flow rate and total volume. At present, no means of effecting an accurate measurement is in place. One option would be to construct a separate headgate and flow measurement device directly adjacent to the existing headgate structure. Water diverted to this new structure would be exclusively for recharge, and would re-enter the man-made channel a short distance downstream from the headgae. Adequate space exists on the north side of the channel to construct this device. The flow measurement is recommended to be made by a ramped broad-crested weir, which provides both accuracy and sediment-passing characteristics than sharp-crested weirs. A double-orifice gate device may also be a possibility, although these devices are considerably less accurate than a weir. The device would need to be equipped with a stilling well, level sensor, and continuous data recorder.

a. Recharge Location

From the river diversion described above, a man-made channel, also constructed by the Corps of Engineers, runs west-northwest for approximately 0.7 miles where it joins a natural channel in the basalt flows northeast of the City. The basalt channel extends approximately 2.8 miles, running generally westerly. Historically, this channel has carried flood flows diverted at the structure described above in order to relieve water levels downstream through the City of Gooding. The City has historically managed this diversion using informal operating criteria.

b. Infiltration Rate

A site inspection of the recharge area was made on October 24, 2012. The channel is well-defined, sometimes running directly on basalt and sometimes exhibiting fine-grained depositionary structure in reaches with lower slopes and slower velocities. Numerous areas where water can infiltrate exist. Abundant anecdotal evidence exists based on the City's management of the flood control system that the entire basalt channel may easily lose 30 to 40 cfs along its length. Thus, a controlled seepage test was not deemed necessary to verify that the City's surface right diversion of 9.01 cfs could be infiltrated. This amount will likely sink within the first third of the basalt channel.

c. Withdrawal Mechanism

Recovery of the recharged water will be effected by the City's existing three wells and up to three (3) new wells. Water entering the aquifer from the recharge site will cause the formation of a recharge "mound," the magnitude of which is greatest directly beneath the recharge site and which decreases with distance from the site. After recharge ceases, the mound begins to dissipate and also is conveyed down-gradient along with the ambient groundwater flow. Wells completed in the aquifer in the path of the mound can potentially withdraw the water stored in the recharge mound without negatively affecting surrounding water levels. Putting the water in the aquifer is similar to storing it in a large reservoir, but some of the recharged water may escape the influence of the wells as it moves down-gradient. Hence, it is usually not possible to recovery 100% of the recharged water. The combined effect of recharge and withdrawal is the subject of the groundwater modeling presented in Sections 9 and 10.

8. Monthly Water Balance for Groundwater Modeling

As described below, groundwater modeling was performed to assess the net effect of the proposed plan. The models require monthly inputs for well withdrawal, recharge, and irrigation infiltration within the City.

The wells are assumed to withdraw the irrigation water requirement as shown in Table 7 plus the baseline in-house demand each month. This withdrawal is the same for all model scenarios. It is assumed that the City will drill three (3) additional wells for a total of six (6) withdrawal locations. Locations of the new wells were based on City staff determinations of the most likely locations.

The volume of recharge was varied in the modeling to assess the effects of different amounts of recharge. To replace only the aquifer depletion would require that the recharge volume equal the consumptive use of the irrigation and potable usage within the City. However, two factors argue for a recharging a larger volume: 1) consumptive use cannot be directly measured whereas well withdrawal can, so it is operationally much simpler to merely ensure that the recharge equals or exceeds the actual well withdrawal each year; 2) additional recharge may be required to meet hydrologic criteria for impacts on the Snake River, as described in Section 9.

The length of the recharge season, i.e. how quickly the water is to be infiltrated, was also varied. It would physically be possible to recharge all of the required water over a short period of time early in the season. However this could result in a mound which has dissipated too much during the peak pumping period in July and August. Alternatively, the recharge could be spread out more evenly over the irrigation season.

The following model scenarios were developed and analyzed.

Scenario 1: In this scenario, the recharge volume is distributed over the entire irrigation season with the monthly distribution shown in Table 7.

Scenario 2: In this scenario, the recharge occurs at a faster rate over a 60-day time period in May and June.

For both scenarios, the initial trial value for annual recharge volume was equal to the well withdrawal or 1730.9 ac-ft (Table 7). The recharge volume was increased as needed to meet IDWR criteria for net impact.

9. Groundwater Modeling – Regional Effect on Snake River

a. Purpose of Model

Regional model was performed using the ESPA Model version 1.1. This model was developed by IDWR and is utilized to assess the effect of water right transfers, groundwater curtailments, recharge projects, mitigation plans and other "stresses" on the aquifer. A detailed description of the model is beyond the scope of this report, but additional information is available upon request.

The primary use of the model is to estimate the effect of an activity on the "reach gain" in the Snake River. IDWR's criteria for evaluating a water right transfer or a mitigation plan is that no reach of Snake River may experience a net decline in reach gain. If the model indicates that the reach gain in one or more reaches will decline, even if the reach gain in other reaches will increase, the project must be restructured or mitigation provided in order to meet this criteria.

b. Model findings

The model was run for scenarios 1 and 2 described above with an annual recharge of 1730.9 ac-ft. With Scenario 1, it was found that a short-term net impact occurred in one reach – the Malad to Bancroft reach. This was true even though the long-term impact was positive in all reaches. In order to eliminate the one negative effect, two modifications were made: 1) the recharge volume was increased, and 2) the increased pumping was delayed by two years after the recharge started. With this changes, the minimum required recharge volume was found to be 1,919 ac-ft/year. Similarly, the required recharge volume for Scenario 2 (the 60-day recharge) was found to be 2,857 ac-ft/year. Plots representing output from the model are provided in Appendix B.

The ESPA model results indicate that a recharge volume greater than the actual well withdrawal may be necessary to satisfy IDWR criteria for Snake River reach gain impacts. The surface rights are adequate to provide the higher recharge values.

This analysis is believed to be conservative, because there may be an avenue by which IDWR could allow a small increase in depletion. For "traditional" transfers in the ESPA, IDWR recognizes the uncertainties inherent in any groundwater model and allows an increase in reach gain impact of up to 5% of the transferred volume or 2 ac-ft per trimester. However, the proposal for the City of Gooding is not a traditional transfer and IDWR is not able to determine at this time exactly what criteria may apply. If some leeway could be given, the recharge could potentially be equal to the actual well withdrawal of 1,731 ac-ft, or even only the consumptive depletion of 1376.1 ac-ft. The model-predicted value of 1,919 ac-ft is therefore a reasonable upper limit on the required recharge to ensure that full mitigation is provided in terms of protecting Snake River reach gains.

10. Groundwater Modeling – Localized Effect

a. Purpose of Model

The ESPA model was designed to simulate large-scale regional effects and reach gain changes. It is not capable of simulating the effects of a recharge-withdrawal project on the local water levels in the aquifer. Therefore, a small-scale numerical groundwater model was developed to predict the transient behavior of the aquifer due to the recharge project. The model was developed using MODFLOW, a three-dimensional groundwater model used extensively by private consultants and state agencies, including IDWR. This is the same code used for the ESPA model.

The model was necessary to determine the extent, magnitude, and propagation behavior of the recharge mound in conjunction with the withdrawal at the City wells. The model will predict the net effect at any point in the aquifer at any time. The model can also predict whether surrounding domestic or irrigation wells would be adversely impacted by the project.

b. Description of Model

The model was configured using the graphical interface GMS v. 7.1. The computational domain of the model was defined as shown in Figures 3 and 4. Cell size was chosen to be 200 x 200 feet to provide relatively fine detail at a local scale. The domain was oriented to reflect the direction of groundwater flow from northeast to southwest based on groundwater contours generated by the ESPA model, and the boundaries were located sufficient distance from the recharge and the wells so that the net effect at the boundaries was negligible. The up-gradient and down-gradient boundaries were set as constant head. The model was run in transient mode with a 15-day time step and monthly stress periods.

Aquifer hydraulic parameters within the model domain (transmissivity and storativity), were assumed to be the same as the calibrated values in the ESPA model within the localized model domain. These represent the best available estimates of the hydraulic parameters on this scale, and result in a local-scale model that is consistent with the recognized ESPA model.

Recharge was assumed to occur within the first third of the basalt channel described in Section 7. Irrigation recharge was assumed to occur uniformly within the City of Gooding water service area in accordance with Table 7. Well withdrawal was assumed to occur at the three existing wells plus new wells at the most likely locations as identified by City staff, and with the monthly volumes in Table 7.

The recharge volumes determined in the ESPA model analysis were used for the localized modeling. However, it was assumed that the increased pumping begins in the same year as the commencement of recharge, rather than with a two-year delay as in the ESPA analysis. This assumption is conservative in terms of local aquifer impacts.

The objective of this model effort is to assess the change in aquifer water levels from the existing conditions, not necessarily the absolute value of water levels. In other words, since some level of aquifer depletion and drawdown is currently authorized by the City's existing water rights, the relevant question is: what will be the combined net effect of the proposed recharge and increased pumping? Ideally, the net change on water levels should be zero or positive, which would ensure that no localized negative effect of the project will occur. The "existing condition" case reflects current average monthly well pumping at each of the three existing wells, with distributed irrigation recharge occurring uniformly throughout the City, and no managed recharge occurring. Scenarios 1 and 2 represent increased well pumping in accordance with Table 7, the same distributed irrigation recharge as the existing conditions scenario, and managed recharge in the amount of 1,919 ac-ft and 2,857 ac-ft, respectively.

c. Results

The simulated effect of the project on aquifer water levels is depicted in Figures 3 and 4. These figures illustrate the transient water level change from the existing conditions case, i.e. the net effect of the project, at selected observation points. Seasonal fluctuations are evident due to the seasonal nature of both groundwater pumping and recharge. Equilibrium conditions are reached after approximately five years. Although some small negative values (typically less than 0.5 feet) are predicted, the average effect after the aquifer reaches equilibrium is positive at all points for both scenarios. For Scenario 2, because the recharge is of greater magnitude although shorter duration, greater positive impacts are predicted. The model simulation indicates that for both scenarios, the net effect within and up-gradient of the City is positive from 0.2 to 1.3 feet, with minimal impact occurring down-gradient of the City.

11. Potential Water Quality Concerns

Activities in which it is proposed to inject or recharge surface water to the aquifer can raise concerns regarding water quality. The Idaho Department of Environmental Quality is charged with administering the "groundwater rule," which is intended to prevent degradation of groundwater and authorize regulation of activities that are deemed to cause regulation. At present, IDEQ has no formal procedure for recognizing, evaluating, and administering aquifer recharge projects. In the most recent approved project – located in the Big Wood River valley, IDEQ essentially delegated the task of evaluating and protecting water quality to IDWR. In this case, IDWR required an evaluation of the water quality of the surface water sources, identification of potential receptor wells, and analysis of flow paths to ascertain the risk that receptor wells might be impacted. In addition, IDWR required that the recharge site be classified as a "shallow injection well" and subject to inclusion on the list of such sites in Idaho, but not necessarily any additional regulation associated with the listing. IDWR considered requiring dedicated monitoring wells, but ultimately determined that the risk of the activity was low and did not require any monitoring.

In the present case, a number of domestic wells are situated down-gradient of the proposed recharge site – chiefly along 1750 S and 1775 S roads. These wells are likely within the area of impact of the recharge and a flow line analysis would indicate that surface water could reach at least some of the wells. Therefore, it is recommended that the City propose, as a component of its recharge plan, monitoring of at least five strategically-selected domestic wells on a quarterly basis for at least 5 years after recharge commences. The wells and the water in the Little Wood River should be monitored for at least six months prior to the commencement of recharge to establish a baseline. Parameters to monitor should include nitrate-nitrogen and total coliform, at a minimum.

Based on historic use of the basalt channel for flood control purposes, recharge in amounts greater than proposed by the City have likely been occurring incidentally. A relatively small increase in volume will likely not result in detectable degradation of water quality in the aquifer.

It cannot be determined at this time precisely what IDWR may require in terms of water quality protection, as there are no established criteria and only a handful of similar cases to use as precedent.

12. Administrative Process, Requirements, and Risks

The proposed recharge project cannot take place unless authorized by IDWR through proper administrative mechanisms. IDWR has approved similar projects on a smaller scale, and current and past Directors have been clear that managed recharge is a reasonable method to conjunctively manage surface and groundwater recharge and protect the health of the aquifer. However, few managed recharge projects have been formally approved by IDWR. Because the project has little precedent, the administrative path is not precisely defined. Based on consultations with IDWR staff, the following steps are the most likely:

1. An application for new appropriation (permit) would be filed for additional well pumping to allow an increased diversion rate to meet peak demands, and increased annual volume.

2. As mitigation for the new permit, a companion transfer application would be filed to modify the City's surface irrigation rights to reflect Groundwater Recharge as the beneficial use, rather than Irrigation, and to change the point of diversion to the recharge diversion east of the City.

3. A formal mitigation plan would be prepared, including the engineering and modeling analysis included in this report, which would accompany the applications.

4. The mechanism for formal recognition of a mitigation plan for the City's existing groundwater rights is less straightforward. At this time, IDWR is not considering "individual" mitigation plans for current groundwater pumping impacts on the Snake River. Rather, all mitigation must be provided by the groundwater districts – in this case, the North Snake Groundwater District. A petition for a deviation from this policy could be made to the Director of IDWR to allow the City of Gooding to file its own mitigation plan. Alternatively, the mitigation could potentially be recognized internally within the groundwater district, so that whenever the NSGWD is required to mitigate pursuant to a water call or for some other reason, the City of Gooding would be exempted.

In reviewing the mitigation plan and the water right applications, IDWR will evaluate the validity of the surface rights for use in the proposed plan. This evaluation will include an investigation of usage in the past five years to determine whether all or part of any right is subject to forfeiture. As shown in Section 4, ample evidence exists that all of the rights have been diverted and used on the City in the last five years. However, IDWR may consider the estimated acreage irrigated in the City (242 acres) versus the allowable irrigation on the water rights (538 acres) as a basis for potential forfeiture. The potential for forfeiture is a risk to the project. To the extent the water rights are reduced by IDWR, the availability of water for recharge purposes would be reduced and may not be sufficient to meet the amounts described in this report. There are exceptions or defenses to forfeiture outlined in I.C. 42-223 which may apply to a municipal provider holding water rights for use by its members, or customers. The issue of forfeiture is as much a legal question as a technical one, and the City should consult with its legal counsel on this matter.

The permit and transfer applications must satisfy the statutory requirements for approval, the most important of which are the requirements that the water usage not be enlarged and that no other water user be injured. To allow the public to have adequate notice of the proposed water right changes, all administrative water right applications are advertised in the local newspaper twice. After the last advertisement, any party has ten (10) days in which to file a protest to the application. Because this project would involve proposals which are somewhat foreign to the public, the probability of a protest is significant.

If a protest is filed, processing of the application ceases. The typical process for handling a protest would include informal contact with the protestants to ascertain their concerns and determine whether their protest can be resolved outside of a hearing. If this effort is unsuccessful, IDWR will hold a pre-hearing conference in which attempts are again made to resolve the protests with the assistance of IDWR staff. If any protest remains, a hearing is held before an administrative hearing officer and the officer makes a determination on the disposition of the application.

13. Conclusions and Recommendations

Based on the data collection and analyses described in this report, the following conclusions were reached:

1. The recharge and withdrawal project as considered in this report appears to be feasible.

2. An adequate diversion system exists from the Little Wood River and can be modified to provide accurate flow measurement.

3. The proposed recharge area has adequate infiltration capacity to recharge all of the City's surface water rights.

4. Groundwater modeling of the Eastern Snake River Plan Aquifer indicates that a recharge volume of 1,919 ac-ft per irrigation season would be required to meet the most stringent anticipated IDWR criteria. If negotiations with IDWR result in less stringent criteria, the recharge volume could be equal to the well withdrawal of 1,731 ac-ft, or potentially as low as the consumptive volume of 1,376 ac-ft.

5. Available surface water supply is adequate. Existing surface rights held by the City are extremely reliable in terms of priority cutoff risk, and can provide the required

recharge volume based on the face value of the water right. The worth of the rights could be affected by IDWR evaluation of forfeiture or other aspects relating to historic use.

6. Localized groundwater modeling of transient aquifer level changes resulting from the project indicate a net positive average impact in the aquifer with minor seasonal negative impacts.

7. The City's current annual groundwater withdrawal is 1002.6 ac-ft. This would increase to 1731 ac-ft with the proposed recharge and withdrawal project.

8. The City's current maximum day demand is 1,900 gpm. This would increase to 3,240 gpm with the proposed project.

9. Additional wells will be required to meet peak day and peak instantaneous demands.

10. IDWR requirements for the project will include, at a minimum: a new appropriation to cover the increased groundwater pumping, a transfer of the City's surface water rights, and a formal mitigation plan including engineering analysis of the project and demonstration of no injury to other water rights.

11. Water quality concerns may arise in the course of permitting the project. IDEQ will likely be involved to review the project, but may delegate administration to IDWR. Monitoring of groundwater quality will likely be required and should be offered by the City as part of its mitigation plan.

If the City wishes to pursue the project, the recommended next step would be to prepare an Application for Permit and Application for Transfer, including a formal mitigation plan with technical analysis as required by IDWR. Prior to making the applications, the City should consult legal counsel on the issue of forfeiture and any other legal questions which may require analysis or resolution prior to application to IDWR. The City should prepare for the possibility of a protest and potentially an administrative hearing.

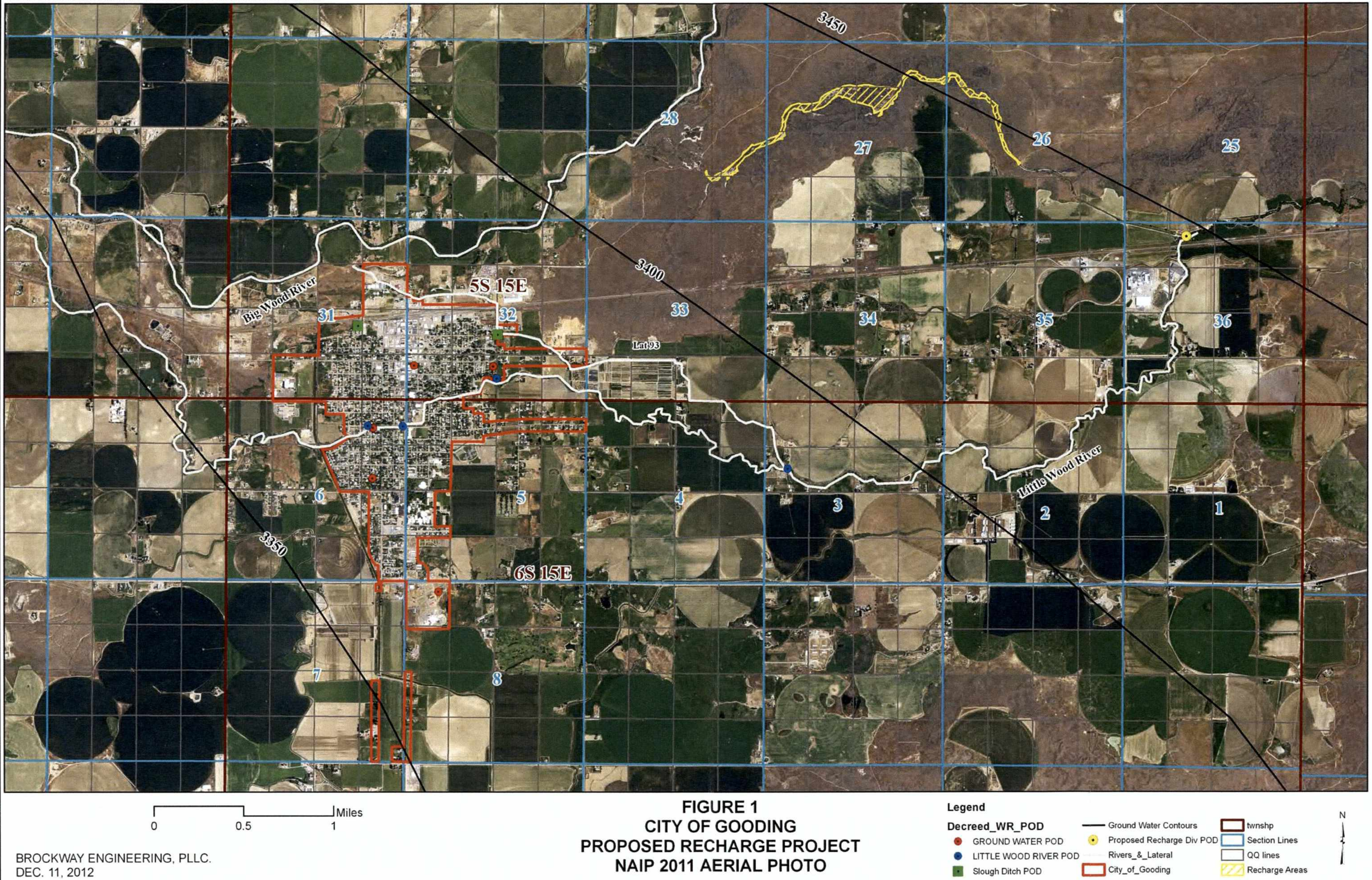
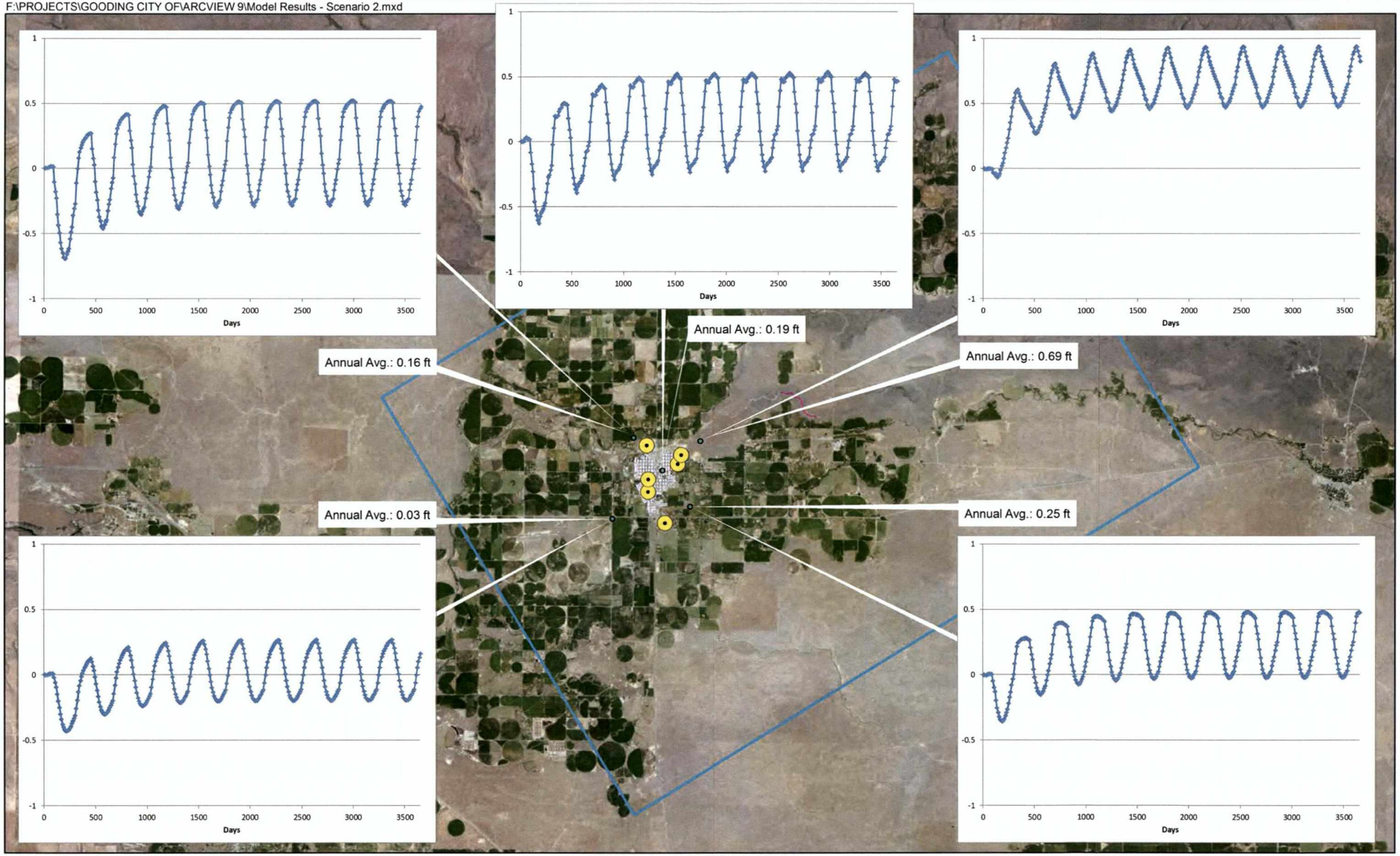


FIGURE 1
CITY OF GOODING
PROPOSED RECHARGE PROJECT
NAIP 2011 AERIAL PHOTO

BROCKWAY ENGINEERING, PLLC.
DEC. 11, 2012

F:\PROJECTS\GOODING CITY OF\ARCVIEW 9\Model Results - Scenario 2.mxd



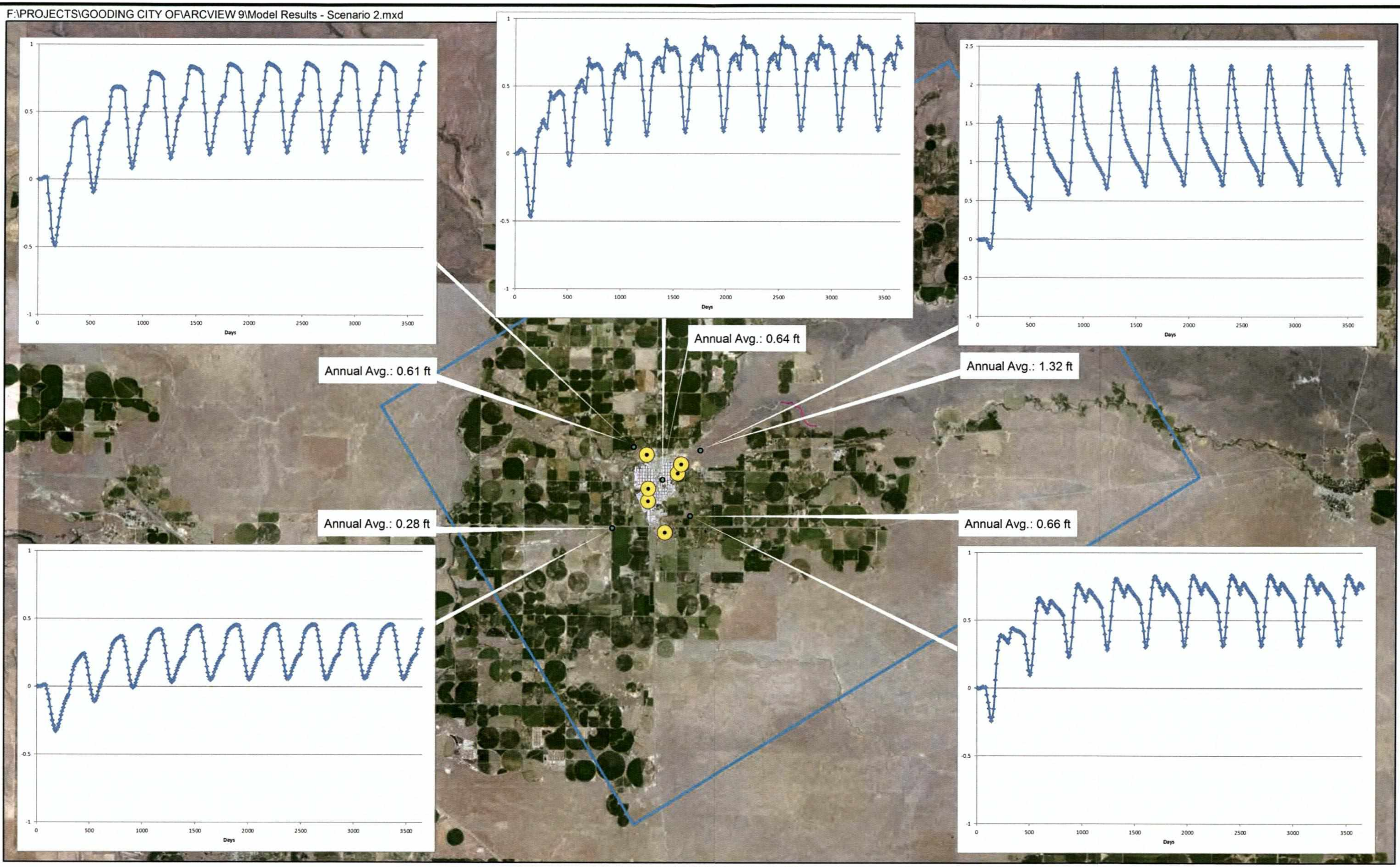
0 0.5 1 2 3 4 Miles

BROCKWAY ENGINEERING, PLLC
GEP - NOV. 26, 2012

FIGURE 3: CITY OF GOODING
MODIFIED ESPAM ANALYSIS: SCENARIO 1 - IRRIGATION SEASON RECHARGE OF 1918.6 AF/YR
10-YEAR TRANSIENT ANALYSIS OF SCENARIO 1 RECHARGE COMPARED TO EXISTING CITY WATER USE
BING AERIAL MAP

Legend
Observation Points
well
Recharge
Irrigation Recharge
Model Domain

N



BROCKWAY ENGINEERING, PLLC
GEP - NOV. 26, 2012

FIGURE 4: CITY OF GOODING
MODIFIED ESPAM ANALYSIS: SCENARIO 2 - PULSE RECHARGE IN MAY AND JUNE OF 2856.9 AF/YR
10-YEAR TRANSIENT ANALYSIS OF SCENARIO 2 RECHARGE COMPARED TO EXISTING CITY WATER USE
BING AERIAL MAP

Appendix A
Data and Calculations

City of Gooding Well Pumping Records from City

Brockway Engineering
GWS 10/2/2012

2008					
	4th Ave Well	13th Ave Well	Senior Ave Well	Monthly Average	Total Monthly
January	9992200	10000	1392800	3798333	11395000
February	5265300	0	10367900	5211067	15633200
March	7668200	246	7150900	4939782	14819346
April	14088000	0	3933800	6007267	18021800
May	20217200	1144000	12778900	11380033	34140100
June	23298500	10279000	8783600	14120367	42361100
July	27810600	19608000	8301800	18573467	55720400
August	20484900	13505000	11920200	15303367	45910100
September	19348700	1196000	19433800	13326167	39978500
October	10269500	1573000	5968800	5937100	17811300
November	9300200	2287000	8416100	6667767	20003300
December	9300200	30000	0	3110067	9330200
	177043500	49632246	98448600		**325,124,346** gallon/year
					997.77 Acre-Feet

2009					
	4th Ave Well	13th Ave Well	Senior Ave Well	Monthly Average	Total Monthly
January	11202200	3000	4821500	5342233	16026700
February	465500	360000	12630000	4485167	13455500
March	0	246	14416200	4805482	14416446
April	11625800	2000	6170100	5932633	17797900
May	26654100	3163000	3517200	11111433	33334300
June	22380900	1490000	8364900	10745267	32235800
July	32540000	0	22364200	18301400	54904200
August	14124800	3831000	27902500	15286100	45858300
September	8839300	3206000	25669700	12571667	37715000
October	15844000	20000	3212700	6358900	19076700
November	1157550	360000	14923600	5480383	16441150
December	1157550	0	14431600	5196383	15589150
	145991700	12435246	158424200		**316,851,146** gallon/year
					972.38 Acre-Feet

2010					
	4th Ave Well	13th Ave Well	Senior Ave Well	Monthly Average	Total Monthly
January	5258100	0	10659600	5305900	15917700
February	13649600	0	2138200	5262600	15787800
March	16569400	0	24300	5531233	16593700
April	17343500	367000	1287900	6332800	18998400
May	25771500	0	3617600	9796367	29389100
June	32093400	18000	6838600	12983333	38950000
July	32719600	45000	22028000	18264200	54792600
August	35602100	0	13766100	16456067	49368200
September	30509100	0	6044000	12184367	36553100
October	22359900	0	527500	7629133	22887400
November	10751000	0	11315400	7355467	22066400
December	8960300	0	0	2986767	8960300
	251587500	430000	78247200	110088233	**330,264,700** **gallon/year**
					1,013.54 **Acre-Feet**

2011					
	4th Ave Well	13th Ave Well	Senior Ave Well	Monthly Average	Total Monthly
January	7360500	0	8805400	5388633	16165900
February	11169000	0	3105300	4758100	14274300
March	7676600	0	7470400	5049000	15147000
April	8302200	0	7137500	5146567	15439700
May	10725100	10000	12487300	7740800	23222400
June	31331200	1000	11006500	14112900	42338700
July	32301100	80000	25784000	19388367	58165100
August	29974600	2170000	22674900	18273167	54819500
September	26290900	0	14150800	13480567	40441700
October	20496500	0	1606200	7367567	22102700
November	14780900	0	1066700	5282533	15847600
December	6143900	0	10300200	5481367	16444100
	206552500	2261000	125595200		**334,408,700** **gallon/year**
					1,026.26 **Acre-Feet**

2012					
	4th Ave Well	13th Ave Well	Senior Ave Well	Monthly Average	Total Monthly
January	794100	5000	9403400	3400833	10202500
February	1575800	0	1218500	931433	2794300
March	933100	0	8408500	3113867	9341600
April	1089900	64000	10034100	3729333	11188000
May	3727700	7000	8234100	3989600	11968800
June	3578500	0	14613300	6063933	18191800
July	0	0	0	0	0
August	0	0	0	0	0
September	0	0	0	0	0
October	0	0	0	0	0
November	0	0	0	0	0
December	0	0	0	0	0
					63,687,000 **gallon/year**
					195.45 **Acre-Feet**

City of Gooding
Consumptive Use and Diversion Requirement for Irrigation of all Lands within City from Potable System
CGB 10/22/2012

1. MONTHLY ET AND DIVERSION

Irrigated area	242	acres
Crop	Irrigated Turf	
Irrigation efficiency	0.7	(residential irrigation)

Month	Days	(mm/day)	Crop Pdef* (inches)	(ac-ft)	Irrig. Diversion Reqm't (inches)	(ac-ft)	Irrigation Recharge (ac-ft)	Baseline Potable (ac-ft)	Total Well Pumping (ac-ft)
April	30	2.26	2.67	53.8	3.81	76.8	23.0	45.1	121.9
May	31	4.87	5.94	119.9	8.49	171.2	51.4	46.6	217.8
June	30	6.14	7.25	146.2	10.36	208.8	62.7	45.1	253.9
July	31	7.32	8.94	180.2	12.77	257.4	77.2	46.6	304.0
August	31	6.39	7.80	157.2	11.14	224.6	67.4	46.6	271.2
September	30	4.67	5.51	111.2	7.87	158.8	47.6	45.1	203.9
October	31	2.41	2.94	59.3	4.20	84.7	25.4	46.6	131.2
		Totals	41.04	827.7	58.63	1182.4	354.7	321.6	1504.0
						4.89			

* Allen & Robison (2009), stations Bliss & Shoshone, distance-weighted average

2. PEAK DEMAND ESTIMATION - CURRENT POPULATION

Peak month irrigation demand	257.4 ac-ft	
	1879 gpm	
Baseline in-house demand	340 gpm or	46.6 ac-ft/month
Total peak month demand	2219 gpm	
Peak day : peak month factor, observed	1.46	
Estimated peak day demand	**3240 gpm**	

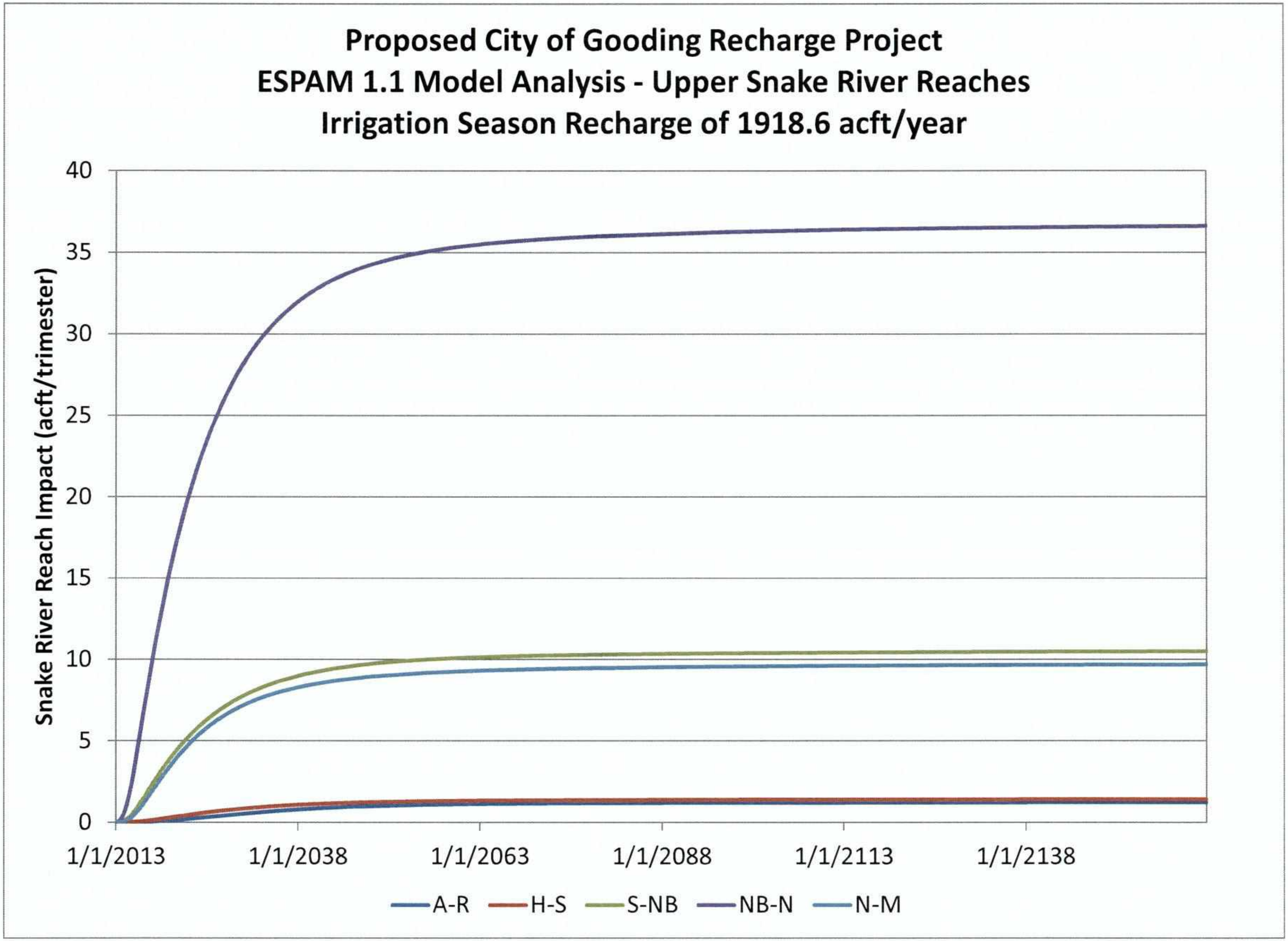
City of Gooding Recharge Model Scenarios with New Wells

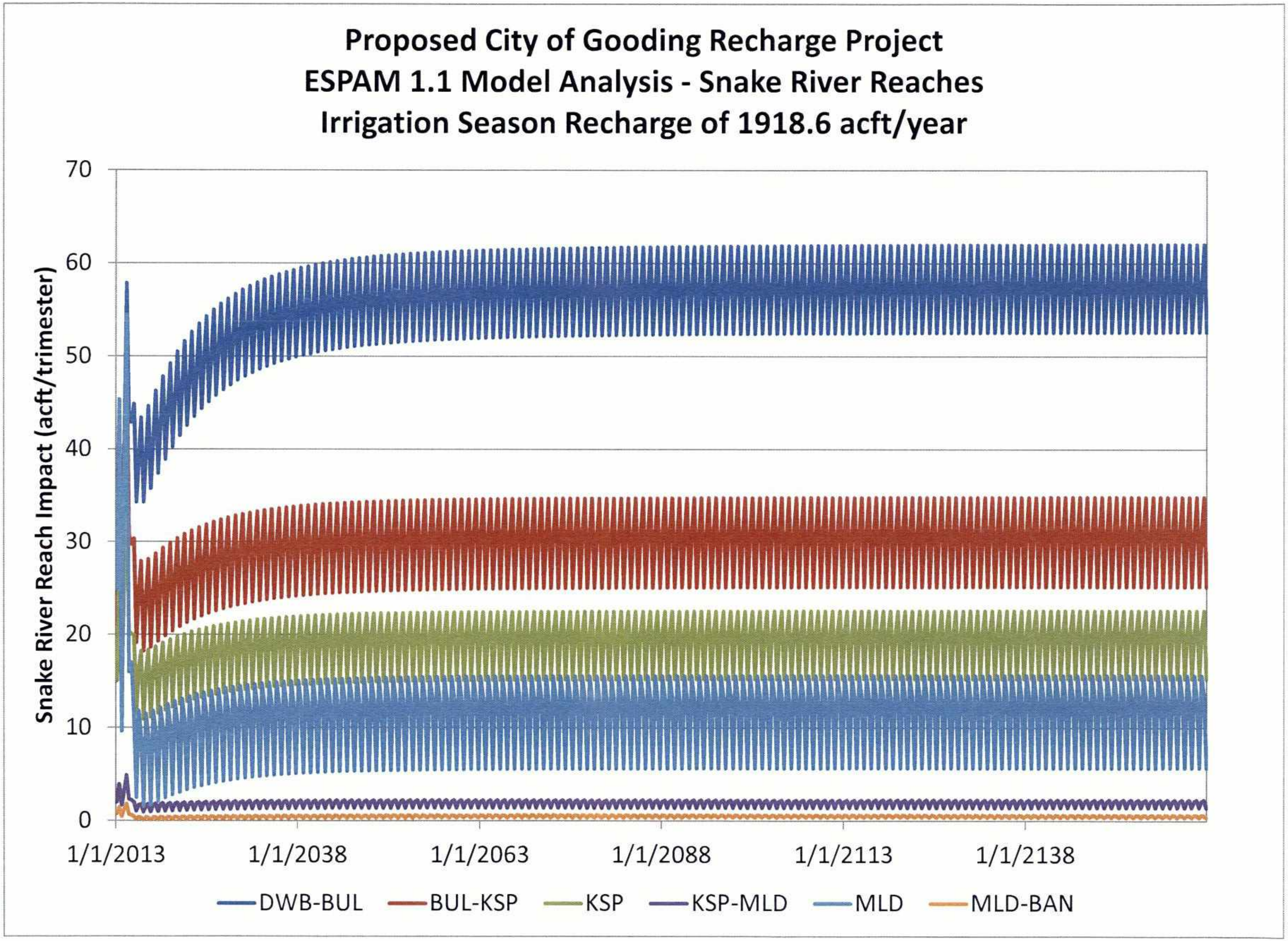
Entire city irrigation (242 acres) supplied by potable system.
Monthly irrigation demand based on IWR analysis using crop ET and efficiency (separate sheet).
Point withdrawals at each city well, distributed proportional according to current distribution.
Annual managed recharge volume equal to the actual gross projected well withdrawal including irrigation and the baseline potable water demand.
Distributed recharge from irrigation, evenly spread over the City; no recharge from in-house water.

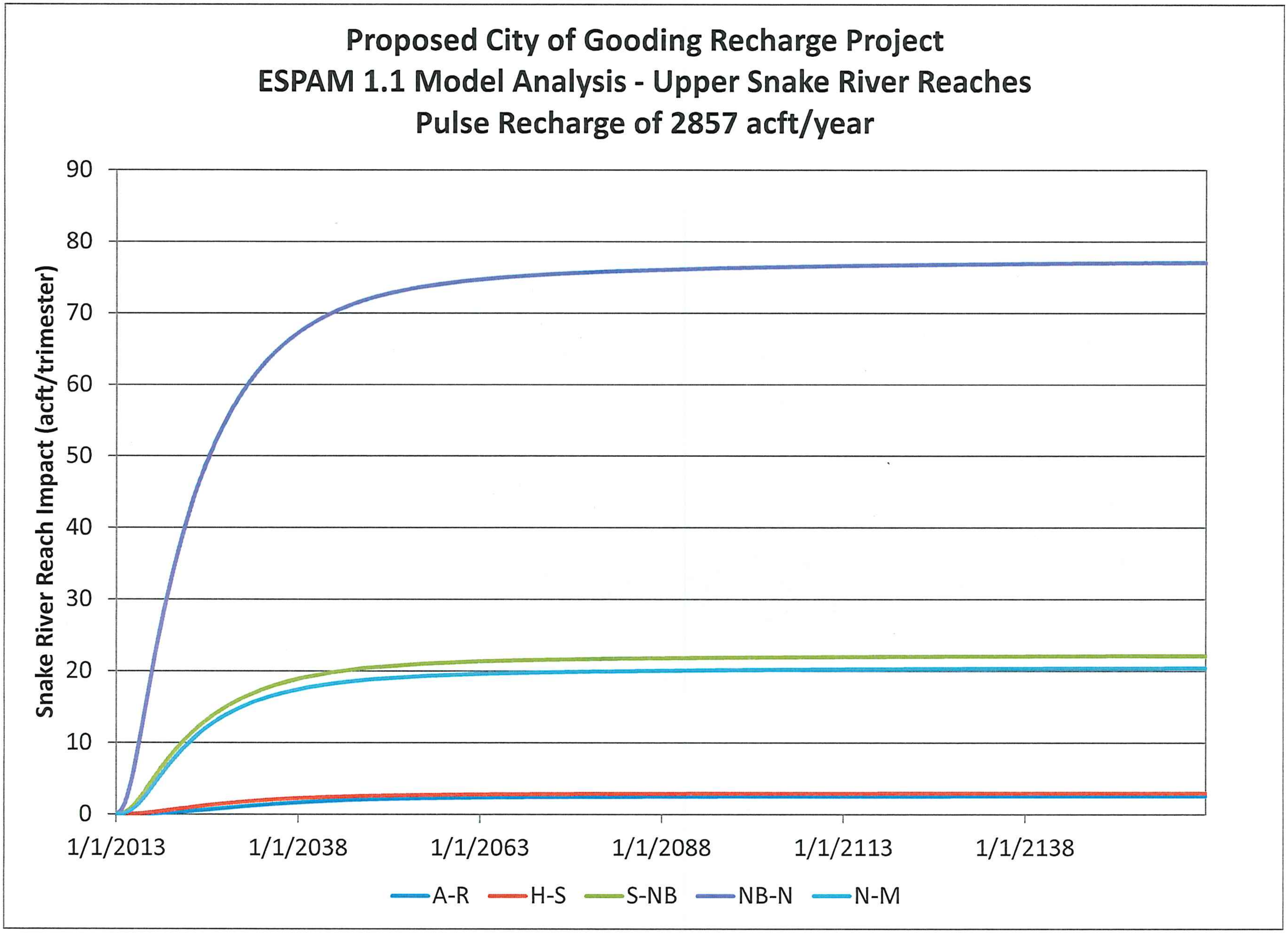
Scenario 1: Recharge spread over irrigation season to match monthly ET curve.
Scenario 2: Recharge early, May - June, at constant rate.

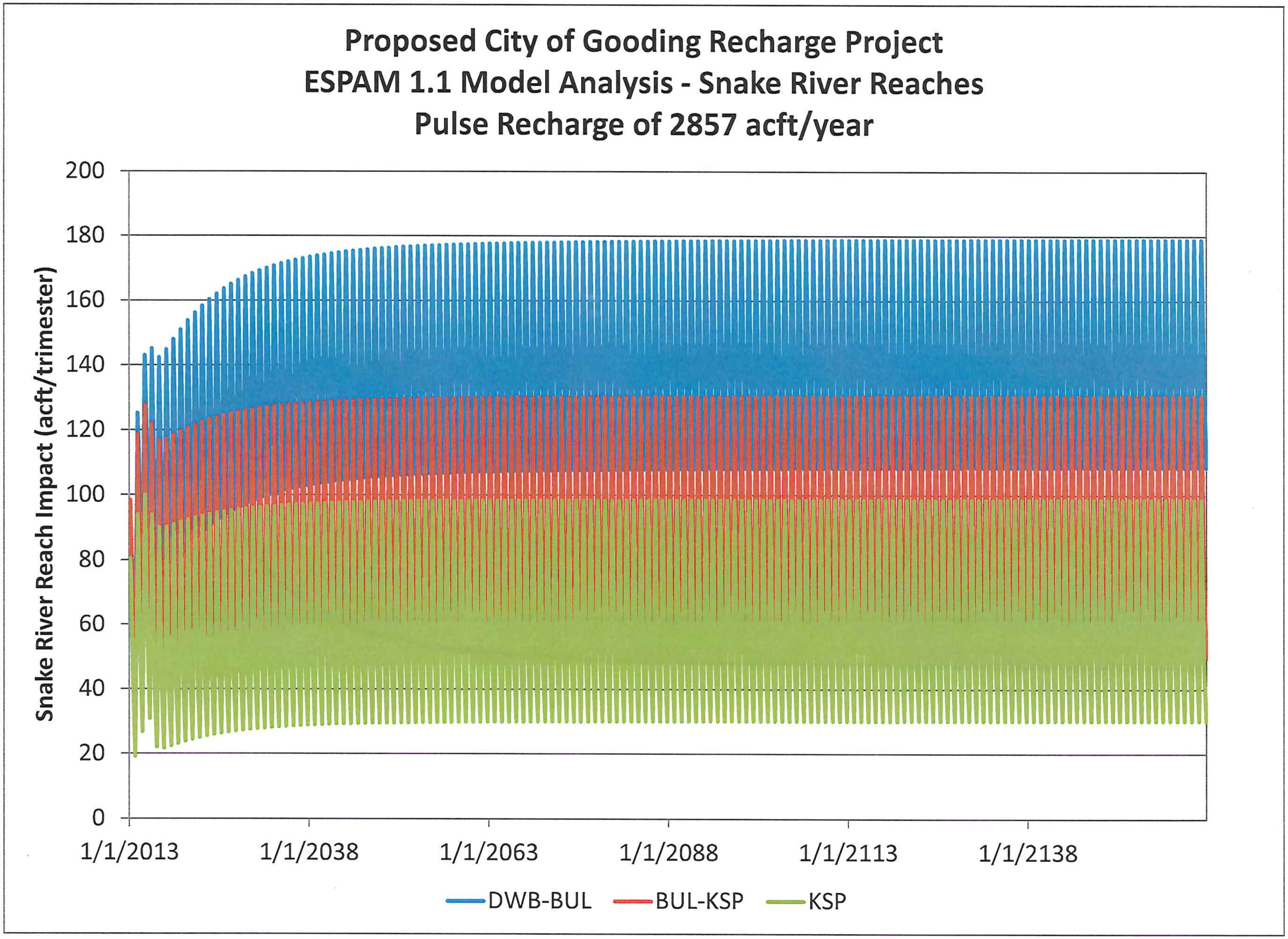
		City well pumping			Well pumping distribution							Managed Recharge	
					4th Ave	Senior Ave	13th Ave	No. 5	No. 6	No. 7	Irrigation		
Month	Days	Baseline	Irrigation	Total	60%	35%	5%	0%	0%	0%	Recharge	Scenario 1	Scenario 2
January	31	46.6	0.0	46.6	27.9	16.3	2.3	0.0	0.0	0.0	0.0	0.0	0.0
February	28	42.1	0.0	42.1	25.2	14.7	2.1	0.0	0.0	0.0	0.0	0.0	0.0
March	31	46.6	0.0	46.6	27.9	16.3	2.3	0.0	0.0	0.0	0.0	0.0	0.0
April	30	45.1	76.8	121.9	20.3	20.3	20.3	20.3	20.3	20.3	23.0	155.2	0.0
May	31	46.6	171.2	217.8	36.3	36.3	36.3	36.3	36.3	36.3	51.4	249.6	865.4
June	30	45.1	208.8	253.9	42.3	42.3	42.3	42.3	42.3	42.3	62.7	287.2	865.4
July	31	46.6	257.4	304.0	50.7	50.7	50.7	50.7	50.7	50.7	77.2	335.8	0.0
August	31	46.6	224.6	271.2	45.2	45.2	45.2	45.2	45.2	45.2	67.4	303.0	0.0
September	30	45.1	158.8	203.9	34.0	34.0	34.0	34.0	34.0	34.0	47.6	237.1	0.0
October	31	46.6	84.7	131.2	21.9	21.9	21.9	21.9	21.9	21.9	25.4	163.0	0.0
November	30	45.1	0.0	45.1	27.0	15.8	2.3	0.0	0.0	0.0	0.0	0.0	0.0
December	31	46.6	0.0	46.6	27.9	16.3	2.3	0.0	0.0	0.0	0.0	0.0	0.0
Total		548.5	1182.4	1730.9	386.8	330.1	262.0	250.7	250.7	250.7	354.7	1730.9	1730.9

Appendix B
ESPA Model Results


Proposed City of Gooding Recharge Project
ESPAM 1.1 Model Analysis - Upper Snake River Reaches
Irrigation Season Recharge of 1918.6 acft/year
Snake River Reach Impact (acft/trimester)
40
35
30
25
20
15
10
5
0
1/1/2013
1/1/2038
1/1/2063
1/1/2088
1/1/2113
1/1/2138
A-R
H-S
S-NB
NB-N
N-M

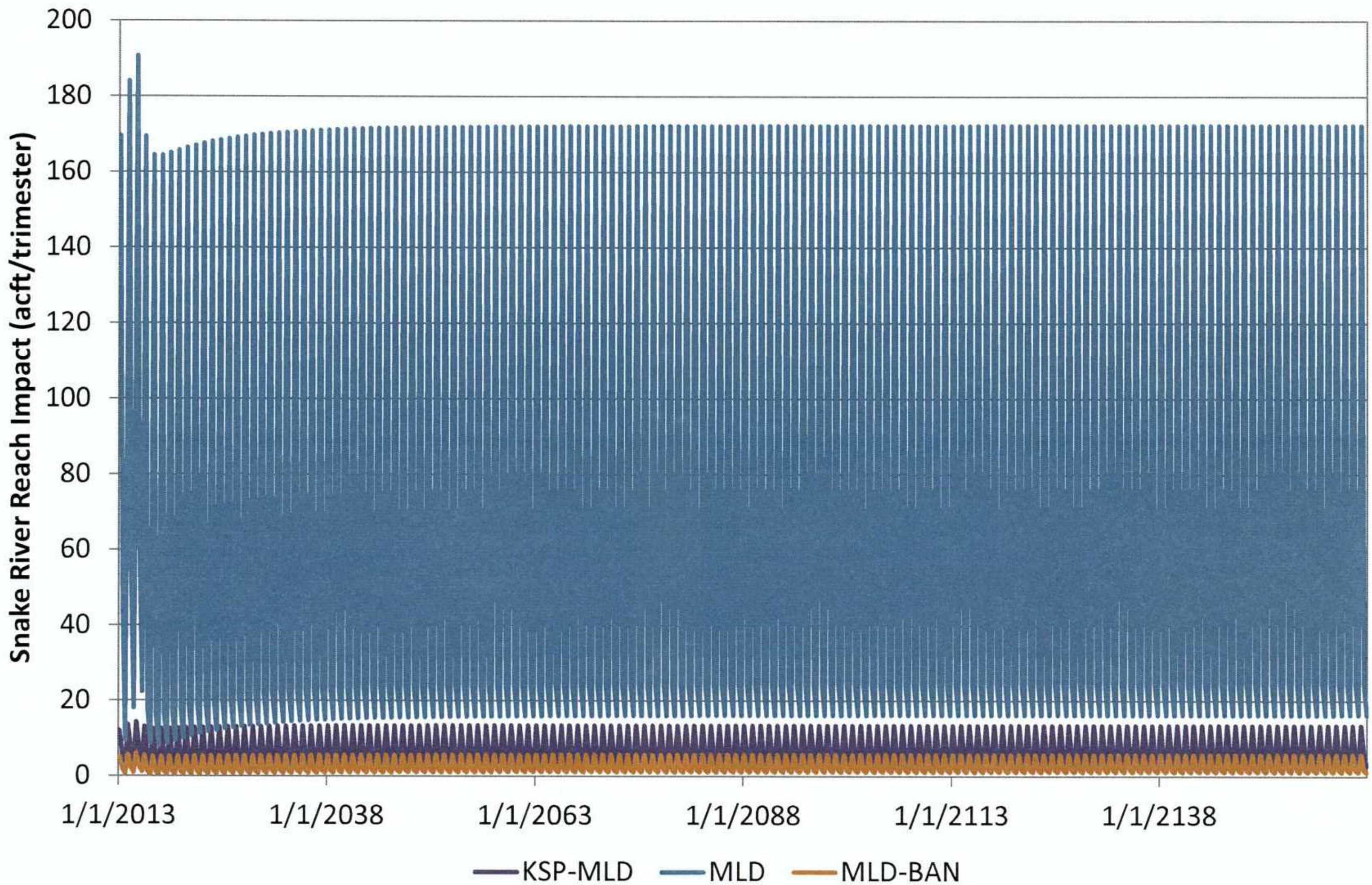

Proposed City of Gooding Recharge Project
ESPAM 1.1 Model Analysis - Snake River Reaches
Irrigation Season Recharge of 1918.6 acft/year
Snake River Reach Impact (acft/trimester)
70
60
50
40
30
20
10
0
1/1/2013
1/1/2038
1/1/2063
1/1/2088
1/1/2113
1/1/2138
DWB-BUL
BUL-KSP
KSP
KSP-MLD
MLD
MLD-BAN


Proposed City of Gooding Recharge Project
ESPAM 1.1 Model Analysis - Upper Snake River Reaches
Pulse Recharge of 2857 acft/year
Snake River Reach Impact (acft/trimester)
90
80
70
60
50
40
30
20
10
0
1/1/2013
1/1/2038
1/1/2063
1/1/2088
1/1/2113
1/1/2138
A-R
H-S
S-NB
NB-N
N-M



Proposed City of Gooding Recharge Project
ESPAM 1.1 Model Analysis - Snake River Reaches
Pulse Recharge of 2857 acft/year
Snake River Reach Impact (acft/trimester)
200
180
160
140
120
100
80
60
40
20
0
1/1/2013
1/1/2038
1/1/2063
1/1/2088
1/1/2113
1/1/2138
DWB-BUL
BUL-KSP
KSP

Proposed City of Gooding Recharge Project
ESPAM 1.1 Model Analysis - Snake River Reaches
Pulse Recharge of 2857 acft/year



Attachment B – The Original 1909 Flood Control Project Agreement

No. 8727.

THIS AGREEMENT, made and entered into this 9th day of April, 1909, by and between John and James Devaney, parties of the first part, and F.R. Gooding, party of the second part, all of Gooding, Idaho, WITNESSETH:

For and in consideration of a right-of-way through John and James Devaney's land as now staked off for what is known to be the cut-off ditch for the flood waters of the Little Wood River, the sum of One Hundred Dollars($100) is to be paid by the party of the second part; and the party of the second part hereby agrees to buy a clipping of wool from Devaney Brothers' sheep (700 or 800 head) at the price of twenty cents (20¢) per pound, $250 to be paid at this time; the wool to be sacked and put up in merchantable condition, and to be stored and kept in a dry place until the party of the second part makes his shipment of wool, when it is to be hauled to Shoshone and weighed, and the balance of the money is to be paid at that time; four pounds to be deducted for sacks.

The party of the second part agrees to build a flume across said canal, and if it is found necessary upon a survey in order to irrigate the land of the said parties of the first part he agrees to build an additional flume. If only one flume is necessary it is to be 4½ feet wide and 2 feet deep, to be built of two inch lumber covered with sheet iron, cement abutments to be put in the bottom of the ditch and supports of 6 x 6 to be used; cement connections with the end of each flume are to be made. If it is found that two flumes must be built then these flumes shall be 3 feet wide and 2 feet deep, with the same cement work as agreed upon for the first flume.

The party of the second part binds himself for all time, as well as his heirs and assigns, to keep this flume in repair.

John Devaney James Devaney

F. R. Gooding.

Witnesses

Chas T. Manning.

Filed for record at the request of James Devaney at 9 o'clock A.M., this 3rd day of May , 1909,

Harry W. Anderson

Fee $ 1.00. Ex-officio Recorder.

* * * * * * * * *

STATE OF IDAHO,)
) SS.
County of Lincoln,)

I, Ruth K. Chess, Clerk of the District Court, and Ex-officio Recorder in and for the County of Lincoln, State of Idaho, do hereby that the annexed is a full, true and correct copy of the original Agreement now on file in my office, as the same appears on the records of said Lincoln County, State of Idaho in Book 1 Miscellaneous at page 185.

IN TESTIMONY WHEREOF, I have set my hand and affixed my official seal this 7th day of April, A. D. 1951.

RUTH K. CHESS
Clerk - Ex-Officio Recorder

By ______________ Deputy

Form 2103

STANDARD
5-09-150000

OREGON SHORT LINE RAILROAD COMPANY

OFFICE OF

IN REPLY PLEASE REFER TO

No.

...Contract - Drainage Ditch - Gooding...

Pocatello, Idaho. Dec. 3rd, 1909.

Mr. A. C. Thompson,

City Clerk,

Gooding, Ida.

Dear Sir:

I hand you herewith copy of contract between this company and the Village of Gooding covering construction and maintenance of a drainage ditch to take care of the flood waters of Little Wood River which have hitherto damaged our track and your city. This contract bears our Chief Engineer's number 1395. Our voucher No. 10516 has been sent to the Hon. F. R. Gooding, who I understand is in the best position to settle the various bills still outstanding.

Will you kindly acknowledge receipt of your copy of this contract?

Yours truly,

J.P. Congdon,

Supervising Engineer.

CC-Hon.F.R.Gooding.

A G R E E M E N T

THIS AGREEMENT made and entered into this eighteenth day of November, A. D. 1909, by and between the OREGON SHORT LINE RAILROAD COMPANY, a corporation of the State of Utah, party of the first part, and THE VILLAGE OF GOODING, a village duly incorporated under the laws of the State of Idaho, party of the second part, WITNESSETH:

THAT WHEREAS the flood waters of the Little Wood River have damaged the property lying southerly of the Idaho Division main track of the Oregon Short Line Railroad between a point near Mile Post 253-1/2 in the vicinity of where the Little Wood River crosses underneath the track of said railroad at Bridge No. 229 in the northwest quarter of Section 26, Township 6 South, Range 15 East, Boise Meridian, and the townsite of Gooding, in Lincoln County, Idaho, including damage to the property of the said Oregon Short Line Railroad Company at Gooding and the property of the Idaho Southern Railroad Company at Gooding, as well as lands and property of others, whose interests are being looked after by the said Village of Gooding. The location of said Little Wood River and the area subject to damages by flood waters from same, with respect to the location of the main line of the Oregon Short Line Railroad, is shown on the attached map or plat, which said map or plat is hereby made a part of this agreement; and

WHEREAS it has been considered expedient by the parties hereto to construct a drainage ditch for the purpose of diverting the flood waters of Little Wood River in such manner as to prevent damage to the property of the parties hereto; and

WHEREAS in order to divert the flood waters of said Little Wood River there has been constructed a ditch approximately 6,000 feet long extending from a point in Little Wood River just north of where the same crosses underneath the track and roadbed of the said Oregon Short Line Railroad Company near Mile Post 253-1/2, said point being in the northeast quarter of the northwest quarter of Section 26, Townnorthwesterly direction to a point in the southwest quarter of Section 26, Township 5 South, Range 15 East, Boise Meridian, to a natural drainage leading to the Malade or Big Wood River, the location of said ditch being shown in red upon the said attached map or plat; and

WHEREAS the beforementioned Idaho Southern Railroad Company has already paid about four thousand three hundred dollars ($4300.00) as its share of the cost of construction of the said ditch, and the Village of Gooding has also paid about four thousand three hundred dollars ($4300.00) as its share of the cost of construction of said ditch, the total cost of which has amounted to about twelve thousand nine hundred dollars ($12,900.00),

NOW THEREFORE IT IS AGREED: That in consideration of the covenants and agreements hereinafter contained, on the part of the parties hereto well and truly to be kept, done and performed, and the further consideration of the benefits and advantages which may be received by each of the parties hereto through the construction of the said proposed ditch for the purpose of diverting the flood waters of the Little Wood River as hereinbefore described, it is hereby mutually agreed and stipulated as follows, to-wit:--

1. The Village of Gooding, party of the second part, hereby agrees to obtain all necessary right-of-way for the construction of said ditch and to stand the expense of all damages incurred by the construction of said ditch.

2. The Oregon Short Line Railroad Company, party of the first part, hereby agrees to pay the gross sum of four thousand three hundred dollars ($4300.00) as its total share in the expense of construction of said ditch, which expense has amounted to about twelve thousand nine hundred dollars ($12,900.00).

3. The party of the second part hereby agrees to maintain at its own cost and expense the said ditch after same has been con-

structed in accordance with the terms hereof, it being mutually understood and agreed between the parties hereto that the said Oregon Short Line Railroad Company shall not be liable for any expenditure beyond the one-third proportion of the cost of construction of said ~~proposed~~ ditch.

4. After the construction of said ~~proposed~~ ditch shall have been completed in accordance with the provisions hereof, it is mutually agreed and understood that the ownership of said ditch, including the right-of-way upon which the same is located shall be vested in the second party hereto, and the said second party hereto shall be responsible for the safe construction and maintenance of the said ditch. It being the intention of the said first party hereto to contribute one-third the first cost of construction of said ditch, and in consideration thereof, the said second party hereby agrees to construct, or have constructed, the said ditch in a safe and workmanlike manner, and also agrees to assume the responsibility for any loss or damage which may result from the construction of the said ditch or the maintenance of the same.

This contract shall take effect on the day and date first above written and shall endure to the benefit of and be binding upon the successors or assigns of the parties hereto.

IN WITNESS WHEREOF the parties hereto have caused these presents to be duly executed and witnessed the day and year first above written.

OREGON SHORT LINE RAILROAD COMPANY

WITNESS:

By ______________________
Vice-President & Gen'l Mgr.

VILLAGE OF GOODING

By ______________________
Chairman

A. C. Thompson
City Clerk

Appendix R Water Facilities Planning Revision I 2015

City of Gooding, Idaho
Revision 1 to Water Facilities Planning Study
DEQ Grant No. DWG 126-2012-7
PWS No. ID5240009





February 2015

Related Documents:

- City of Gooding, Idaho
  Water Facilities Planning Study, January 2013
- City of Gooding, Idaho
  Supplement to Water Facilities Planning Study, March 2013

PROFESSIONAL ENGINEER
REGISTERED
9956
STATE OF IDAHO

2/12/15

KELLER associates

Introduction

This revision to the City of Gooding Water Facilities Planning Study (WFPS) presents an updated scope of work, project costs, and user rates necessitated by a change in the project funding. Water System Improvements in Gooding will be funded by the USDA-Rural Development (RD) and the Community Development Block Grant (CDBG).

Only those portions of the WFPS that require revisions, based on the funding agency's comments, are included in this document.

1.5 Water System Improvements Scope and Cost

The current scope of work includes construction of two new ground water wells, associated well houses, and approximately 25,000 to 33,000 linear feet (LF) of distribution improvements. The cost estimate of the selected improvements is given in Table 1.

Table 1. Water System Improvements Cost Estimate

Item	Total
Well & Well House #5	$890,400
Well & Well House #6	$890,400
Distribution and Existing Well House Improvements	$3,646,400
Construction Subtotal	*$5,427,200*
Contingency (3.1%)	$166,917
Construction Total	***$5,594,117***
Land and Easement Acquisition	$88,900
SCADA	$70,000
Land and SCADA Subtotal	*$158,900*
Construction Total, Land, and SCADA Subtotal	*$5,753,017*
Engineering (16%)	$920,483
Legal and Permitting	$70,000
Financial and Audit	$15,000
Interim Interest Expense	$100,000
Administrative Services	$91,500
Water Facility Planning Study	$38,000
Total	**$6,988,000**

The cost estimate herein is based on our perception of current conditions at the project location. This estimate reflects our opinion of probable costs at this time and is subject to change as the project design matures. Keller Associates has no control over variances in the cost of labor, materials, equipment, services provided by others, contractor's methods of determining prices, competitive bidding or market conditions, practices or bidding strategies. Keller Associates cannot and does not warrant or guarantee that proposals, bids, or actual construction costs will not vary from the cost presented herein. Cost sums are rounded up to the nearest ten thousand.

Funding for the project includes $6.5 million in Rural Development funds, Community Development Block Grant of $350,000, and the cost of the Water Facilities Planning Study, $38,000.

5.1.2 Water Rights

Elimination of the irrigation system allowed the City to transfer its surface water rights to additional ground water rights to enable construction of two new ground water wells. The Permit to Appropriate Water (No. 37-22850) allows for the maximum diversion rate of 7.21 cfs to be added to the existing 7.05 cfs. The total diversion of ground water rights held by the City of Gooding is 14.26 cfs or 6,400 gpm.

6.7 Operation and Maintenance

The City's current operation and maintenance (O&M) costs are included in Table 2. The projected O&M costs were calculated based on the City's 2015 budget. The following adjustments to the 2015 water budget were made:

- The irrigation system O&M costs were added to the respective components of the potable water system budget, as shown in Table 2.
- The anticipated O&M costs for two new wells were added. The supplies budget increased by 20% for additional chlorine gas, the budget for water tests was doubled. The utilities budget increased based on the City's estimate for additional electric charges.

Table 2. Current and Projected Operation and Maintenance Costs

Acct #	Water Expense	2015	2016
25-434-10.00	Salary	157,800	167,300
25-434-20.00	Benefits	53,150	59,900
25-434-30.00	Supplies	65,500	85,800
25-434-31.00	Office Supplies and Software	18,500	18,500
25-434-32.00	Office Exp Bldg	2,000	2,000
25-434-35.00	Motor Fuel	4,750	11,802
25-434-40.00	Water Tests	2,500	5,000
25-434-41.00	DEQ	6,000	6,000
25-434-46.00	Worker's Comp/Unemployment Insurance	5,000	22,000
25-434-47.00	School/Travel/Dues	2,500	2,500
25-434-50.00	Custodian Contract	1,900	1,900
25-434-52.00	Utilities	108,200	145,000
25-434-59.00	Repair/Maint Bldg&Lines	10,000	10,000
25-434-60.00	Vehicle Maint & Repair	7,550	7,550
25-434-62.00	Dig Line	300	300
25-434-63.00	Advance Deposits	16,500	16,500
25-434-66.00	Merchant Fees - Crdt Crd	2,500	2,500
25-434-67.00	Drug Testing	200	200
25-434-69.00	Miscellaneous	2,000	2,000
New	Water Mitigation	12,435	20,000
New	Two New Employees	-	80,000
Total O&M Expenses		***479,285***	***666,752***

7.2.1 Scope of the Selected Alternative and Priority Plan

The selected alternative, Alternative 3a, includes construction of two new wells, as part of Phase I of the project. The distribution improvements will take place during Phase II of the project. A detailed cost analysis of the project improvements is shown in Table 3. Compliance with Davis-Bacon labor standards, if required, is anticipated to increase construction costs by approximately 20%.

Table 3 - Detailed Cost Estimate	Unit	Unit Price	Estimated Quantity	Cost
New Wells No. 5 and No. 6 and Distribution Well House Improvements				
1.1 Construct New Well No. 5				
Site development	LS	$60,000	1	$60,000
Drilling of Well hole with casing	LS	$350,000	1	$350,000
Well mechanical and electrical	LS	$80,000	1	$80,000
Construction of Well House	LS	$130,000	1	$130,000
1,500 gpm Well Pump	EA	$90,000	1	$90,000
Chlorination facilities: Onsite Generation	LS	$40,000	1	$40,000
Standby Power	LS	$90,000	1	$90,000
Construction and Materials Cost Subtotal				*$840,000*
Mobilization as percentage of Construction and Materials	%	6%		$50,400
Total Construction Costs				*$890,400*
Contingency as percent of total construction costs	%	3.08%		$27,385
SCADA Setup for Site	LS	$20,000	1	$20,000
Land Acquisition	AC	$35,000	1	$35,000
Total Construction Costs, Contingency, SCADA, and Land Acquisition Subtotal				*$972,785*
Engineering and CMS as percentage of total construction costs	%	16%		$155,646
Legal and Permitting	LS	$10,000	1	$10,000
Priority 1.1: New Well No. 5 Total Cost				***$1,138,430***
1.2 Construct New Well No. 6				
Site development	LS	$60,000	1	$60,000
Drilling of Well hole with casing	LS	$350,000	1	$350,000
Well mechanical and electrical	LS	$80,000	1	$80,000
Construction of Well House	LS	$130,000	1	$130,000
1,500 gpm Well Pump	EA	$90,000	1	$90,000
Chlorination facilities: Onsite Generation	LS	$40,000	1	$40,000
Standby Power	LS	$90,000	1	$90,000
Construction and Materials Cost Subtotal				*$840,000*
Mobilization as percentage of Construction and Materials	%	6%		$50,400
Total Construction Costs				*$890,400*
Contingency as percent of total construction costs	%	3.08%		$27,385
SCADA Setup for Site	LS	$20,000	1	$20,000
Land Acquisition	AC	$35,000	1	$35,000
Total Construction Costs, Contingency, SCADA, and Land Acquisition Subtotal				*$972,785*
Engineering and CMS as percentage of total construction costs	%	16%		$155,646
Legal and Permitting	LS	$10,000	1	$10,000
Priority 1.2: New Well No. 6 Total Cost				***$1,138,430***
1.3 Distribution and Existing Well House Improvements				
12-inch lines (Refer to figure for alignment and connectivity) Note: Unit costs include fitting, hydrants, excavation, backfill, pavement repair, and traffic control	LF	$100	27,500	$2,750,000
8-inch lines (Refer to figure for alignment and connectivity)	LF	$100	4,200	$420,000
Additional cost for sections requiring rock cutting	LF	$50	2,000	$100,000
Canal Crossing - bore	EA	$10,000	2	$20,000
Existing well house improvements	LS	$150,000	1	$150,000
Construction and Materials Cost Subtotal				*$3,440,000*
Mobilization as percentage of Construction and Materials	%	6%		$206,400
Total Construction Costs				*$3,646,400*
Contingency as percent of total construction costs	%	3.076%		$112,148
Easement Acquistion	LF	$7	2,700	$18,900
Total Construction Costs, Contingency, and Easement Acquisition Subtotal				*$3,777,448*
Engineering and CMS as percentage of total construction costs	%	16%		$604,391.61
Legal and Permitting	LS	$50,000	1	$50,000
Priority 1.3: Distribution Improvements				***$4,431,839***
1.4 SCADA Base Setup				
Set-up station at shop and program wells and tanks	LS	$30,000	1	$30,000
Engineering and CMS as percentage of total construction costs	%	16%		$4,800
Priority 1.4: SCADA Base Setup				***$34,800***
Priority 1 Total: Well No. 5, Well No. 6, and Transmission				***$6,743,500***

The cost estimate herein is based on our perception of current conditions at the project location. This estimate reflects our opinion of probable costs at this time and is subject to change as the project design matures. Keller Associates has no control over variances in the cost of labor, materials, equipment, services provided by others, contractor's methods of determining prices, competitive bidding or market conditions, practices or bidding strategies. Keller Associates cannot and does not warrant or guarantee that proposals, bids, or actual construction costs will not vary from the cost presented herein. Cost sums are rounded up to the nearest ten thousand.

7.3 Short Lived Assets

Short-lived assets were considered to account for the monthly reserve needed to replace these assets on a yearly basis. Table 4 provides a summary of the asset costs and their anticipated frequency of replacement. The annual contributions by the community to support the replacement of the assets were calculated from the total yearly budgets and the total number of EDUs (1600). It is estimated that a total annual replacement budget of $88,883 is required to replace the short-lived assets.

Table 4. Short-lived Assets and Replacement Costs

Item		Age	Size	Number	Cost	Total
10-year replacement assets						
VFD	existing	10	EA	3	$25,000	$75,000
VFD	new	-	EA	2	$25,000	$50,000
SCADA/electrical, telemetry	new	-	EA	1	$70,000	$70,000
Disinfection system	existing	20	EA	1	$40,000	$40,000
Disinfection system	new	-	EA	2	$40,000	$80,000
					Total 10-year replacement budget	***$315,000***
					Annual contribution (Total/10)	$31,500
15-year replacement assets						
Standby generator	existing	23	EA	1	$90,000	$90,000
Standby generator	new	-	EA	2	$90,000	$180,000
Storage tank recoating	existing	34	EA	2	$20,000	$40,000
Booster pump and motor	existing	18	EA	3	$55,000	$165,000
Booster pump and motor	new	-	EA	2	$55,000	$110,000
Well pump and motor	existing	30	EA	3	$55,000	$165,000
Well pump and motor	new	-	EA	2	$55,000	$110,000
					Total 15-year replacement budget	***$860,000***
					Annual contribution (Total/15)	$57,333
					TOTAL ANNUAL CONTRIBUTION (10- and 15-YEAR)	***$88,833***

7.4 User Rate Analysis

The user rate analysis includes estimates of the system's debt service, debt reserve, projected O&M cost, and short-lived asset replacement. The annual payment on the USDA-RD loan was calculated using 3.0% interest rate and a 40-year payment period.

Table 5. User Rate Summary

Item	Amount
RD loan	$5,000,000
Annual RD debt payment	$216,312
Annual debt service reserve, 10%	$21,631
Projected annual O&M	$666,752
Annual short-lived assets reserve	$88,833
Total annual water system cost	*$993,528*
Monthly average user rate	***$51.75***

Based on this analysis, the new monthly average user rate is estimated at $51.75.

Appendix S Water Facilities Planning Revision II 2016

City of Gooding, Idaho
Revision II to Water Facilities Planning Study
DEQ Grant No. DWG 126-2012-7
PWS No. ID5240009

April 2016

Related Documents:

- City of Gooding, Idaho
  Water Facilities Planning Study, January 2013
- City of Gooding, Idaho
  Supplement to Water Facilities Planning Study, March 2013
- City of Gooding, Idaho
  Revision I to Water Facilities Planning Study, February, 2015

PROFESSIONAL ENGINEER
REGISTERED
9956
STATE OF IDAHO

4/1/16

KELLER
associates

Introduction

The WFPS received a technical completion approval in February, 2013. Revision II to the City of Gooding Water Facilities Planning Study (WFPS) is preceded with the following previous revisions to the study:

- WFPS Supplement March 25, 2013
- WFPS Revision February 12, 2015

Revision II to the City of Gooding Water Facilities Planning Study is prepared in response to the letter "Facility Planning Report" Review addressed to Mayor Nelson and dated March 18, 2015 (Appendix A). The following components of the Study have been revised and will be addressed in this document:

1. Proposed distribution system improvements
2. Hydraulic model for proposed improvements
3. Aquifer recharge project – implementation and outcome

Distribution System Improvements

Construction of two new groundwater wells has been completed. The flow rate from each well matches the design flow of 1,600 gpm. The production rates of the new wells were included in the hydraulic model analysis.

The distribution system improvements will take place during Phase II of the Water System Improvements project and will include installation of 8-inch and 12-inch pipe. These improvements will be designed to address the most critical portions of the existing water distribution system, as dictated by the hydraulic model analysis, the locations and capacity of the new wells, and the System Owner's input. The enclosed Figure shows locations of the proposed distribution system upgrades. Approximately 15,000 feet of 8-inch pipe and 19,000 feet of 12-inch pipe are proposed for installation. The scope of the water system distribution improvements proposed in the WFPS was reevaluated, as discussed in Revision I to the WFPS. The model was updated to reflect the new scope.

Hydraulic Model

A hydraulic model of Gooding's water system has been created for the purpose of evaluating the system pressures under various demand scenarios. Bentley's WaterCAD V8i water modeling program was used to model the system. The model was created using the best available data sources on the system including recording drawings, operator knowledge, and field investigations.

Several days of field testing provided the calibration data necessary to match model conditions to observed conditions as well as identify anomalies in the system such as closed valves. The model was calibrated within 3 psi of observed system pressures.

Modeled Improvements

Proposed distribution system upgrades were modeled to improve the system's capacity to deliver the required flows and pressures. Hydraulic restrictions were identified by tracing hydraulic losses through each line in the system. Where possible, these restrictions were eliminated by upsizing distribution pipe as shown in Figure 1. With the implementation of the proposed improvements, the improved portions of the system will be able to deliver peak hour demands and maintain pressures above 53 psi. Maximum day demand plus fire flow can be delivered throughout the improved system while maintaining pressures above 25 psi and leaving the new North Well offline. A 300-ft maximum service radius off of the distribution water mains was assumed for the fire flow coverage evaluation.

Model results showing the improved fire flow and system pressures can be found in Appendix B.

Aquifer Recharge and Withdrawal Project

The Aquifer Recharge and Withdrawal Project enabled transfer of surface water rights to additional ground water rights. The Permit to Appropriate Water (No. 37-22850) allows for the maximum diversion rate of 7.21 cfs (3,236 gpm) to be added to the existing 7.05 cfs. The total diversion of ground water rights held by the City of Gooding is 14.26 cfs or 6,400 gpm. New ground water wells, North Well and South Well, 1,600 gpm each, have been constructed to appropriate the allowable diversion rate enabled by the recharge project.

The Department of Water Resources issued approved Transfer of Water Rights On March 20, 2014. Appendix C includes Transfer Approval Notice, Transfer of Water Right No. 78927, and Transfer of Water Right No. 78928.

APPENDIX A

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STATE OF IDAHO
DEPARTMENT OF
ENVIRONMENTAL QUALITY

650 Addison Avenue West, Suite 110 • Twin Falls, Idaho 83301 • (208) 736-2190
www.deq.idaho.gov

March 18, 2015

The Honorable Walter Nelson
Mayor, City of Gooding
308 Fifth Avenue West
Gooding, Idaho 83330

Re: "Facility Planning Report" Review, **City of Gooding February 12, 2015 Revision to Drinking Water Facility Engineering Planning Report,** Drinking Water Grant Project Number DWG-126-2012-7

Dear Mayor Nelson:

Be aware that Oksana Roth, with Keller Associates has submitted the above referenced engineering report revision to this office for our use, review and comment.

This office has reviewed the submittal and we have the following three comments:

- Report. Page Number Four. Table 3 – *"Detailed Cost Estimate"*. Priority 1.3 – *"Distribution Improvements"*. General Comment. It appears from our review of the planning document revision that there are significant changes to the proposed distribution alternatives priority, as presently 27,500-LF of twelve (12)-inch and 4,200-LF of eight (8)-inch pipe is proposed; rather than 16,200-LF of twelve (12)-inch, 4,300-LF of ten (10)-inch and 11,000-LF of eight (8)-inch, which was previously proposed. Resultantly, we respectfully request that future peak day plus fire and peak hour pressure model analyses be rerun and the model outputs be incorporated into the appendix for present and future reference. Furthermore, please also include an updated distribution illustration or map in the revision detailing line improvement locations.

- Two Copies of the Planning Report Revision Requested. Technical Comment. We respectfully request that two copies of the report revision be forwarded to this office for our use, review and disbursement at your earliest convenience.

- Public Participation Relative to the Revision. It appears from our review of the presented recommended alternative that the construction scope is very similar to the original scope and the suggested user cost is less, so our office will not ask the city of Gooding to hold a subsequent public participation meeting if a public meeting was already held.

Please submit two sealed amended engineering report revision copies to this office for our use, review and comment. Upon satisfactory review of the amended document, this office will approve the report revision for public participation activities.

If you have any questions, please do not hesitate to contact this office at 736-2190.

Sincerely,

Brian A. Reed, PE
DW Grant Project Officer

BAR:gl

cc: Oksana Roth, EI, Keller Associates, Pocatello
James Mullen, PE, Keller Associates, Pocatello
Todd Bunn, City of Gooding
Carlene Herring, Region IV Development,
File: City of Gooding DW Grant Program Project "P&S Review"

ec: Charlie Parkins, DEQ-State Office
Ester Ceja, DEQ-State Office
MaryAnna Peavey, DEQ-State Office

APPENDIX
B

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City of Gooding - Peak Hour Pressures - Post Improvements (New North Well offline)

Junction ID	Pressure (psi)
482	53
665	54
637	59
488	59
417	60
419	60
428	60
420	60
733	60
451	60
424	60
172	60
174	61
170	61
168	61
426	61
166	61
443	61
164	61
936	61
415	61
627	62
486	62
1737	62
1430	62
234	62
987	62
1433	62
176	62
178	62
608	62
1158	62
1741	62
1775	62
1743	62
1745	62
1018	62
1747	62
1764	62
599	62
600	62
1749	62
784	62
586	62

continued1

Junction ID	Pressure (psi)
832	62
914	62
1154	62
1850	62
1150	62
232	63
1854	63
301	63
239	63
237	63
225	63
227	63
484	63
1363	63
1858	63
480	63
1162	63
1806	63
120	63
118	63
116	63
1753	63
454	63
114	63
1360	63
52	63
241	63
243	63
245	63
247	63
1357	63
112	63
1445	63
1146	63
48	63
50	63
1142	63
436	63
251	63
28	63
434	63
430	63
1463	63
257	63

continued2

Junction ID	Pressure (psi)
263	63
255	63
249	63
253	63
261	63
265	63
439	63
162	63
274	63
54	63
56	63
1442	63
157	63
155	63
109	63
159	63
58	63
1439	63
826	63
791	63
470	63
332	63
330	63
328	63
334	63
508	63
336	63
339	63
338	63
342	64
303	64
326	64
138	64
634	64
60	64
1212	64
456	64
316	64
314	64
318	64
308	64
312	64
1138	64
310	64

continued3

Junction ID	Pressure (psi)
961	64
1460	64
1090	64
293	64
323	64
1266	64
1270	64
1274	64
1427	64
1262	64
299	64
1258	64
800	64
1088	64
1134	64
320	64
1354	64
96	64
1436	64
1130	64
288	64
97	64
259	64
448	64
1457	64
271	64
1316	64
1254	64
1250	64
348	64
1180	64
1004	64
1304	64
99	64
107	64
528	64
446	64
530	64
1298	64
1240	64
525	64
730	64
1300	64
518	64

continued4

Junction ID	Pressure (psi)
1236	64
295	64
1232	64
297	64
1682	64
1684	64
352	64
291	64
135	64
532	64
506	64
1246	64
354	64
1451	64
140	64
1396	64
286	64
1448	64
43	64
41	64
39	64
37	64
45	64
220	64
1378	64
229	64
1125	64
1631	64
512	65
1372	65
1308	65
510	65
1375	65
964	65
503	65
1454	65
710	65
655	65
1111	65
1312	65
1677	65
1399	65
501	65
499	65
31	65

continued5

Junction ID	Pressure (psi)
498	65
29	65
35	65
33	65
1195	65
101	65
1366	65
1405	65
574	65
572	65
576	65
189	65
1487	65
569	65
191	65
153	65
276	65
631	65
193	65
928	65
1351	65
1798	65
409	65
278	65
1402	65
590	65
280	65
181	65
182	65
185	65
187	65
66	65
68	65
70	65
1493	65
876	65
589	65
478	65
64	65
1824	65
1635	65
407	65
62	65
1082	66
967	66

continued6

Junction ID	Pressure (psi)
1837	66
1289	66
1499	66
1408	66
1202	66
1507	66
970	66
371	66
405	66
151	66
105	66
1466	66
403	66
1874	66
924	66
1369	66
1490	66
1420	66
1199	66
1496	66
1411	66
1481	66
1846	66
1339	66
1866	66
549	66
547	66
414	66
551	66
490	66
557	66
1078	66
614	66
379	66
369	66
367	66
559	66
381	66
212	66
390	66
1790	66
377	66
544	66
387	66
210	66

continued7

Junction ID	Pressure (psi)
195	66
196	66
208	66
1294	66
149	66
359	66
1423	66
147	66
392	66
364	66
1469	66
836	66
398	66
145	66
356	66
396	66
1168	66
1417	66
71	67
73	67
644	67
522	67
198	67
851	67
75	67
77	67
1783	67
1688	67
1227	67
79	67
81	67
845	67
361	67
1335	67
143	67
85	67
1504	67
83	67
87	67
400	67
141	67
214	67
206	67
1320	67
204	67

continued8

Junction ID	Pressure (psi)
475	67
200	67
810	67
202	67
131	67
345	67
137	67
1007	67
1414	67
622	67
463	67
1208	67
1472	67
958	67
1011	67
461	67
1780	67
1478	67
1475	67
467	67
133	67
492	67
983	67
580	67
493	67
90	67
88	67
1343	67
92	67
375	67
721	67
94	67
649	67
648	67
625	67
974	67
977	67
1484	67
553	67
980	67
472	68
127	68
129	68
1015	68
561	68

continued9

Junction ID	Pressure (psi)
475	67
200	67
810	67
202	67
131	67
345	67
137	67
1007	67
1414	67
622	67
463	67
1208	67
1472	67
958	67
1011	67
461	67
1780	67
1478	67
1475	67
467	67
133	67
492	67
983	67
580	67
493	67
90	67
88	67
1343	67
92	67
375	67
721	67
94	67
649	67
648	67
625	67
974	67
977	67
1484	67
553	67
980	67
472	68
127	68
129	68
1015	68
561	68

continued10

Junction ID	Pressure (psi)
1024	68
1113	68
565	68
563	68
1349	68
1599	68
284	68
125	68
124	68
103	69
813	69
688	70

City of Gooding - MDD Plus Fire Flow, Post Improvements (New North Well Offline)

Junction ID	Needed Fire Flow (gpm)	Available Fire Flow (gpm)	Residual Pressure (psi)	Static Pressure (psi)
J-210	1,000	93	25	64
J-214	1,000	147	25	64
J-184	2,000	182	25	48
J-261	2,000	212	25	63
J-130	2,000	258	25	34
J-128	2,000	277	29	25
J-326	2,000	299	26	25
J-183	2,000	351	26	25
J-190	1,000	425	25	60
J-185	1,000	441	25	53
J-188	1,000	592	25	61
J-114	1,000	641	25	54
J-107	1,000	651	25	63
J-193	2,000	658	25	46
J-108	1,000	658	25	63
J-209	1,000	759	26	25
J-169	1,000	770	25	47
J-Hyd 41	1,000	792	25	44
J-129	2,000	847	25	25
J-438	1,000	859	25	40
J-444	1,000	862	25	41
J-383	1,000	902	25	45
J-439	1,000	915	25	45
J-186	1,000	925	25	25
J-470	2,000	930	25	62
J-225	2,000	933	25	57
J-300	1,000	950	25	63
J-468	2,000	981	25	60
J-Hyd 42	1,000	991	25	62
J-192	2,000	996	25	25
J-452	1,000	1,024	25	59
J-392	1,000	1,030	25	57
J-451	1,000	1,030	25	60
J-180	2,000	1,041	25	60
J-450	1,000	1,045	25	58
J-105	1,000	1,057	25	44
J-423	1,000	1,065	25	62
J-425	1,000	1,069	25	62
J-458	1,000	1,070	25	61
J-422	2,000	1,074	25	62
J-459	1,000	1,076	25	60
J-456	1,000	1,079	25	62
J-426	2,000	1,085	25	62

J-395	2,000	1,088	25	62
J-462	1,000	1,103	25	62
J-168	1,000	1,106	25	27
J-463	1,000	1,106	25	62
J-460	2,000	1,110	25	62
J-393	1,000	1,115	25	52
J-429	2,000	1,118	25	62
J-149	1,000	1,139	25	45
J-170	1,000	1,141	25	25
J-Press Hyd 2A	1,000	1,141	25	62
J-448	1,000	1,167	25	39
J-160	1,000	1,199	25	62
J-430	2,000	1,215	25	53
J-226	2,000	1,230	25	25
J-113	1,000	1,253	25	25
J-182	2,000	1,287	25	53
J-473	2,000	1,287	25	54
J-148	1,000	1,304	25	37
J-204	1,000	1,312	25	62
J-178	2,000	1,335	25	59
J-100	2,000	1,356	25	61
J-177	2,000	1,381	25	50
J-111	1,000	1,383	25	61
J-405	2,000	1,389	25	62
J-151	1,000	1,406	25	38
J-410	2,000	1,416	25	54
J-123	2,000	1,420	25	41
J-221	2,000	1,428	25	61
J-449	1,000	1,437	25	60
J-94	1,000	1,508	25	62
J-134	1,000	1,517	25	26
J-118	1,000	1,529	25	32
J-147	1,000	1,531	25	58
J-81	2,000	1,538	25	56
J-409	2,000	1,546	25	26
J-198	1,000	1,584	25	29
J-163	1,000	1,610	25	61
J-172	1,000	1,627	25	53
J-154	1,000	1,638	25	61
J-122	1,000	1,646	25	28
J-Hyd 51	1,000	1,647	25	31
J-246	1,000	1,676	25	49
J-Press Hyd 3A	1,000	1,682	25	25
J-Hyd 23	1,000	1,729	25	50
J-333	1,000	1,742	25	38
J-157	1,000	1,755	25	27
J-117	1,000	1,761	25	44

J-139	1,000	1,849	25	47
J-173	1,000	1,854	25	60
J-Press Hyd 3B	1,000	1,858	25	43
J-Hyd 106	1,000	1,883	25	42
J-3	2,000	1,942	25	46
J-238	1,000	1,985	25	52
J-116	1,000	1,985	25	44
J-142	1,000	2,019	25	52
J-224	2,000	2,059	25	35
J-Hyd 105	1,000	2,120	25	37
J-216	2,000	2,121	25	58
J-77	1,000	2,174	25	43
J-237	1,000	2,178	25	32
J-166	1,000	2,197	25	39
J-239	1,000	2,247	25	51
J-472	2,000	2,265	25	29
J-222	2,000	2,309	25	26
J-230	2,000	2,316	25	51
J-217	1,000	2,338	25	26
J-189	1,000	2,363	25	27
J-229	2,000	2,384	25	43
J-167	1,000	2,447	25	50
J-234	1,000	2,449	25	28
J-191	1,000	2,461	25	42
J-Press Hyd 9A	1,000	2,466	25	28
J-235	1,000	2,470	25	30
J-233	1,000	2,522	25	30
J-454	2,000	2,524	25	55
J-165	1,000	2,528	25	26
J-457	1,000	2,560	25	46
J-467	1,000	2,570	25	28
J-131	2,000	2,574	25	34
J-471	2,000	2,584	25	46
J-78	1,000	2,613	25	39
J-245	1,000	2,650	25	25
J-84	2,000	2,713	25	33
J-Press Hyd 4A	2,000	2,727	25	32
J-236	1,000	2,828	25	28
J-455	2,000	2,844	25	54
J-119	1,000	2,844	25	39
J-461	2,000	2,884	25	57
J-465	2,000	2,893	25	56
J-247	1,000	2,912	25	30
J-5	2,000	2,933	25	48
J-83	2,000	2,953	25	26
J-197	2,000	2,964	25	38
J-Hyd 47	2,000	2,987	25	48

J-206	1,000	3,009	25	33
J-428	2,000	3,037	25	59
J-102	1,000	3,046	25	37
J-391	1,000	3,059	25	31
J-85	1,000	3,064	25	26
J-427	2,000	3,079	25	60
Press Hyd 6A	2,000	3,085	25	25
J-120	1,000	3,098	25	33
J-76	1,000	3,102	25	25
J-244	1,000	3,121	25	31
J-Hyd 103	1,000	3,147	25	27
J-11	2,000	3,170	25	48
J-407	2,000	3,179	25	39
J-194	1,000	3,208	25	31
J-406	2,000	3,211	25	27
J-231	2,000	3,256	25	29
J-394	2,000	3,261	25	27
J-288	2,000	3,261	25	25
J-375	1,000	3,307	25	33
J-133	1,000	3,331	25	40
J-248	1,000	3,334	25	29
J-174	1,000	3,360	25	35
J-436	2,000	3,383	26	25
J-254	2,000	3,439	25	27
J-469	2,000	3,444	25	29
J-355	2,000	3,457	25	40
J-7	2,000	3,466	25	45
J-253	2,000	3,467	25	34
J-75	1,000	3,471	25	25
J-161	2,000	3,483	25	29
J-79	2,000	3,494	25	25
J-4thAveDischarge	2,000	3,499	64	61
J-4	2,000	3,500	44	42
J-6	2,000	3,500	46	45
J-8	2,000	3,500	53	52
J-9	2,000	3,500	41	52
J-10	2,000	3,500	42	43
J-12	2,000	3,500	53	52
J-13	1,000	3,500	52	53
J-14	1,000	3,500	53	53
J-15	1,000	3,500	50	54
J-16	1,000	3,500	45	45
J-17	1,000	3,500	43	44
J-18	1,000	3,500	45	47
J-19	2,000	3,500	47	47
Flow Hydrant 6	2,000	3,500	49	49
J-21	2,000	3,500	42	43

J-22	2,000	3,500	37	40
J-23	2,000	3,500	37	39
J-24	2,000	3,500	37	39
J-25	2,000	3,500	42	43
J-26	1,000	3,500	42	46
J-27	1,000	3,500	43	45
J-28	1,000	3,500	46	47
J-29	1,000	3,500	47	47
J-30	1,000	3,500	46	47
J-31	1,000	3,500	54	54
J-32	1,000	3,500	44	44
J-33	1,000	3,500	43	44
J-34	1,000	3,500	42	44
J-35	1,000	3,500	37	38
J-36	1,000	3,500	36	40
J-37	1,000	3,500	42	43
J-38	1,000	3,500	55	55
J-39	1,000	3,500	49	54
J-40	2,000	3,500	48	54
J-41	2,000	3,500	56	56
J-42	2,000	3,500	62	60
J-43	2,000	3,500	53	56
J-44	1,000	3,500	49	54
J-45	1,000	3,500	50	53
J-46	1,000	3,500	48	52
J-Hyd 32	1,000	3,500	45	48
J-48	1,000	3,500	47	48
J-49	1,000	3,500	45	45
J-Hyd 33	1,000	3,500	47	46
J-52	2,000	3,500	32	36
J-53	2,000	3,500	34	36
J-54	2,000	3,500	36	37
J-55	2,000	3,500	31	32
J-56	1,000	3,500	38	38
J-57	1,000	3,500	46	46
J-58	1,000	3,500	53	55
J-59	1,000	3,500	46	46
J-60	1,000	3,500	53	53
J-61	1,000	3,500	52	54
J-62	1,000	3,500	55	56
J-63	1,000	3,500	50	52
J-64	1,000	3,500	46	48
J-65	2,000	3,500	48	51
J-66	2,000	3,500	45	48
J-67	2,000	3,500	42	49
J-68	2,000	3,500	42	42
J-69	1,000	3,500	40	44

J-70	1,000	3,500	40	44
J-71	1,000	3,500	42	45
J-Flow Hydrant 3	1,000	3,500	38	39
J-73	1,000	3,500	29	30
J-74	1,000	3,500	28	29
J-80	2,000	3,500	25	26
J-86	1,000	3,500	25	29
J-87	1,000	3,500	35	34
J-88	1,000	3,500	36	36
J-89	1,000	3,500	37	37
J-90	1,000	3,500	46	46
J-91	1,000	3,500	55	53
J-13thAveDischarge	1,000	3,500	54	53
J-93	1,000	3,500	55	53
J-95	1,000	3,500	25	36
J-96	1,000	3,500	29	34
J-97	1,000	3,500	30	32
J-98	1,000	3,500	55	54
J-103	1,000	3,500	53	53
J-104	1,000	3,500	37	42
J-109	1,000	3,500	48	49
J-110	1,000	3,500	47	49
J-112	1,000	3,500	51	53
J-121	1,000	3,500	31	32
J-124	2,000	3,500	26	41
J-125	2,000	3,500	30	32
J-126	2,000	3,500	37	40
J-132	2,000	3,500	54	54
J-Flow Hydrant 4	2,000	3,500	55	55
J-Hyd 11	2,000	3,500	53	54
J-140	2,000	3,500	53	53
J-145	1,000	3,500	54	55
J-146	1,000	3,500	54	54
J-152	1,000	3,500	47	48
J-153	1,000	3,500	51	51
J-155	1,000	3,500	42	47
J-158	1,000	3,500	30	39
J-159	1,000	3,500	57	57
J-162	1,000	3,500	54	54
J-171	1,000	3,500	35	34
J-176	1,000	3,500	55	54
J-179	2,000	3,500	44	41
J-196	1,000	3,500	28	30
J-203	1,000	3,500	38	43
J-213	1,000	3,500	53	53
J-218	1,000	3,500	35	38
J-219	2,000	3,500	45	45

J-220	2,000	3,500	39	39
J-227	2,000	3,500	35	40
J-228	2,000	3,500	51	51
J-232	1,000	3,500	52	55
J-240	2,000	3,500	34	35
J-Hyd 53	2,000	3,500	34	38
J-242	2,000	3,500	40	40
J-251	2,000	3,500	37	37
J-252	2,000	3,500	32	45
J-255	2,000	3,500	26	26
J-259	1,000	3,500	56	57
J-SeniorAveDischarge	1,000	3,500	53	57
J-262	1,000	3,500	30	29
J-267	1,000	3,500	44	42
J-269	1,000	3,500	44	43
J-270	1,000	3,500	44	43
J-271	2,000	3,500	44	40
J-282	2,000	3,500	42	38
J-285	1,000	3,500	42	43
J-HospitalSite	2,000	3,500	35	36
J-295	2,000	3,500	34	35
J-297	2,000	3,500	47	47
J-301	2,000	3,500	63	60
J-Flow Hydrant 1	2,000	3,500	31	35
J-Press Hydrant 1A	2,000	3,500	39	39
J-Press Hydrant 2A 1B	1,000	3,500	44	42
J-Pressure Hydrant 9B	1,000	3,500	45	45
Pressure Hydrant 6B	2,000	3,500	36	41
J-321	2,000	3,500	40	40
J-323	2,000	3,500	49	50
J-324	2,000	3,500	46	42
J-332	1,000	3,500	48	48
J-334	2,000	3,500	55	57
J-Hyd 121	2,000	3,500	34	35
J-343	2,000	3,500	58	57
J-344	1,000	3,500	46	46
J-345	1,000	3,500	48	48
J-346	1,000	3,500	31	32
J-349	2,000	3,500	31	37
J-350	2,000	3,500	49	49
J-351	2,000	3,500	50	49
J-352	2,000	3,500	47	47
J-353	2,000	3,500	47	47
J-354	2,000	3,500	46	50
J-358	2,000	3,500	57	57
J-359	2,000	3,500	58	57
J-360	1,000	3,500	57	57

J-361	1,000	3,500	57	56
J-362	1,000	3,500	56	56
J-363	1,000	3,500	56	56
J-364	1,000	3,500	55	55
J-365	1,000	3,500	54	55
J-366	1,000	3,500	40	43
J-367	1,000	3,500	49	51
J-369	1,000	3,500	44	42
J-381	2,000	3,500	49	48
J-382	1,000	3,500	54	55
J-384	1,000	3,500	32	42
J-385	1,000	3,500	53	54
J-396	2,000	3,500	55	55
J-397	2,000	3,500	55	55
J-398	2,000	3,500	55	55
J-399	1,000	3,500	55	55
J-400	1,000	3,500	55	54
J-401	1,000	3,500	55	54
J-402	1,000	3,500	55	54
J-404	2,000	3,500	42	43
J-408	2,000	3,500	58	57
J-411	2,000	3,500	55	55
J-412	2,000	3,500	56	59
J-416	2,000	3,500	32	40
J-417	2,000	3,500	49	46
J-418	1,000	3,500	46	55
J-420	2,000	3,500	41	41
J-421	2,000	3,500	46	43
J-424	1,000	3,500	43	55
J-437	1,000	3,500	54	53
J-440	1,000	3,500	38	44
J-441	1,000	3,500	37	38
J-442	1,000	3,500	34	42
J-443	1,000	3,500	40	45
J-445	1,000	3,500	49	54
J-447	1,000	3,500	53	53
J-453	1,000	3,500	47	54
J-464	1,000	3,500	43	52
J-466	1,000	3,500	33	48

APPENDIX
C

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State of Idaho
DEPARTMENT OF WATER RESOURCES
Southern Region • 650 Addison Ave W, Suite 500 • Twin Falls, Idaho 83301-5858
Phone: (208) 736-3033 • Fax: (208) 736-3037 • Website: www.idwr.idaho.gov

C.L. "BUTCH" OTTER
Governor

GARY SPACKMAN
Director

March 20, 2014

CITY OF GOODING
308 5TH AVE W
GOODING ID 83330

Re: Transfer No: 78927
Water Right No(s).: 37-262, 37-271, 37-282, 37-662, 37-709, 37-960

Re: Transfer No: 78928
Water Right No(s).: 37-4080, 37-11221

Transfer Approval Notice

Dear Water Right Holder and other Interested Persons:

The Department of Water Resources has issued the enclosed approved Transfer of Water Right(s). Please be sure to thoroughly review the conditions of approval and remarks listed on the approval document.

The Transfer of Water Right(s) is a PRELIMINARY ORDER issued by the Department pursuant to section 67-5243, Idaho Code. It can and will become a final order without further action by the Department unless the APPLICANT petitions for reconsideration or files an exception and/or brief within fourteen (14) days of the service date as described in the enclosed information sheet.

ANY PERSON aggrieved by any decision, determination, order or action of the Department and who has not previously been afforded an opportunity for a hearing on the matter may request a hearing pursuant to section 42-1701A(3), Idaho Code. A written petition contesting the action of the Department and requesting a hearing shall be filed within fifteen (15) days after receipt of the denial or conditional approval.

If the transfer approval includes a condition requiring measuring and recording devices, such devices shall comply with specifications established by the Department Detailed specifications are available on the Department's home page on the Internet, or you can request a copy by contacting any office of the Department. Please be sure to thoroughly review the specifications to avoid unnecessary costs for reinstallation or modification due to non-conforming or improperly installed devices.

STATE OF IDAHO

DEPARTMENT OF WATER RESOURCES

TRANSFER OF WATER RIGHT
TRANSFER NO. 78927

This is to certify that: CITY OF GOODING
308 5TH AVE W
GOODING, ID 83330

has requested a change to the water right(s) listed below. This change in water right(s) is authorized pursuant to the provisions of Section 42-222, Idaho Code. A summary of the changes is also listed below. The authorized change for each affected water right, including conditions of approval, is shown on the following pages of this document.

Summary of Water Rights Before the Proposed Changes

Water Right	Origin/Basis	Priority Date	Diversion Rate	Diversion Volume	Acre Limit	Total Acres	Source
37-262A	WR/DECREED	2/22/1883	3.160 cfs	N/A	N/A	N/A	LITTLE WOOD RIVER
37-271A	WR/DECREED	6/30/1882	0.320 cfs	125.0 af	N/A	N/A	LITTLE WOOD RIVER
37-282	WR/DECREED	4/1/1877	1.000 cfs	390.7 af	N/A	N/A	LITTLE WOOD RIVER
37-662	WR/DECREED	6/15/1885	1.420 cfs	554.9 af	N/A	N/A	LITTLE WOOD RIVER
37-709A	WR/DECREED	2/22/1883	0.740 cfs	N/A	N/A	N/A	LITTLE WOOD RIVER
37-960A	WR/DECREED	4/1/1883	0.570 cfs	N/A	N/A	N/A	LITTLE WOOD RIVER

Purpose of Transfer (Changes Proposed)

Current Number	Split	POD	POU	Add POD	Period of Use	Nature of Use
37-262A	NO	YES	YES	NO	NO	YES
37-271A	NO	YES	YES	NO	NO	YES
37-282	NO	YES	YES	NO	NO	YES
37-662	NO	YES	YES	NO	NO	YES
37-709A	NO	YES	YES	NO	NO	YES
37-960A	NO	YES	YES	NO	NO	YES

Summary Of Water Rights After the Approved Change

Existing Right	New No. (Changed Portion)	Transfer Rate	Transfer Volume	Acre Limit	Total Acres	New No. (remaining portion)	Remaining Rate	Remaining Volume	Remaining Acre Limit	Remaining Total Acres
37-262A	37-262A	3.160 cfs	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
37-271A	37-271A	0.320 cfs	125.0 af	N/A	N/A	N/A	N/A	N/A	N/A	N/A
37-282	37-282	1.000 cfs	390.7 af	N/A	N/A	N/A	N/A	N/A	N/A	N/A
37-662	37-662	1.420 cfs	554.9 af	N/A	N/A	N/A	N/A	N/A	N/A	N/A
37-709A	37-709A	0.740 cfs	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
37-960A	37-960A	0.570 cfs	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
COMBINED TOTALS		**7.210 cfs**	**N/A**	**N/A**	**N/A**		**N/A**	**N/A**	**N/A**	**N/A**

SUPPORT DATA
IN FILE # 37-262A

STATE OF IDAHO
DEPARTMENT OF WATER RESOURCES

TRANSFER OF WATER RIGHT
TRANSFER NO. 78927

This water right(s) is subject to all prior water rights and shall be administered in accordance with Idaho law and applicable rules of the Department of Water Resources. Detailed Water Right Description(s) attached.

Dated this 18th day of March, 2014

Southern Region Manager

WATER RIGHT NO. 37-262A

As Modified by Transfer No. 78927

In accordance with the approval of Transfer No. 78927, Water Right No. 37-262A is now described as follows:

Right Holder: CITY OF GOODING
308 5TH AVE W
GOODING, ID 83330

Priority Date: 2/22/1883

Source: LITTLE WOOD RIVER **Tributary:** MALAD RIVER

BENEFICIAL USE	From		To	Diversion Rate
GROUND WATER RECHARGE	03/15	to	11/15	3.160 cfs
				3.160 cfs

LOCATION OF POINT(S) OF DIVERSION

LITTLE WOOD RIVER NWNENW Sec 36 Twp 05S Rge 15E GOODING County

PLACE OF USE: GROUND WATER RECHARGE

			NE				NW				SW				SE				
Twp	Rng	Sec	NE	NW	SW	SE	NE	NW	SW	SE	NE	NW	SW	SE	NE	NW	SW	SE	Totals
05S	15E	26						X	X	X	X					X			
05S	15E	27	X	X	X	X	X		X	X		X							
05S	15E	28													X	X	X	X	

CONDITIONS OF APPROVAL

1. Use of water under this right will be regulated by a watermaster with responsibility for the distribution of water among appropriators within a water district. At the time of this approval, this water right is within State Water District No. 37.
2. A lockable device subject to the approval of the Department shall be maintained on the diverting works in a manner that will provide the watermaster suitable control of the diversion.
3. The right holder shall maintain measuring device(s) and data logger(s) of a type approved by the Department to record water diversion and usage.
4. This right does not grant any right-of-way or easement across the land of another.
5. Delivery of this right is subject to the water exchange provisions contained in Bureau of Reclamation contract no. 14-06-W-73, executed October 14, 1954, between the United States of America and American Falls Reservoir District No. 2, as supplemented by Bureau of Reclamation contract no. 14-06-100-6031, executed June 1, 1962, between and among the United States of America, American Falls Reservoir District No. 2, and the Big Wood Canal Company.

WATER RIGHT NO. 37-262A

As Modified by Transfer No. 78927

CONDITIONS OF APPROVAL

6. The right holder shall accomplish the change authorized by this transfer within one year of the date of this approval.

7. Failure of the right holder to comply with the conditions of this transfer is cause for the Director to rescind approval of the transfer.

8. Pursuant to Section 42-1412(6), Idaho Code, this water right is subject to such general provisions necessary for the definition of the rights or for the efficient administration of water rights as may be determined by the Snake River Basin Adjudication court at a point in time no later than the entry of the final unified decree.

WATER RIGHT NO. 37-271A

As Modified by Transfer No. 78927

In accordance with the approval of Transfer No. 78927, Water Right No. 37-271A is now described as follows:

Right Holder: CITY OF GOODING
308 5TH AVE W
GOODING, ID 83330

Priority Date: 6/30/1882

Source: LITTLE WOOD RIVER **Tributary:** MALAD RIVER

BENEFICIAL USE	**From**		**To**	**Diversion Rate**	**Diversion Volume**
GROUND WATER RECHARGE	03/15	to	11/15	0.320 cfs	125.0 af
				0.320 cfs	125.0 af

LOCATION OF POINT(S) OF DIVERSION

LITTLE WOOD RIVER NWNENW Sec 36 Twp 05S Rge 15E GOODING County

PLACE OF USE: GROUND WATER RECHARGE

			NE				NW				SW				SE				
Twp	Rng	Sec	NE	NW	SW	SE	NE	NW	SW	SE	NE	NW	SW	SE	NE	NW	SW	SE	Totals
05S	15E	26						X	X	X	X					X			
05S	15E	27	X	X	X	X	X		X	X		X							
05S	15E	28													X	X	X	X	

CONDITIONS OF APPROVAL

1. Rights 37-271A, 37-282, and 37-662 when combined shall not exceed a total annual maximum diversion volume of 1070.6 af.
2. Use of water under this right will be regulated by a watermaster with responsibility for the distribution of water among appropriators within a water district. At the time of this approval, this water right is within State Water District No. 37.
3. A lockable device subject to the approval of the Department shall be maintained on the diverting works in a manner that will provide the watermaster suitable control of the diversion.
4. The right holder shall maintain measuring device(s) and data logger(s) of a type approved by the Department to record water diversion and usage.
5. This right does not grant any right-of-way or easement across the land of another.

WATER RIGHT NO. 37-271A

As Modified by Transfer No. 78927

CONDITIONS OF APPROVAL

6. Delivery of this right is subject to the water exchange provisions contained in Bureau of Reclamation contract no. 14-06-W-73, executed October 14, 1954, between the United States of America and American Falls Reservoir District No. 2, as supplemented by Bureau of Reclamation contract no. 14-06-100-6031, executed June 1, 1962, between and among the United States of America, American Falls Reservoir District No. 2, and the Big Wood Canal Company.

7. The right holder shall accomplish the change authorized by this transfer within one year of the date of this approval.

8. Failure of the right holder to comply with the conditions of this transfer is cause for the Director to rescind approval of the transfer.

9. Pursuant to Section 42-1412(6), Idaho Code, this water right is subject to such general provisions necessary for the definition of the rights or for the efficient administration of water rights as may be determined by the Snake River Basin Adjudication court at a point in time no later than the entry of the final unified decree.

WATER RIGHT NO. 37-282

As Modified by Transfer No. 78927

In accordance with the approval of Transfer No. 78927, Water Right No. 37-282 is now described as follows:

Right Holder: CITY OF GOODING
308 5TH AVE W
GOODING, ID 83330

Priority Date: 4/1/1877

Source: LITTLE WOOD RIVER **Tributary:** MALAD RIVER

BENEFICIAL USE	From		To	Diversion Rate	Diversion Volume
GROUND WATER RECHARGE	03/15	to	11/15	1.000 cfs	390.7 af
				1.000 cfs	390.7 af

LOCATION OF POINT(S) OF DIVERSION

LITTLE WOOD RIVER NWNENW Sec 36 Twp 05S Rge 15E GOODING County

PLACE OF USE: GROUND WATER RECHARGE

			NE				NW				SW				SE				
Twp	Rng	Sec	NE	NW	SW	SE	NE	NW	SW	SE	NE	NW	SW	SE	NE	NW	SW	SE	Totals
05S	15E	26						X	X	X	X					X			
05S	15E	27	X	X	X	X	X		X	X		X							
05S	15E	28													X	X	X	X	

CONDITIONS OF APPROVAL

1. Rights 37-271A, 37-282, and 37-662 when combined shall not exceed a total annual maximum diversion volume of 1070.6 af.
2. Use of water under this right will be regulated by a watermaster with responsibility for the distribution of water among appropriators within a water district. At the time of this approval, this water right is within State Water District No. 37.
3. A lockable device subject to the approval of the Department shall be maintained on the diverting works in a manner that will provide the watermaster suitable control of the diversion.
4. The right holder shall maintain measuring device(s) and data logger(s) of a type approved by the Department to record water diversion and usage.
5. This right does not grant any right-of-way or easement across the land of another.

WATER RIGHT NO. 37-282

As Modified by Transfer No. 78927

CONDITIONS OF APPROVAL

6. Delivery of this right is subject to the water exchange provisions contained in Bureau of Reclamation contract no. 14-06-W-73, executed October 14, 1954, between the United States of America and American Falls Reservoir District No. 2, as supplemented by Bureau of Reclamation contract no. 14-06-100-6031, executed June 1, 1962, between and among the United States of America, American Falls Reservoir District No. 2, and the Big Wood Canal Company.

7. The right holder shall accomplish the change authorized by this transfer within one year of the date of this approval.

8. Failure of the right holder to comply with the conditions of this transfer is cause for the Director to rescind approval of the transfer.

9. Pursuant to Section 42-1412(6), Idaho Code, this water right is subject to such general provisions necessary for the definition of the rights or for the efficient administration of water rights as may be determined by the Snake River Basin Adjudication court at a point in time no later than the entry of the final unified decree.

WATER RIGHT NO. 37-662

As Modified by Transfer No. 78927

In accordance with the approval of Transfer No. 78927, Water Right No. 37-662 is now described as follows:

Right Holder: CITY OF GOODING
308 5TH AVE W
GOODING, ID 83330

Priority Date: 6/15/1885

Source: LITTLE WOOD RIVER **Tributary:** MALAD RIVER

BENEFICIAL USE	**From**		**To**	**Diversion Rate**	**Diversion Volume**
GROUND WATER RECHARGE	03/15	to	11/15	1.420 cfs	554.9 af
				1.420 cfs	554.9 af

LOCATION OF POINT(S) OF DIVERSION

LITTLE WOOD RIVER NWNENW Sec 36 Twp 05S Rge 15E GOODING County

PLACE OF USE: GROUND WATER RECHARGE

			NE				NW				SW				SE				
Twp	Rng	Sec	NE	NW	SW	SE	NE	NW	SW	SE	NE	NW	SW	SE	NE	NW	SW	SE	Totals
05S	15E	26						X	X	X	X					X			
05S	15E	27	X	X	X	X	X		X	X		X							
05S	15E	28													X	X	X	X	

CONDITIONS OF APPROVAL

1. Rights 37-271A, 37-282, and 37-662 when combined shall not exceed a total annual maximum diversion volume of 1070.6 af.
2. Use of water under this right will be regulated by a watermaster with responsibility for the distribution of water among appropriators within a water district. At the time of this approval, this water right is within State Water District No. 37.
3. A lockable device subject to the approval of the Department shall be maintained on the diverting works in a manner that will provide the watermaster suitable control of the diversion.
4. The right holder shall maintain measuring device(s) and data logger(s) of a type approved by the Department to record water diversion and usage.
5. This right does not grant any right-of-way or easement across the land of another.

WATER RIGHT NO. 37-662

As Modified by Transfer No. 78927

CONDITIONS OF APPROVAL

6. Delivery of this right is subject to the water exchange provisions contained in Bureau of Reclamation contract no. 14-06-W-73, executed October 14, 1954, between the United States of America and American Falls Reservoir District No. 2, as supplemented by Bureau of Reclamation contract no. 14-06-100-6031, executed June 1, 1962, between and among the United States of America, American Falls Reservoir District No. 2, and the Big Wood Canal Company.

7. The right holder shall accomplish the change authorized by this transfer within one year of the date of this approval.

8. Failure of the right holder to comply with the conditions of this transfer is cause for the Director to rescind approval of the transfer.

9. Pursuant to Section 42-1412(6), Idaho Code, this water right is subject to such general provisions necessary for the definition of the rights or for the efficient administration of water rights as may be determined by the Snake River Basin Adjudication court at a point in time no later than the entry of the final unified decree.

WATER RIGHT NO. 37-709A

As Modified by Transfer No. 78927

In accordance with the approval of Transfer No. 78927, Water Right No. 37-709A is now described as follows:

Right Holder: CITY OF GOODING
308 5TH AVE W
GOODING, ID 83330

Priority Date: 2/22/1883

Source: LITTLE WOOD RIVER **Tributary:** MALAD RIVER

BENEFICIAL USE	From		To	Diversion Rate
GROUND WATER RECHARGE	03/15	to	11/15	0.740 cfs
				0.740 cfs

LOCATION OF POINT(S) OF DIVERSION

LITTLE WOOD RIVER NWNENW Sec 36 Twp 05S Rge 15E GOODING County

PLACE OF USE: GROUND WATER RECHARGE

			NE				NW				SW				SE				
Twp	Rng	Sec	NE	NW	SW	SE	NE	NW	SW	SE	NE	NW	SW	SE	NE	NW	SW	SE	Totals
05S	15E	26						X	X	X	X					X			
05S	15E	27	X	X	X	X	X		X	X		X							
05S	15E	28													X	X	X	X	

CONDITIONS OF APPROVAL

1. Use of water under this right will be regulated by a watermaster with responsibility for the distribution of water among appropriators within a water district. At the time of this approval, this water right is within State Water District No. 37.

2. A lockable device subject to the approval of the Department shall be maintained on the diverting works in a manner that will provide the watermaster suitable control of the diversion.

3. The right holder shall maintain measuring device(s) and data logger(s) of a type approved by the Department to record water diversion and usage.

4. This right does not grant any right-of-way or easement across the land of another.

5. Delivery of this right is subject to the water exchange provisions contained in Bureau of Reclamation contract no. 14-06-W-73, executed October 14, 1954, between the United States of America and American Falls Reservoir District No. 2, as supplemented by Bureau of Reclamation contract no. 14-06-100-6031, executed June 1, 1962, between and among the United States of America, American Falls Reservoir District No. 2, and the Big Wood Canal Company.

WATER RIGHT NO. 37-709A

As Modified by Transfer No. 78927

CONDITIONS OF APPROVAL

6. The right holder shall accomplish the change authorized by this transfer within one year of the date of this approval.

7. Failure of the right holder to comply with the conditions of this transfer is cause for the Director to rescind approval of the transfer.

8. Pursuant to Section 42-1412(6), Idaho Code, this water right is subject to such general provisions necessary for the definition of the rights or for the efficient administration of water rights as may be determined by the Snake River Basin Adjudication court at a point in time no later than the entry of the final unified decree.

WATER RIGHT NO. 37-960A

As Modified by Transfer No. 78927

In accordance with the approval of Transfer No. 78927, Water Right No. 37-960A is now described as follows:

Right Holder: CITY OF GOODING
308 5TH AVE W
GOODING, ID 83330

Priority Date: 4/1/1883

Source: LITTLE WOOD RIVER **Tributary:** MALAD RIVER

BENEFICIAL USE	**From**		**To**	**Diversion Rate**
GROUND WATER RECHARGE	03/15	to	11/15	0.570 cfs
				0.570 cfs

LOCATION OF POINT(S) OF DIVERSION

LITTLE WOOD RIVER NWNENW Sec 36 Twp 05S Rge 15E GOODING County

PLACE OF USE: GROUND WATER RECHARGE

			NE				NW				SW				SE				
Twp	Rng	Sec	NE	NW	SW	SE	NE	NW	SW	SE	NE	NW	SW	SE	NE	NW	SW	SE	Totals
05S	15E	26						X	X	X	X					X			
05S	15E	27	X	X	X	X	X		X	X		X							
05S	15E	28													X	X	X	X	

CONDITIONS OF APPROVAL

1. Use of water under this right will be regulated by a watermaster with responsibility for the distribution of water among appropriators within a water district. At the time of this approval, this water right is within State Water District No. 37.
2. A lockable device subject to the approval of the Department shall be maintained on the diverting works in a manner that will provide the watermaster suitable control of the diversion.
3. The right holder shall maintain measuring device(s) and data logger(s) of a type approved by the Department to record water diversion and usage.
4. This right does not grant any right-of-way or easement across the land of another.
5. Delivery of this right is subject to the water exchange provisions contained in Bureau of Reclamation contract no. 14-06-W-73, executed October 14, 1954, between the United States of America and American Falls Reservoir District No. 2, as supplemented by Bureau of Reclamation contract no. 14-06-100-6031, executed June 1, 1962, between and among the United States of America, American Falls Reservoir District No. 2, and the Big Wood Canal Company.

WATER RIGHT NO. 37-960A

As Modified by Transfer No. 78927

CONDITIONS OF APPROVAL

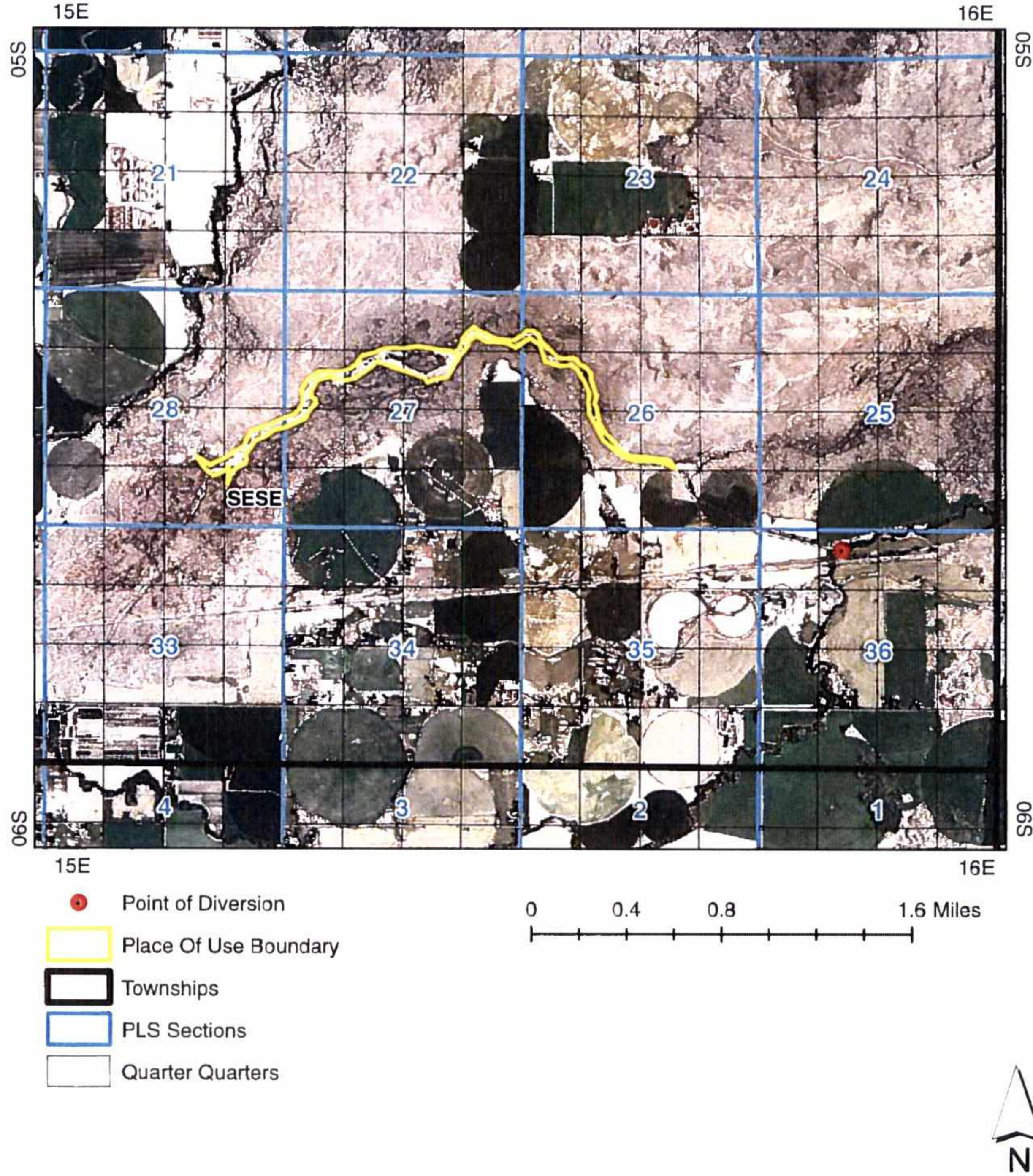
6. The right holder shall accomplish the change authorized by this transfer within one year of the date of this approval.
7. Failure of the right holder to comply with the conditions of this transfer is cause for the Director to rescind approval of the transfer.
8. Pursuant to Section 42-1412(6), Idaho Code, this water right is subject to such general provisions necessary for the definition of the rights or for the efficient administration of water rights as may be determined by the Snake River Basin Adjudication court at a point in time no later than the entry of the final unified decree.

State of Idaho
Department of Water Resources

Attachment To Transfer No. 78927

Rights: 37-262A, 37-271A, 37-282, 37-662, 37-709A and 37-960A

This map depicts the GROUND WATER RECHARGE place of use boundary for this water right at the time of this approval and is attached to the approval document solely for illustrative purposes.



State of Idaho
DEPARTMENT OF WATER RESOURCES
Southern Region • 650 Addison Ave W, Suite 500 • Twin Falls, Idaho 83301-5858
Phone: (208) 736-3033 • Fax: (208) 736-3037 • Website: www.idwr.idaho.gov

C.L. "BUTCH" OTTER
Governor

GARY SPACKMAN
Director

March 24, 2014

KEVIN LAKEY WATERMASTER
WATER DISTRICT # 37
107 W 1ST ST
SHOSHONE, ID 83352

Re: **APPROVED Transfer No. 78927 (City of Gooding)**
APPROVED Permit No. 37-22850 (City of Gooding)

Re: **APPROVED Transfer No. 78777 (Terence J Creighton Trust)**
APPROVED Permit No. 37-22838 (Terence J Creighton Trust)

Re: **Approved Transfer No. 79034 (John & Rosemary Mc Gonigal)**

Dear Mr. Lakey:

For your information and records, we have enclosed a copy of an APPROVED Application for Transfer and APPROVED Application for Permit within your District.

If you have any questions, please contact this office, or the applicant.

Sincerely,

Denise Maline

Denise Maline
Administrative Assistant

Enclosure

State of Idaho
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March 24, 2014

CINDY YENTER WATERMASTER
WATER DISTRICT # 130
650 ADDISON AVE W, STE 500
TWIN FALLS ID 83301

Hand-delivered

Re: **APPROVED Transfer No. 78927 & 78928 (City of Gooding)**
APPROVED Permit No. 37-22850 (City of Gooding)

Dear Ms. Yenter:

For your information and records, we have enclosed a copy of an APPROVED Application for Transfer(s) and APPROVED Application for Permit within your District.

If you have any questions, please contact this office, or the applicant.

Sincerely,

Denise Maline

Denise Maline
Administrative Assistant

Enclosure

State of Idaho
DEPARTMENT OF WATER RESOURCES
Southern Region • 650 Addison Ave W, Suite 500 • Twin Falls, Idaho 83301-5858
Phone: (208) 736-3033 • Fax: (208) 736-3037 • Website: www.idwr.idaho.gov

C.L. "BUTCH" OTTER
Governor

GARY SPACKMAN
Director

March 20, 2014

CITY OF GOODING
308 5TH AVE W
GOODING ID 83330

Re: Transfer No: 78927
Water Right No(s).: 37-262, 37-271, 37-282, 37-662, 37-709, 37-960

Re: Transfer No: 78928
Water Right No(s).: 37-4080, 37-11221

Transfer Approval Notice

Dear Water Right Holder and other Interested Persons:

The Department of Water Resources has issued the enclosed approved Transfer of Water Right(s). Please be sure to thoroughly review the conditions of approval and remarks listed on the approval document.

The Transfer of Water Right(s) is a PRELIMINARY ORDER issued by the Department pursuant to section 67-5243, Idaho Code. It can and will become a final order without further action by the Department unless the APPLICANT petitions for reconsideration or files an exception and/or brief within fourteen (14) days of the service date as described in the enclosed information sheet.

ANY PERSON aggrieved by any decision, determination, order or action of the Department and who has not previously been afforded an opportunity for a hearing on the matter may request a hearing pursuant to section 42-1701A(3), Idaho Code. A written petition contesting the action of the Department and requesting a hearing shall be filed within fifteen (15) days after receipt of the denial or conditional approval.

If the transfer approval includes a condition requiring measuring and recording devices, such devices shall comply with specifications established by the Department Detailed specifications are available on the Department's home page on the Internet, or you can request a copy by contacting any office of the Department. Please be sure to thoroughly review the specifications to avoid unnecessary costs for reinstallation or modification due to non-conforming or improperly installed devices.

Please note that water right owners are required to report any change of water right ownership and/or mailing address to the Department within 120 days of the change. Failure to report these changes could result in a $100 late filing fee. Contact any office of the Department or visit the Department's homepage on the Internet to obtain the proper forms and instructions.

If you have any questions, please contact me at (208)736-3033.

Sincerely,

Allen Merritt

Allen Merritt
Southern Region Manager

Enclosure

cc:

BROCKWAY ENGINEERING PLLC
C/O CHARLES G BROCKWAY
2016 N WASHINGTON ST STE 4
TWIN FALLS ID 83301

CERTIFICATE OF SERVICE

I hereby certify that on March 20, 2014 I mailed a true and correct copy, postage prepaid, of the foregoing TRANSFER APPROVAL to the person(s) listed below:

Re: Transfer No.: 78927
Water Right No(s).: 37-262, 37-271, 37-282, 37-662, 37-709, 37-960

Re: Transfer No: 78928
Water Right No(s).: 37-4080, 37-11221

CITY OF GOODING
308 5TH AVE W
GOODING ID 83330

BROCKWAY ENGINEERING PLLC
C/O CHARLES G BROCKWAY
2016 N WASHINGTON ST STE 4
TWIN FALLS ID 83301

Denise Maline

Denise Maline
Administrative Assistant

EXPLANATORY INFORMATION TO ACCOMPANY A PRELIMINARY ORDER

(To be used in connection with actions when a hearing was **not** held)

(Required by Rule of Procedure 730.02)

The accompanying order or approved document is a "**Preliminary Order**" issued by the department pursuant to section 67-5243, Idaho Code. **It can and will become a final order without further action of the Department of Water Resources ("department") unless a party petitions for reconsideration, files an exception and brief, or requests a hearing as further described below:**

PETITION FOR RECONSIDERATION

Any party may file a petition for reconsideration of a preliminary order with the department within fourteen (14) days of the service date of this order. **Note: the petition must be received by the department within this fourteen (14) day period.** The department will act on a petition for reconsideration within twenty-one (21) days of its receipt, or the petition will be considered denied by operation of law. See Section 67-5243(3) Idaho Code.

EXCEPTIONS AND BRIEFS

Within fourteen (14) days after: (a) the service date of a preliminary order, (b) the service date of a denial of a petition for reconsideration from this preliminary order, or (c) the failure within twenty-one (21) days to grant or deny a petition for reconsideration from this preliminary order, any party may in writing support or take exceptions to any part of a preliminary order and may file briefs in support of the party's position on any issue in the proceeding with the Director. Otherwise, this preliminary order will become a final order of the agency.

REQUEST FOR HEARING

Unless a right to a hearing before the Department or the Water Resource Board is otherwise provided by statute, any person aggrieved by any final decision, determination, order or action of the Director of the Department and who has not previously been afforded an opportunity for a hearing on the matter may request a hearing pursuant to section 42-1701A(3), Idaho Code. A written petition contesting the action of the Director and requesting a hearing shall be filed within fifteen (15) days after receipt of the denial or conditional approval.

ORAL ARGUMENT

If the Director grants a petition to review the preliminary order, the Director shall allow all parties an opportunity to file briefs in support of or taking exceptions to the preliminary order and may schedule oral argument in the matter before issuing a final order. If oral arguments are to be heard, the Director will within a reasonable time period notify each party of the place, date and hour for the argument of the case. Unless the Director orders otherwise, all oral arguments will be heard in Boise, Idaho.

CERTIFICATE OF SERVICE

All exceptions, briefs, requests for oral argument and any other matters filed with the Director in connection with the preliminary order shall be served on all other parties to the proceedings in accordance with IDAPA Rules 37.01.01302 and 37.01.01303 (Rules of Procedure 302 and 303).

FINAL ORDER

The Director will issue a final order within fifty-six (56) days of receipt of the written briefs, oral argument or response to briefs, whichever is later, unless waived by the parties or for good cause shown. The Director may remand the matter for further evidentiary hearings if further factual development of the record is necessary before issuing a final order. The department will serve a copy of the final order on all parties of record.

Section 67-5246(5), Idaho Code, provides as follows:

> Unless a different date is stated in a final order, the order is effective fourteen (14) days after its service date if a party has not filed a petition for reconsideration. If a party has filed a petition for reconsideration with the agency head, the final order becomes effective when:
>
> (a) The petition for reconsideration is disposed of; or
> (b) The petition is deemed denied because the agency head did not dispose of the petition within twenty-one (21) days.

APPEAL OF FINAL ORDER TO DISTRICT COURT

Pursuant to sections 67-5270 and 67-5272, Idaho Code, if this preliminary order becomes final, any party aggrieved by the final order or orders previously issued in this case may appeal the final order and all previously issued orders in this case to district court by filing a petition in the district court of the county in which:

i. A hearing was held,
ii. The final agency action was taken,
iii. The party seeking review of the order resides, or
iv. The real property or personal property that was the subject of the agency action is located.

The appeal must be filed within twenty-eight (28) days of this preliminary order becoming final. See section 67-5273, Idaho Code. The filing of an appeal to district court does not itself stay the effectiveness or enforcement of the order under appeal.

MEMORANDUM

Date: March 11, 2014

To: Transfer 78927 File

From: Corey Skinner

Re: Limitations on Groundwater Recharge Use

Transfer # 78927, filed in the name of the City of Gooding, proposes transferring Little Wood River irrigation rights 37-709A, 37-960A & 37-262A (three rights limited to 4.47 cfs and 207 acres) and Little Wood River irrigation rights 37-271A, 37-282, and 37-662 (three rights limited to 2.74 cfs, 207 acres, and 1070.6 AFA) from irrigation use to groundwater recharge use. The six rights allow for a total diversion of 7.21 cfs for the irrigation of 538 acres (note that only rights 37-271A, 37-282, and 37-662 have a volume limitation). The groundwater recharge use proposed by this transfer provides mitigation for companion application for permit 37-22850, filed in the name of the City of Gooding, which seeks to appropriate groundwater for municipal use. After the transfer is approved, the City of Gooding can begin groundwater recharge. In the event that companion application for permit 37-22850 is not developed in its entirety, it is possible that excess groundwater recharge could occur above and beyond what is required to mitigate for permit/right 37-22850. It seems reasonable that the city could perhaps obtain some sort of recharge credit in the future under such a scenario. However, any potential recharge credit should not exceed a maximum consumptive use credit of 1846 AFA which is based on the historically maximum allowed 538 acres times a weighted precipitation deficit value of 3.43 ft/season for turfgrass (see section 5, page 4, Exhibit D, of application for permit 37-22850 file) minus any consumptive recharge volume associated with mitigating permit/right 37-22850.

State of Idaho
DEPARTMENT OF WATER RESOURCES
Southern Region • 650 Addison Ave W, Suite 500 • Twin Falls, Idaho 83301-5858
Phone: (208) 736-3033 • Fax: (208) 736-3037 • Website: www.idwr.idaho.gov

C.L. "BUTCH" OTTER
Governor

GARY SPACKMAN
Director

March 4, 2013

Carleen Herring
Region IV Development
315 Falls Avenue, Evergreen Building, SIDC Wing, #C77
College of Southern Idaho Campus
Twin Falls, Idaho 83301

Dear Ms. Herring:

As you recall, you recently inquired about the status of three water right applications in the name of the City of Gooding that are under consideration with our office:

- Water Right Transfer Application # 78927 which seeks to convert 7.21 cfs of decreed irrigation rights diverted from the Little Wood River to groundwater recharge use at a location northeast of the city.

- Water Right Transfer Application # 78928 which seeks to modify the city's existing decreed municipal water rights to allow for the diversion of 7.05 cfs from three existing wells and up to three new wells to be drilled.

- Application for Permit 37-22850 which seeks to appropriate 7.21 cfs of additional groundwater for municipal use from three existing wells and up to three new wells to be drilled.

The applications have all been advertised as part of the public notice process as required by statute, with no protests of the applications being filed. In addition, our office has received the required written comments from the water masters who have jurisdictional regulating authority over the rights involved with the applications. We have also received the legal notice publishing affidavit from the newspaper indicating that the legal notice was published correctly. **Draft approvals for all three applications have been created and are awaiting final review and signature.**

When IDWR issues water right approvals, they are issued as a "Preliminary Order". Once issued, the applicant, in this case the City of Gooding, has 14 days to review and contest the approval &/or approval conditions. Assuming there are no objections, the "Preliminary Order" will become final after 14 days of the issuance of the "Preliminary Order". **Pending no unforeseen circumstances, I would anticipate that the "Preliminary Orders" for each of the three applications will be issued within the next 30 days.**

If you have any questions, or if I can be of any further assistance, feel free to contact me at your convenience.

Sincerely,

Corey Skinner

Corey Skinner, PE
Water Resource Engineer

Via E-mail
RECEIVED

FEB 17 2014

DEPT. OF WATER RESOURCES
SOUTHERN REGION

State of Idaho

Department of Water Resources

Transfer of Water Right(s)

RECOMMENDATION FORM

Transfer Application No.: 78927 **Water Right No(s):** 37-262A, 37-271A, 37-282, 37-662, 37-709A, 37-960A

Transfer Applicant's Name: CITY OF GOODING
308 5TH AVE W
GOODING, ID 83330

Watermaster's Recommendation:

a) X I do not oppose approval of this application.

b) ________ I do not oppose approval of this application if it is conditioned as follows:

c) ________ I oppose approval of this application for the following reasons:

d) ________ Additional comments:

Dated this 17th day of February ~~2013~~ 2014

Water District No. 37

[signature]

Watermaster's Signature

Kevin Lakey

Printed Name

RECEIVED
FEB 14 2014
DEPT. OF WATER RESOURCES
SOUTHERN REGION

Affidavit of Publication

STATE OF IDAHO)
COUNTY OF TWIN FALLS) SS.

I, Ruby Aufderheide, being first duly sworn upon oath, depose and say that I am Legal Clerk of the TIMES-NEWS,published daily at, Twins Falls, Idaho, and do solemnly swear that a copy of the notice of advertisement, as per clipping attached, was published in the regular and entire issue of said newspaper, and not in any supplement thereof, for two consecutive weeks, commencing with the issue dated 6th day of February, 2014 and ending with the issue dated 13th day of February, 2014

And I do further certify that said newspaper is a consolidation, effective February 16, 1942, of the Idaho Evening Times, published theretofore daily except Sunday, and the Twin Falls News, published theretofore daily except Monday, both of which newspapers prior to consolidation had been published under said names in said city and county continuously and uninterruptedly during a period of more than twelve consecutive months, and said TIMES-NEWS, since such consolidation, has been published as a daily newspaper except Saturday, until July 31, 1978, at which time said newspaper began daily publication under said name in said city and county continuously and uninterrupted.

And I further certify that pursuant to Section 60-108 Idaho Code, Thursday of each week has been designated as the day on which legal notice by law or by order of any court of competent jurisdiction within the state of Idaho to be issued thereof Thursday is announced as the day on which said legal will be published.

Ruby Aufderheide
Ruby Aufdeheide, Legal Clerk

STATE OF IDAHO
COUNTY OF TWIN FALLS

On this 13th day of February, 2014, before me,

a Notary Public, personally appeared Ruby Aufdeheide,
known or identified to me to be the person whose name subscribed to the within instrument, and being by me first duly sworn, declared that the statements therein are true, and acknowledged to me that he executed the same.

Joyce A Engleman
Notary Public for Idaho
Residing at Twin Falls, Idaho 6/28/19

My commision expires: ____________

✓ ok DM
2/25/2014

JOYCE A. ENGLEMAN
NOTARY
PUBLIC
STATE OF IDAHO

The following application(s) have been filed to appropriate the public waters of the State of Idaho:

37-22850

CITY OF GOODING

308 5TH AVE W

GOODING, ID 83330

Point of Diversion SWSW S32 T05S R15E GOODING County
Source GROUND WATER Tributary

Point of Diversion L1(NENE) S6 T06S R15E GOODING County
Source GROUND WATER Tributary

Point of Diversion NESE S31 T05S R15E GOODING County
Source GROUND WATER Tributary

Point of Diversion SESW S32 T05S R15E GOODING County
Source GROUND WATER Tributary

Point of Diversion SWSW S5 T06S R15E GOODING County
Source GROUND WATER Tributary

Point of Diversion SENE S6 T06S R15E GOODING County
Source GROUND WATER Tributary

Use: MUNICIPAL 03/15 to 11/15 7.21 CFS

Total Diversion: 7.21 CFS

Date Filed: 8/27/2013

Place Of Use: MUNICIPAL

Place of use is within City of Gooding Service Area

Application proposes diverting up to 7.21 cfs from three existing wells and up to three new wells to be drilled all located within the City of Gooding. Water will be used for municipal use during the irrigation season within the City of Gooding service area. A mitigation plan, proposing recharging Little Wood River rights as described in companion transfer #78927, has been included with the application.

NOTICE OF PROPOSED CHANGE OF WATER RIGHT TRANSFER NO. 78927

CITY OF GOODING, 308 5TH AVE W, GOODING, ID 83330; has filed Application No. 78927 for changes to the following water rights within GOODING County(s): Right No(s). 37-262A, 37-271A, 37-282, 37-662, 37-709A, 37-960A. The purpose of the transfer is to change a portion of the above rights as follows: Application proposes changing 7.21 cfs of Little Wood River rights currently authorized for irrigation use within the City of Gooding to groundwater recharge use northeast of the city. The application also proposes changing the authorized point of diversion from several locations in and near the City of Gooding to a new location approximately 1.9 miles north and 4.35 miles east of the Highway 26 and Highway 46 intersection at the south edge of Gooding. The proposed recharge site is generally located approximately 2.0 - 3.0 miles north and 1.5 - 3.75 miles east of the Highway 26 and Highway 46 intersection at the south edge of Gooding. The application proposal is associated with a mitigation plan submitted with companion Application for Permit 37-22850.

NOTICE OF PROPOSED CHANGE OF WATER RIGHT TRANSFER NO. 78928

CITY OF GOODING, 308 5TH AVE W, GOODING, ID 83330; has filed Application No. 78928 for changes to the following water rights within GOODING County(s): Right No(s). 37-11221, 37-4080. The purpose of the transfer is to change a portion of the above rights as follows: Application proposes changing the authorized points of diversion for two municipal groundwater rights for the City of Gooding. The application proposes allowing for the diversion of up to 7.05 cfs of water from three existing wells and up to three proposed new wells all located within the City of Gooding.

NOTICE OF PROPOSED CHANGE OF WATER RIGHT TRANSFER NO. 78962

JANET YATES and KIRTLAND YATES, 1941 S 2450 E, MALTA, ID 83342; has filed Application No. 78962 for changes to the following water rights within CASSIA County(s): Right No(s). 43-10593, 43-2307. The purpose of the transfer is to change a portion of the above rights as follows: Application for transfer proposes to add a point of diversion to groundwater irrigation rights 43-2307 & 43-10593, currently authorized for use on a farm located approximately 3.5 - 4.2 mi. S & 2.8 - 3.4 mi. E of Malta. These rights are currently authorized to divert 2.9 CFS (235 acres) from two wells located approximately 4.2 mi. S & 3.1 mi. E of Malta. Application proposes to add an existing well, located approximately 3.8 mi. S & 4.3 mi. E of Malta, to be allowed to be used under these rights.

NOTICE OF PROPOSED CHANGE OF WATER RIGHT TRANSFER NO. 78963

UNITED STATES OF AMERICA ACTING THROUGH, USDI BUREAU OF LAND MANAGEMENT, IDAHO STATE OFFICE, 1387 S VINNELL WAY, BOISE, ID 83709-1657; has filed Application No. 78963 for changes to the following water rights within CASSIA County(s): Right No(s). 43-2408. The purpose of the transfer is to change a portion of the above rights as follows: Application for transfer proposes to add a point of diversion to groundwater irrigation right 43-2408, currently authorized for use on a farm located approximately 4.2 - 5.0 mi. S & 3.3 - 3.8 mi. E of Malta. This right is currently authorized to divert 2.45 CFS (200 acres) from a well located approximately 4.9 mi. S & 3.6 mi. E of Malta. Application proposes to add an existing well, located approximately 3.8 mi. S & 4.3 mi. E of Malta, to be allowed to be used under this right.

NOTICE OF PROPOSED CHANGE OF WATER RIGHT TRANSFER NO. 79020

J7 LLC, C/O JEFFREY C JOHNSON, PO BOX 147, MALTA, ID 83342-0147; has filed Application No. 79020 for changes to the following water rights within CASSIA County(s): Right No(s). 43-2356B, 43-2441C, 43-4022B, 43-4023B, 43-4024D, 43-4130B. The purpose of the transfer is to change a portion of the above rights as follows: Application proposes creating a 949.4 acre permissible place of use on a farm located approximately 4.5 to 6.75 miles south and 1.75 to 3.25 miles east of Malta. Five rights on the farm will be modified to allow for use in the proposed permissible place of use. In addition, a 38 acre right currently used on a farm located approximately 8.25 to10.5 miles south and 1.75 to 3.25 miles east of Malta will be moved to the proposed permissible place of use. The application proposes diverting up to 17.5 cfs from five existing wells on the farm located approximately 4.5 to 6.75 miles and 1.75 to 3.25 miles east of Malta.

Permits will be subject to all prior water rights. For additional information concerning the property location, contact Southern Region office at (208) 736-3033; or for a full description of the rights &/or proposed transfer, please see www.idwr.idaho.gov/apps/ExtSearch/WRFiling.asp. Protests may be submitted based on the criteria of Sec 42-222 and 42-203A, Idaho Code. Any protest against the approval of this application(s) must be filed with the Director, Dept. of Water Resources, Southern Region, 650 Addison Ave W, Ste 500, Twin Falls, ID 83301 together with a protest fee of $25.00 for each application on or before February 24, 2014. The protestant must also send a copy of the protest to the applicant.

GARY SPACKMAN, Director

PUBLISH: February 6 and 13, 2014

ok DM
2/25/2014

STATE OF IDAHO

DEPARTMENT OF WATER RESOURCES

TRANSFER OF WATER RIGHT
TRANSFER NO. 78928

This is to certify that: CITY OF GOODING
308 5TH AVE W
GOODING, ID 83330

has requested a change to the water right(s) listed below. This change in water right(s) is authorized pursuant to the provisions of Section 42-222, Idaho Code. A summary of the changes is also listed below. The authorized change for each affected water right, including conditions of approval, is shown on the following pages of this document.

Summary of Water Rights Before the Proposed Changes

Water Right	Origin/Basis	Priority Date	Diversion Rate	Diversion Volume	Acre Limit	Total Acres	Source
37-11221	WR/DECREED	4/20/1977	5.900 cfs	N/A	N/A	N/A	GROUND WATER
37-4080	WR/DECREED	9/28/1928	2.800 cfs	N/A	N/A	N/A	GROUND WATER

Purpose of Transfer (Changes Proposed)

Current Number	Split	POD	POU	Add POD	Period of Use	Nature of Use
37-11221	NO	YES	NO	YES	NO	NO
37-4080	NO	YES	NO	YES	NO	NO

Summary Of Water Rights After the Approved Change

Existing Right	New No. (Changed Portion)	Transfer Rate	Transfer Volume	Acre Limit	Total Acres	New No. (remaining portion)	Remaining Rate	Remaining Volume	Remaining Acre Limit	Remaining Total Acres
37-11221	37-11221	5.900 cfs	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
37-4080	37-4080	2.800 cfs	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
COMBINED TOTALS		**7.050 cfs**	**N/A**	**N/A**	**N/A**		**N/A**	**N/A**	**N/A**	**N/A**

This water right(s) is subject to all prior water rights and shall be administered in accordance with Idaho law and applicable rules of the Department of Water Resources. Detailed Water Right Description(s) attached.

Dated this 7th day of March, 2014.

[signature]
Southern Region Manager

SUPPORT DATA
IN FILE # 37-4080

Transfer No. 78928

WATER RIGHT NO. 37-4080

As Modified by Transfer No. 78928

In accordance with the approval of Transfer No. 78928, Water Right No. 37-4080 is now described as follows:

Right Holder: CITY OF GOODING
308 5TH AVE W
GOODING, ID 83330

Priority Date: 9/28/1928

Source: GROUND WATER

BENEFICIAL USE	From		To	Diversion Rate
MUNICIPAL	01/01	to	12/31	2.800 cfs
				2.800 cfs

LOCATION OF POINT(S) OF DIVERSION

GROUND WATER	NESE	Sec 31	Twp 05S	Rge 15E	GOODING County
GROUND WATER	SESW	Sec 32	Twp 05S	Rge 15E	GOODING County
GROUND WATER	SWSW	Sec 32	Twp 05S	Rge 15E	GOODING County
GROUND WATER	SWSW	Sec 5	Twp 06S	Rge 15E	GOODING County
GROUND WATER	L1 (NENE)	Sec 6	Twp 06S	Rge 15E	GOODING County
GROUND WATER	SENE	Sec 6	Twp 06S	Rge 15E	GOODING County

CONDITIONS OF APPROVAL

1. Place of use is within the service area of the City of Gooding municipal water supply system as provided for under Idaho Law.

2. A map depicting the place of use boundary for this water right at the time of this approval is attached to this document for illustrative purposes.

3. Rights 37-4080 and 37-11221 when combined shall not exceed a total diversion rate of 7.05 cfs.

4. Right holder shall comply with the drilling permit requirements of Section 42-235, Idaho Code and applicable Well Construction Rules of the Department.

5. Use of water under this right will be regulated by a watermaster with responsibility for the distribution of water among appropriators within a water district. At the time of this approval, this water right is within State Water District No. 130.

6. Prior to diversion and use of water under Transfer approval 78928, the right holder shall install and maintain acceptable measuring device(s) at the authorized point(s) of diversion, in accordance with Department specifications.

7. Upon specific notification of the Department, the right holder shall install and maintain data loggers to record water usage information at the authorized point(s) of diversion in accordance with Department specifications.

WATER RIGHT NO. 37-4080

As Modified by Transfer No. 78928

CONDITIONS OF APPROVAL

8. To the extent necessary for administration between points of diversion for ground water, and between points of diversion for ground water and hydraulically connected surface sources, this right retains its original priority for well locations authorized under this right as identified in decree dated 12/11/2002.

9. The right holder shall accomplish the change authorized by this transfer within one year of the date of this approval.

10. Failure of the right holder to comply with the conditions of this transfer is cause for the Director to rescind approval of the transfer.

11. Pursuant to Section 42-1412(6), Idaho Code, this water right is subject to such general provisions necessary for the definition of the rights or for the efficient administration of water rights as may be determined by the Snake River Basin Adjudication court at a point in time no later than the entry of the final unified decree.

WATER RIGHT NO. 37-11221

As Modified by Transfer No. 78928

In accordance with the approval of Transfer No. 78928, Water Right No. 37-11221 is now described as follows:

Right Holder: CITY OF GOODING
308 5TH AVE W
GOODING, ID 83330

Priority Date: 4/20/1977

Source: GROUND WATER

BENEFICIAL USE	From		To	Diversion Rate
MUNICIPAL	01/01	to	12/31	5.900 cfs
				5.900 cfs

LOCATION OF POINT(S) OF DIVERSION

GROUND WATER	NESE	Sec 31	Twp 05S	Rge 15E	GOODING County
GROUND WATER	SESW	Sec 32	Twp 05S	Rge 15E	GOODING County
GROUND WATER	SWSW	Sec 32	Twp 05S	Rge 15E	GOODING County
GROUND WATER	SWSW	Sec 5	Twp 06S	Rge 15E	GOODING County
GROUND WATER	L1 (NENE)	Sec 6	Twp 06S	Rge 15E	GOODING County
GROUND WATER	SENE	Sec 6	Twp 06S	Rge 15E	GOODING County

CONDITIONS OF APPROVAL

1. Place of use is within the service area of the City of Gooding municipal water supply system as provided for under Idaho Law.
2. A map depicting the place of use boundary for this water right at the time of this approval is attached to this document for illustrative purposes.
3. Rights 37-4080 and 37-11221 when combined shall not exceed a total diversion rate of 7.05 cfs.
4. Right holder shall comply with the drilling permit requirements of Section 42-235, Idaho Code and applicable Well Construction Rules of the Department.
5. Use of water under this right will be regulated by a watermaster with responsibility for the distribution of water among appropriators within a water district. At the time of this approval, this water right is within State Water District No. 130.
6. Prior to diversion and use of water under Transfer approval 78928, the right holder shall install and maintain acceptable measuring device(s) at the authorized point(s) of diversion, in accordance with Department specifications.
7. Upon specific notification of the Department, the right holder shall install and maintain data loggers to record water usage information at the authorized point(s) of diversion in accordance with Department specifications.

WATER RIGHT NO. 37-11221

As Modified by Transfer No. 78928

CONDITIONS OF APPROVAL

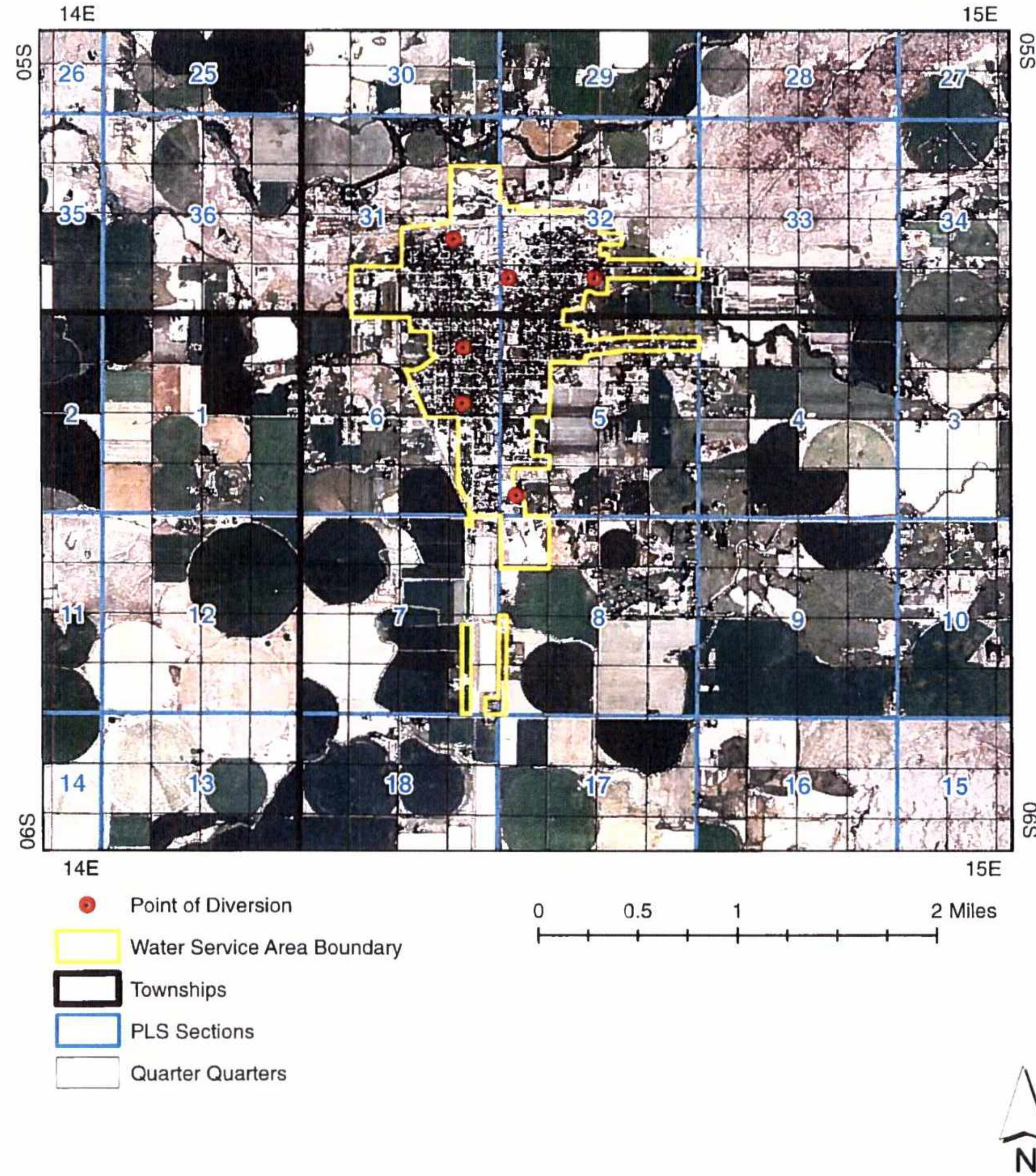
8. To the extent necessary for administration between points of diversion for ground water, and between points of diversion for ground water and hydraulically connected surface sources, this right retains its original priority for well locations authorized under this right as identified in decree dated 12/11/2002.
9. The right holder shall accomplish the change authorized by this transfer within one year of the date of this approval.
10. Failure of the right holder to comply with the conditions of this transfer is cause for the Director to rescind approval of the transfer.
11. Pursuant to Section 42-1412(6), Idaho Code, this water right is subject to such general provisions necessary for the definition of the rights or for the efficient administration of water rights as may be determined by the Snake River Basin Adjudication court at a point in time no later than the entry of the final unified decree.

City Of Gooding

Attachment To Transfer No. 78928

Rights: 37-4080 and 37-11221

This map depicts the MUNICIPAL place of use boundary for this water right at the time of this approval and is attached to the approval document solely for illustrative purposes.



State of Idaho
DEPARTMENT OF WATER RESOURCES
Southern Region • 650 Addison Ave W, Suite 500 • Twin Falls, Idaho 83301-5858
Phone: (208) 736-3033 • Fax: (208) 736-3037 • Website: www.idwr.idaho.gov

C.L. "BUTCH" OTTER
Governor

GARY SPACKMAN
Director

March 24, 2014

CINDY YENTER WATERMASTER
WATER DISTRICT # 130
650 ADDISON AVE W, STE 500
TWIN FALLS ID 83301

Hand-delivered

Re: **APPROVED Transfer No. 78927 & 78928 (City of Gooding)**
APPROVED Permit No. 37-22850 (City of Gooding)

Dear Ms. Yenter:

For your information and records, we have enclosed a copy of an APPROVED Application for Transfer(s) and APPROVED Application for Permit within your District.

If you have any questions, please contact this office, or the applicant.

Sincerely,

Denise Maline

Denise Maline
Administrative Assistant

Enclosure

State of Idaho
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C.L. "BUTCH" OTTER
Governor

GARY SPACKMAN
Director

March 20, 2014

CITY OF GOODING
308 5TH AVE W
GOODING ID 83330

Re: Transfer No: 78927
Water Right No(s).: 37-262, 37-271, 37-282, 37-662, 37-709, 37-960

Re: Transfer No: 78928
Water Right No(s).: 37-4080, 37-11221

Transfer Approval Notice

Dear Water Right Holder and other Interested Persons:

The Department of Water Resources has issued the enclosed approved Transfer of Water Right(s). Please be sure to thoroughly review the conditions of approval and remarks listed on the approval document.

The Transfer of Water Right(s) is a PRELIMINARY ORDER issued by the Department pursuant to section 67-5243, Idaho Code. It can and will become a final order without further action by the Department unless the APPLICANT petitions for reconsideration or files an exception and/or brief within fourteen (14) days of the service date as described in the enclosed information sheet.

ANY PERSON aggrieved by any decision, determination, order or action of the Department and who has not previously been afforded an opportunity for a hearing on the matter may request a hearing pursuant to section 42-1701A(3), Idaho Code. A written petition contesting the action of the Department and requesting a hearing shall be filed within fifteen (15) days after receipt of the denial or conditional approval.

If the transfer approval includes a condition requiring measuring and recording devices, such devices shall comply with specifications established by the Department Detailed specifications are available on the Department's home page on the Internet, or you can request a copy by contacting any office of the Department. Please be sure to thoroughly review the specifications to avoid unnecessary costs for reinstallation or modification due to non-conforming or improperly installed devices.

Please note that water right owners are required to report any change of water right ownership and/or mailing address to the Department within 120 days of the change. Failure to report these changes could result in a $100 late filing fee. Contact any office of the Department or visit the Department's homepage on the Internet to obtain the proper forms and instructions.

If you have any questions, please contact me at (208)736-3033.

Sincerely,

Allen Merritt
Southern Region Manager

Enclosure

cc:

BROCKWAY ENGINEERING PLLC
C/O CHARLES G BROCKWAY
2016 N WASHINGTON ST STE 4
TWIN FALLS ID 83301

CERTIFICATE OF SERVICE

I hereby certify that on March 20, 2014 I mailed a true and correct copy, postage prepaid, of the foregoing TRANSFER APPROVAL to the person(s) listed below:

Re: Transfer No.: 78927
Water Right No(s).: 37-262, 37-271, 37-282, 37-662, 37-709, 37-960

Re: Transfer No: 78928
Water Right No(s).: 37-4080, 37-11221

CITY OF GOODING
308 5TH AVE W
GOODING ID 83330

BROCKWAY ENGINEERING PLLC
C/O CHARLES G BROCKWAY
2016 N WASHINGTON ST STE 4
TWIN FALLS ID 83301

Denise Maline

Denise Maline
Administrative Assistant

EXPLANATORY INFORMATION TO ACCOMPANY A PRELIMINARY ORDER

(To be used in connection with actions when a hearing was **not** held)

(Required by Rule of Procedure 730.02)

The accompanying order or approved document is a "**Preliminary Order**" issued by the department pursuant to section 67-5243, Idaho Code. **It can and will become a final order without further action of the Department of Water Resources ("department") unless a party petitions for reconsideration, files an exception and brief, or requests a hearing as further described below:**

PETITION FOR RECONSIDERATION

Any party may file a petition for reconsideration of a preliminary order with the department within fourteen (14) days of the service date of this order. **Note: the petition must be received by the department within this fourteen (14) day period.** The department will act on a petition for reconsideration within twenty-one (21) days of its receipt, or the petition will be considered denied by operation of law. See Section 67-5243(3) Idaho Code.

EXCEPTIONS AND BRIEFS

Within fourteen (14) days after: (a) the service date of a preliminary order, (b) the service date of a denial of a petition for reconsideration from this preliminary order, or (c) the failure within twenty-one (21) days to grant or deny a petition for reconsideration from this preliminary order, any party may in writing support or take exceptions to any part of a preliminary order and may file briefs in support of the party's position on any issue in the proceeding with the Director. Otherwise, this preliminary order will become a final order of the agency.

REQUEST FOR HEARING

Unless a right to a hearing before the Department or the Water Resource Board is otherwise provided by statute, any person aggrieved by any final decision, determination, order or action of the Director of the Department and who has not previously been afforded an opportunity for a hearing on the matter may request a hearing pursuant to section 42-1701A(3), Idaho Code. A written petition contesting the action of the Director and requesting a hearing shall be filed within fifteen (15) days after receipt of the denial or conditional approval.

ORAL ARGUMENT

If the Director grants a petition to review the preliminary order, the Director shall allow all parties an opportunity to file briefs in support of or taking exceptions to the preliminary order and may schedule oral argument in the matter before issuing a final order. If oral arguments are to be heard, the Director will within a reasonable time period notify each party of the place, date and hour for the argument of the case. Unless the Director orders otherwise, all oral arguments will be heard in Boise, Idaho.

CERTIFICATE OF SERVICE

All exceptions, briefs, requests for oral argument and any other matters filed with the Director in connection with the preliminary order shall be served on all other parties to the proceedings in accordance with IDAPA Rules 37.01.01302 and 37.01.01303 (Rules of Procedure 302 and 303).

FINAL ORDER

The Director will issue a final order within fifty-six (56) days of receipt of the written briefs, oral argument or response to briefs, whichever is later, unless waived by the parties or for good cause shown. The Director may remand the matter for further evidentiary hearings if further factual development of the record is necessary before issuing a final order. The department will serve a copy of the final order on all parties of record.

Section 67-5246(5), Idaho Code, provides as follows:

> Unless a different date is stated in a final order, the order is effective fourteen (14) days after its service date if a party has not filed a petition for reconsideration. If a party has filed a petition for reconsideration with the agency head, the final order becomes effective when:
>
> (a) The petition for reconsideration is disposed of; or
> (b) The petition is deemed denied because the agency head did not dispose of the petition within twenty-one (21) days.

APPEAL OF FINAL ORDER TO DISTRICT COURT

Pursuant to sections 67-5270 and 67-5272, Idaho Code, if this preliminary order becomes final, any party aggrieved by the final order or orders previously issued in this case may appeal the final order and all previously issued orders in this case to district court by filing a petition in the district court of the county in which:

i. A hearing was held,
ii. The final agency action was taken,
iii. The party seeking review of the order resides, or
iv. The real property or personal property that was the subject of the agency action is located.

The appeal must be filed within twenty-eight (28) days of this preliminary order becoming final. See section 67-5273, Idaho Code. The filing of an appeal to district court does not itself stay the effectiveness or enforcement of the order under appeal.

State of Idaho
DEPARTMENT OF WATER RESOURCES
Southern Region • 650 Addison Ave W, Suite 500 • Twin Falls, Idaho 83301-5858
Phone: (208) 736-3033 • Fax: (208) 736-3037 • Website: www.idwr.idaho.gov

C.L. "BUTCH" OTTER
Governor

GARY SPACKMAN
Director

March 4, 2013

Carleen Herring
Region IV Development
315 Falls Avenue, Evergreen Building, SIDC Wing, #C77
College of Southern Idaho Campus
Twin Falls, Idaho 83301

Dear Ms. Herring:

As you recall, you recently inquired about the status of three water right applications in the name of the City of Gooding that are under consideration with our office:

- Water Right Transfer Application # 78927 which seeks to convert 7.21 cfs of decreed irrigation rights diverted from the Little Wood River to groundwater recharge use at a location northeast of the city.

- Water Right Transfer Application # 78928 which seeks to modify the city's existing decreed municipal water rights to allow for the diversion of 7.05 cfs from three existing wells and up to three new wells to be drilled.

- Application for Permit 37-22850 which seeks to appropriate 7.21 cfs of additional groundwater for municipal use from three existing wells and up to three new wells to be drilled.

The applications have all been advertised as part of the public notice process as required by statute, with no protests of the applications being filed. In addition, our office has received the required written comments from the water masters who have jurisdictional regulating authority over the rights involved with the applications. We have also received the legal notice publishing affidavit from the newspaper indicating that the legal notice was published correctly. **Draft approvals for all three applications have been created and are awaiting final review and signature.**

When IDWR issues water right approvals, they are issued as a "Preliminary Order". Once issued, the applicant, in this case the City of Gooding, has 14 days to review and contest the approval &/or approval conditions. Assuming there are no objections, the "Preliminary Order" will become final after 14 days of the issuance of the "Preliminary Order". **Pending no unforeseen circumstances, I would anticipate that the "Preliminary Orders" for each of the three applications will be issued within the next 30 days.**

If you have any questions, or if I can be of any further assistance, feel free to contact me at your convenience.

Sincerely,

Corey Skinner

Corey Skinner, PE
Water Resource Engineer

State of Idaho
Department of Water Resources

RECOMMENDATION OF WATERMASTER

Application No: 78928
Water Right No: 37-4080
Applicant Name: City of Gooding

Watermaster's Recommendation:

a) _X_ I do not oppose approval of this application

b) ___ I do not oppose approval of this application under the following terms:

c) ___ I oppose approval of this application(s) for the following reasons:

d) ___ Additional comment:

Dated: **February 27, 2014**

Water District 130

CJYenter
Cindy J Yenter, Watermaster

RECEIVED
FEB 1 4 2014
DEPT. OF WATER RESOURCES
SOUTHERN REGION

Affidavit of Publication

STATE OF IDAHO)
COUNTY OF TWIN FALLS) SS.

I, Ruby Aufderheide, being first duly sworn upon oath, depose and say that I am Legal Clerk of the TIMES-NEWS,published daily at, Twins Falls, Idaho, and do solemnly swear that a copy of the notice of advertisement, as per clipping attached, was published in the regular and entire issue of said newspaper, and not in any supplement thereof, for two consecutive weeks, commencing with the issue dated 6th day of February, 2014 and ending with the issue dated 13th day of February, 2014

And I do further certify that said newspaper is a consolidation, effective February 16, 1942, of the Idaho Evening Times, published theretofore daily except Sunday, and the Twin Falls News, published theretofore daily except Monday, both of which newspapers prior to consolidation had been published under said names in said city and county continuously and uninterruptedly during a period of more than twelve consecutive months, and said TIMES-NEWS, since such consolidation, has been published as a daily newspaper except Saturday, until July 31, 1978, at which time said newspaper began daily publication under said name in said city and county continuously and uninterrupted.

And I further certify that pursuant to Section 60-108 Idaho Code, Thursday of each week has been designated as the day on which legal notice by law or by order of any court of competent jurisdiction within the state of Idaho to be issued thereof Thursday is announced as the day on which said legal will be published.

Ruby Aufderheide
Ruby Aufdeheide, Legal Clerk

STATE OF IDAHO
COUNTY OF TWIN FALLS

On this 13th day of February, 2014, before me,

a Notary Public, personally appeared Ruby Aufdeheide,
known or identified to me to be the person whose name subscribed to the within instrument, and being by me first duly sworn, declared that the statements therein are true, and acknowledged to me that he executed the same.

Joyce A Engleman
Notary Public for Idaho
Residing at Twin Falls, Idaho 6/28/19

My commision expires:

JOYCE A. ENGLEMAN
NOTARY PUBLIC
STATE OF IDAHO

✓ ok DM
2/25/2014

The following application(s) have been filed to appropriate the public waters of the State of Idaho:

37-22850
CITY OF GOODING
308 5TH AVE W
GOODING, ID 83330
Point of Diversion SWSW S32 T05S R15E GOODING County
Source GROUND WATER Tributary
Point of Diversion L1(NENE) S6 T06S R15E GOODING County
Source GROUND WATER Tributary
Point of Diversion NESE S31 T05S R15E GOODING County
Source GROUND WATER Tributary
Point of Diversion SESW S32 T05S R15E GOODING County
Source GROUND WATER Tributary
Point of Diversion SWSW S5 T06S R15E GOODING County
Source GROUND WATER Tributary
Point of Diversion SENE S6 T06S R15E GOODING County
Source GROUND WATER Tributary
Use: MUNICIPAL 03/15 to 11/15 7.21 CFS
Total Diversion: 7.21 CFS
Date Filed: 8/27/2013
Place Of Use: MUNICIPAL
Place of use is within City of Gooding Service Area
Application proposes diverting up to 7.21 cfs from three existing wells and up to three new wells to be drilled all located within the City of Gooding. Water will be used for municipal use during the irrigation season within the City of Gooding service area. A mitigation plan, proposing recharging Little Wood River rights as described in companion transfer #78927, has been included with the application.

NOTICE OF PROPOSED CHANGE OF WATER RIGHT
TRANSFER NO. 78927

CITY OF GOODING, 308 5TH AVE W, GOODING, ID 83330; has filed Application No. 78927 for changes to the following water rights within GOODING County(s): Right No(s). 37-262A, 37-271A, 37-282, 37-662, 37-709A, 37-960A. The purpose of the transfer is to change a portion of the above rights as follows: Application proposes changing 7.21 cfs of Little Wood River rights currently authorized for irrigation use within the City of Gooding to groundwater recharge use northeast of the city. The application also proposes changing the authorized point of diversion from several locations in and near the City of Gooding to a new location approximately 1.9 miles north and 4.35 miles east of the Highway 26 and Highway 46 intersection at the south edge of Gooding. The proposed recharge site is generally located approximately 2.0 - 3.0 miles north and 1.5 - 3.75 miles east of the Highway 26 and Highway 46 intersection at the south edge of Gooding. The application proposal is associated with a mitigation plan submitted with companion Application for Permit 37-22850.

NOTICE OF PROPOSED CHANGE OF WATER RIGHT
TRANSFER NO. 78928

CITY OF GOODING, 308 5TH AVE W, GOODING, ID 83330; has filed Application No. 78928 for changes to the following water rights within GOODING County(s): Right No(s). 37-11221, 37-4080. The purpose of the transfer is to change a portion of the above rights as follows: Application proposes changing the authorized points of diversion for two municipal groundwater rights for the City of Gooding. The application proposes allowing for the diversion of up to 7.05 cfs of water from three existing wells and up to three proposed new wells all located within the City of Gooding.

NOTICE OF PROPOSED CHANGE OF WATER RIGHT
TRANSFER NO. 78962

JANET YATES and KIRTLAND YATES, 1941 S 2450 E, MALTA, ID 83342; has filed Application No. 78962 for changes to the following water rights within CASSIA County(s): Right No(s). 43-10593, 43-2307. The purpose of the transfer is to change a portion of the above rights as follows: Application for transfer proposes to add a point of diversion to groundwater irrigation rights 43-2307 & 43-10593, currently authorized for use on a farm located approximately 3.5 - 4.2 mi. S & 2.8 - 3.4 mi. E of Malta. These rights are currently authorized to divert 2.9 CFS (235 acres) from two wells located approximately 4.2 mi. S & 3.1 mi. E of Malta. Application proposes to add an existing well, located approximately 3.8 mi. S & 4.3 mi. E of Malta, to be allowed to be used under these rights.

NOTICE OF PROPOSED CHANGE OF WATER RIGHT
TRANSFER NO. 78963

UNITED STATES OF AMERICA ACTING THROUGH, USDI BUREAU OF LAND MANAGEMENT, IDAHO STATE OFFICE, 1387 S VINNELL WAY, BOISE, ID 83709-1657; has filed Application No. 78963 for changes to the following water rights within CASSIA County(s): Right No(s). 43-2408. The purpose of the transfer is to change a portion of the above rights as follows: Application for transfer proposes to add a point of diversion to groundwater irrigation right 43-2408, currently authorized for use on a farm located approximately 4.2 - 5.0 mi. S & 3.3 - 3.8 mi. E of Malta. This right is currently authorized to divert 2.45 CFS (200 acres) from a well located approximately 4.9 mi. S & 3.6 mi. E of Malta. Application proposes to add an existing well, located approximately 3.8 mi. S & 4.3 mi. E of Malta, to be allowed to be used under this right.

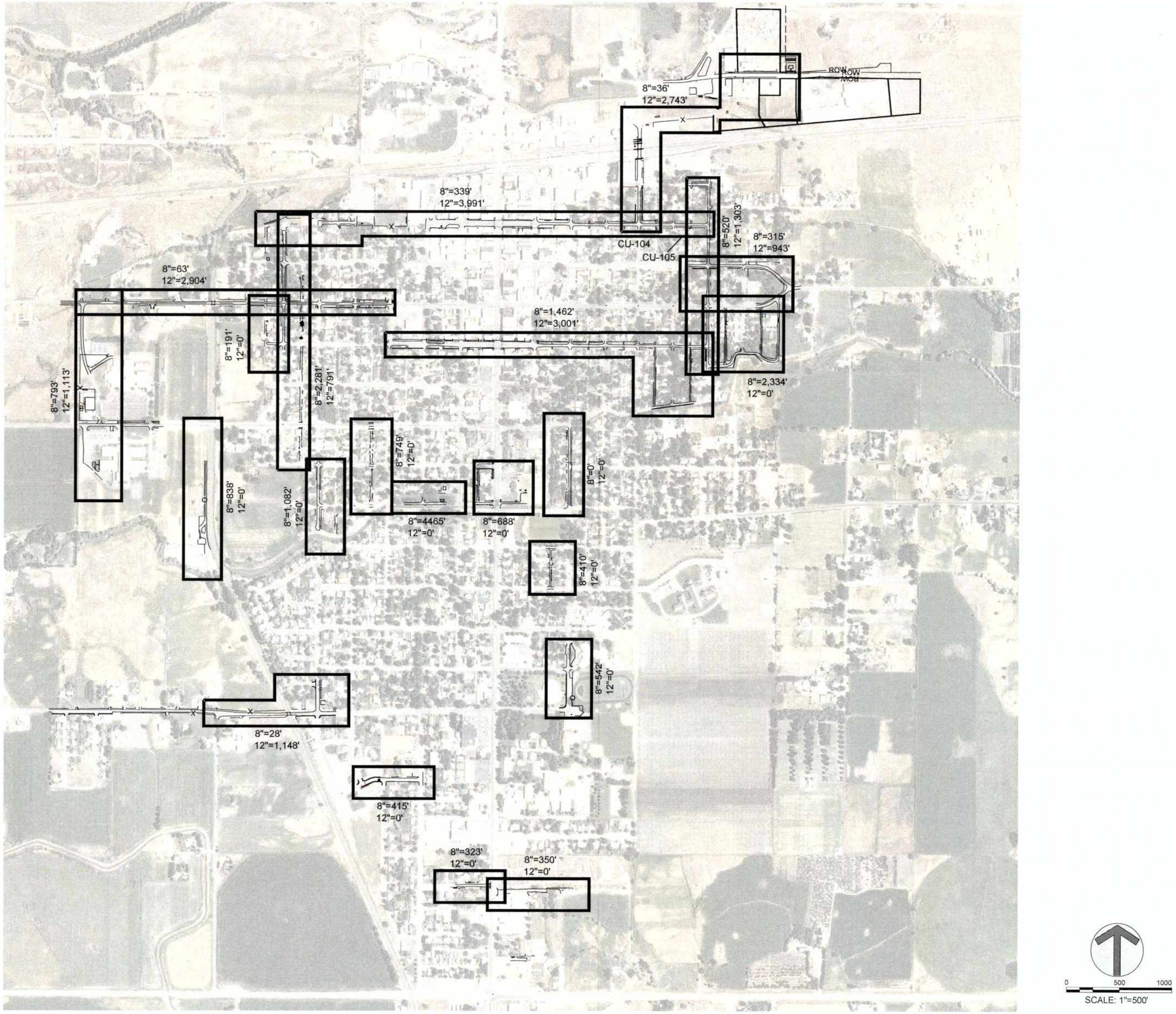
NOTICE OF PROPOSED CHANGE OF WATER RIGHT
TRANSFER NO. 79020

J7 LLC, C/O JEFFREY C JOHNSON, PO BOX 147, MALTA, ID 83342-0147; has filed Application No. 79020 for changes to the following water rights within CASSIA County(s): Right No(s). 43-2356B, 43-2441C, 43-4022B, 43-4023B, 43-4024D, 43-4130B. The purpose of the transfer is to change a portion of the above rights as follows: Application proposes creating a 949.4 acre permissible place of use on a farm located approximately 4.5 to 6.75 miles south and 1.75 to 3.25 miles east of Malta. Five rights on the farm will be modified to allow for use in the proposed permissible place of use. In addition, a 38 acre right currently used on a farm located approximately 8.25 to10.5 miles south and 1.75 to 3.25 miles east of Malta will be moved to the proposed permissible place of use. The application proposes diverting up to 17.5 cfs from five existing wells on the farm located approximately 4.5 to 6.75 miles and 1.75 to 3.25 miles east of Malta.

Permits will be subject to all prior water rights. For additional information concerning the property location, contact Southern Region office at (208) 736-3033; or for a full description of the rights &/or proposed transfer, please see www.idwr.idaho.gov/apps/ExtSearch/WRFiling.asp. Protests may be submitted based on the criteria of Sec 42-222 and 42-203A, Idaho Code. Any protest against the approval of this application(s) must be filed with the Director, Dept. of Water Resources, Southern Region, 650 Addison Ave W, Ste 500, Twin Falls, ID 83301 together with a protest fee of $25.00 for each application on or before February 24, 2014. The protestant must also send a copy of the protest to the applicant.
GARY SPACKMAN, Director
PUBLISH: February 6 and 13, 2014

ok DM
2/25/2014

Y:\PROJECTS\214131-000 GOODING WATER SYSTEM DESIGN\PHASE II\CAD\03 DES\DEV\PIPE LENGTHS FIGURE.DWG LAST SAVED: 3/1/2016 2:15 PM PRINTED: 3/24/2016 1:11 PM



NO.	REVISIONS	BY	DATE

This document or any part thereof in detail or design concept is the personal property of Keller Associates, Inc. and shall not be copied in any form without the written authorization of Keller Associates, Inc.

DRAWN:	KJW	CHECKED:	ONR
DESIGNED:	KJW	APPROVED:	JPM
CAD NAME:		SCALE: (Based on 22"x34" sheet)	AS NOTED

KELLER associates
305 North 3rd, Suite A
Pocatello, Idaho 83201
(208) 238-2146

CITY OF GOODING

WATER DISTRIBUTION SYSTEM IMPROVEMENTS

NEW WATER LINE LENGTHS

PROJECT NO. 214131

SHEET NO. FIG 1