

Environmental Report Wastewater System Improvements Gallatin Gateway Water and Sewer District

Prepared for:

Rural Development, US Department of Agriculture



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LIST OF ACRONYMS AND GLOSSARY

- BMPs** Best Management Practices – Methods that have been determined to be the most effective and practical means of preventing or reducing pollution (<http://www.epa.gov/ebtpages/envibestmanagementpractices.html>)
- CERCLA** Comprehensive Environmental Response, Compensation and Liability Act, commonly referred to as Superfund (<http://www.epa.gov/superfund/policy/cercla.htm>)
- CECRA** Montana Comprehensive Environmental Cleanup Responsibility Act, commonly referred to as MT State Superfund (<http://deq.mt.gov/statesuperfund/Cecra.mcp>)
- EA** Environmental Assessment – A concise public document for which a Federal agency is responsible that serves to: (1) briefly provide sufficient evidence and analysis for determining whether to prepare an environmental impact statement or a finding of no significant impact; (2) aid an agency’s compliance with the Act when no environmental impact statement is necessary; and (3) facilitate preparation of a statement when one is necessary. An EA shall include brief discussions of the need for the proposal, of alternatives to the proposed action, of the environmental impacts of the proposed action and alternatives, and a listing of agencies and persons consulted. (<http://ceq.hss.doe.gov/nepa/regs/ceq/1508.htm#1508.9>)
- EIS** Environmental Impact Statement – detailed document required by the National Environmental Policy Act for Federal Agency actions “significantly affecting the quality of the human environment.” A tool for decision-making, an EIS describes the positive and negative environmental effects of proposed actions, evaluates potential alternatives to the proposed action, and mitigation of potential adverse impacts. (<http://ceq.hss.doe.gov/nepa/regs/ceq/1508.htm#1508.9>)
- EPA** US Environmental Protection Agency (<http://www.epa.gov/>)
- ER** Environmental Report – report prepared by applicant to facilitate or serve as the regulatory agency’s Environmental Assessment for National Environmental Policy Act compliance
- FONSI** Finding of No Significant Impact – a document by a Federal Agency briefly presenting the reasons why an action will not have a significant effect on the human environment and for which an environmental impact statement therefore will not be prepared. (<http://ceq.hss.doe.gov/nepa/regs/ceq/1508.htm - 1508.13>)
- GGWSD** Gallatin Gateway Water and Sewer District – (<http://www.gatewaywsd.com/>)
- LUST** Leaking Underground Storage Tank

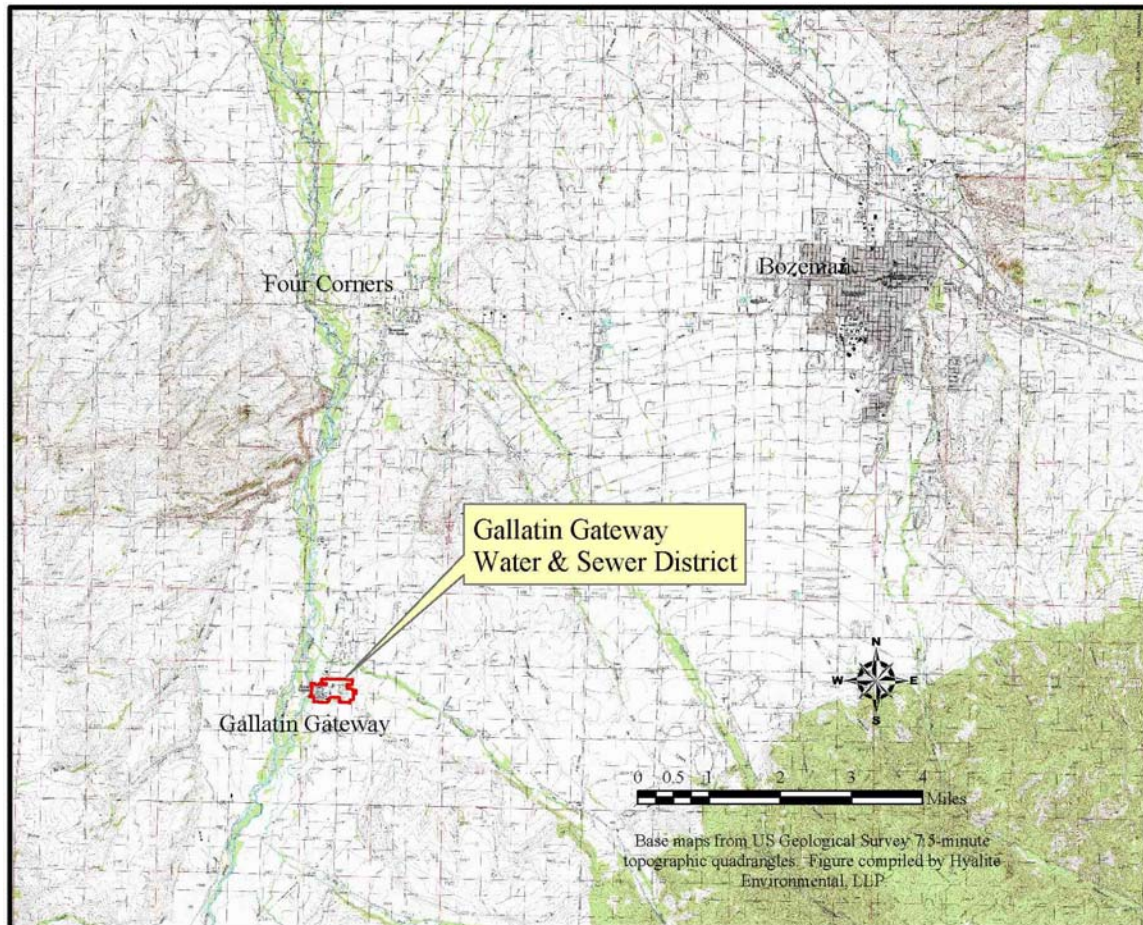
- MDEQ Montana Department of Environmental Quality (<http://deq.mt.gov/default.mcp>)
- MFWP Montana Fish, Wildlife and Parks (<http://fwp.mt.gov/>)
- MNHP Montana Natural Heritage Program (<http://mtnhp.org/>)
- MSHPO Montana State Historic Preservation Office (<http://www.his.state.mt.us/shpo/>)
- NEPA National Environmental Policy Act of 1969, as amended – Law that requires Federal Agencies to integrate environmental values into their decision-making processes by considering the environmental impacts of their proposed actions and reasonable alternatives to those actions. (<http://ceq.hss.doe.gov/nepa/regs/nepa/nepaeqia.htm>)
- NRCS US Department of Agriculture Natural Resource Conservation Service (<http://www.nrcs.usda.gov/>)
- NWI National Wetlands Inventory (<http://www.fws.gov/wetlands/>)
- PER Preliminary Engineering Report (<http://www.gatewaywsd.com/docs.html>)
- PM_{2.5} Particulate Matter less than 2.5 microns in diameter
- RCRA Resource Conservation and Recovery Act (<http://www.epa.gov/lawsregs/laws/rcra.html>)
- RUS Rural Utilities Service (<http://www.usda.gov/rus/>)
- SBR Sequencing Batch Reactor (http://en.wikipedia.org/wiki/Sequencing_batch_reactor)
- USCB US Census Bureau (<http://www.census.gov/>)
- USDA US Department of Agriculture (<http://www.usda.gov/wps/portal/usda/usdahome>)
- USFWS US Fish and Wildlife Service (<http://www.fws.gov/>)
- USGS US Geological Survey (<http://www.usgs.gov/>)
- UST Underground Storage Tank

1. **PURPOSE AND NEED FOR PROPOSAL**

1.1. **Project Description (Proposed Action)**

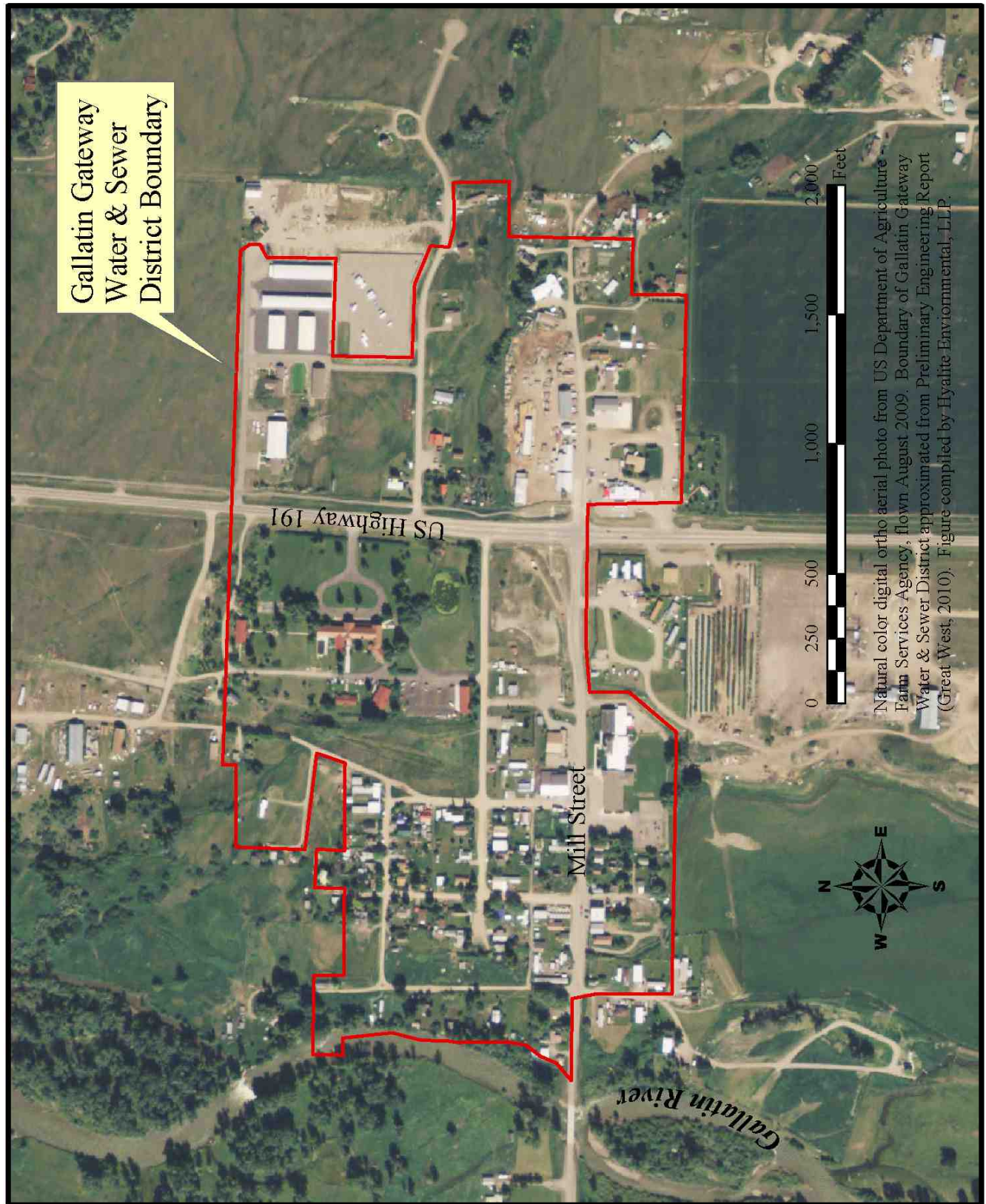
The Gallatin Gateway Water and Sewer District (GGWSD) (Figures 1 and 2) was formed to “provide a wastewater collection and treatment facility and a public water supply and distribution system within its boundaries and to do all things necessary and proper to maintain and operate these facilities” (GGWSD, 2009). Additional information concerning the GGWSD is available on their website at <http://www.gatewaywsd.com>.

Figure 1: Gallatin Gateway Water and Sewer District location



The GGWSD is currently pursuing funds through grants and loan programs to offset the expenses borne by residents of the District for the first phase of their mission, the provision of a wastewater collection and treatment facility. This Environmental Report (ER) is prepared to meet the requirements of the grant and loan application process for Rural Utility Services (RUS) of the Rural Development Division of the US Department of Agriculture (USDA) (the Agency), and to facilitate that Agency’s compliance with environmental laws, regulations and requirements. This ER will facilitate or serve as the Agency’s Environmental Assessment (EA) for National Environmental Policy Act (NEPA) compliance.

Figure 2: 2009 Aerial photo of the Gallatin Gateway Water and Sewer District



1.2. Purpose and Need of the Proposal

The purpose of the proposed action is to provide the community of Gallatin Gateway with a community wastewater system. The need for the project is: 1) to protect human health, safety and the environment; and 2) to support ongoing and future growth and development in the Gallatin Gateway community.

The community at Gallatin Gateway was originally established in 1865, and was previously named Slabtown (1865-1883) and Salesville (1883-1928) (Spritzer, 1999; Smith, 1996; VanWest, 1986). Gallatin Gateway is a rural unincorporated community in which much of development and building was carried out prior to the establishment of Health Department regulations in 1966. Many of the buildings, homes and residences have individual septic disposal systems that do not comply with current regulations. The majority of these systems are cesspools, seepage pits or metal septic tanks with drainfields that have either failed, or have a high potential of failing in the near future. The coarse-grained soils that provide only limited filtering or treatment, closeness of drinking water wells to individual septic disposal systems, and proximity of the developed town area to the Gallatin River present a threat to human health, safety and the environment.

Gallatin Gateway is considered an “Area of Concern” by the Gallatin City-County Board of Health and Health Department (Roark, 2010). Small lot sizes within the town prohibit adherence to State and County septic regulations (e.g., 100-foot-separation requirement between a water well and a septic disposal area or a 10-foot-separation from a septic disposal area and a property boundary line). New construction or replacement of failed systems in Gallatin Gateway require variances, which often can not be granted due to potential threat to human health, safety and the environment.

1.3. Role of the Environmental Report

This ER will be submitted by the GGWSD to the Agency to enable the Agency to evaluate the environmental effects of the proposal and to fulfill its obligations under NEPA and other environmental mandates. The ER is prepared for the GGWSD to document compliance with:

- The National Environmental Policy Act (NEPA) of 1969 (42 USC 4321);
- The Council on Environmental Quality’s regulations for implementing NEPA (40 CFR 1500-1508);
- The Department of Agriculture Rural Utility Service’s (RUS) regulations for implementing NEPA (7 CFR Part 1780 and 1794); and
- RUS Bulletin 1794A-602 *Guide for Preparing the Environmental Report for Water and Environmental Program Proposals* (USDA, 2008).

The Agency will review the ER and make the final decision regarding which action to take concerning funding and support of the proposed project on the basis of agency mission, legal mandates, input from the GGWSD Board of Directors, and public comment on this ER. The Agency may request revisions to this document or deem it sufficient to serve as the basis for an EA for the Agency.

The GGWSD proposes to move forward with the preferred alternative. In accordance with the NEPA, the appropriate Agency authority must determine if the preferred alternative will have a significant impact on the quality of the human environment. If there is no significant impact, the Agency will issue a Finding of No Significant Impact (FONSI). If there is a significant impact, additional analysis will require an Environmental Impact Statement (EIS) or the Agency Responsible Official may choose to not proceed with funding for the project. When the FONSI and Decision Record have been signed, the Agency will grant funds to facilitate GGWSD implementation of the preferred alternative.

This ER is being prepared for the GGWSD for submittal to the Agency by a member of the Gallatin Gateway community, Carol Lee-Roark, Ph.D., of Hyalite Environmental, LLP. Much of the information used in this report was provided by Great West Engineering, Inc., in the *Gallatin Gateway County Water & Sewer District Preliminary Engineering Report Wastewater System Improvements* (PER) (Great West Engineering, Inc., 2010).

1.4. Legal Mandates

Agency projects are required to comply with Federal, State, and Local substantive and procedural requirements, and with any applicable Federal, State, and Local requirements or Executive Orders that are more stringent than those listed in *RUS Bulletin 1794A-602, Guide for Preparing the Environmental Report for Water and Environmental Program Proposals* (USDA, 2008). The most significant Federal, State, and Local laws and regulations that are pertinent to the proposed project are listed in Appendix A. The list of laws and regulations in Appendix A is representative, not exhaustive, and is compiled for information, not for legal purposes. There is additional discussion of relevant legal requirements for the proposed project in the PER.

1.5. List of Environmental Permits

The proposed project will operate primarily under the permitting auspices of the Montana Department of Environmental Quality (MDEQ) as the State governmental agency with enforcement authority for the US Clean Water Act and specifically, the oversight and regulation of public wastewater. Sanitary surveys will be performed by either the local health authority, Gallatin City-County Environmental Health Department, or MDEQ. Some of the Federal, State, and Local government regulations that require permits for actions such as the County and/or State right-of-way encroachment, potential impacts to Waters of the US or wetlands, or construction storm water discharge permits, are listed in

Appendix A. The list of permits in Appendix A is representative, not exhaustive, and is compiled for information, not for legal purposes. There is additional discussion of permits required for the proposed project alternatives in the PER.

1.6. Scoping and Issues

Internal and external input on the proposed project was solicited as part of the NEPA process for this proposed project. Internal scoping consisted of a site visit, internal document and records review, interviews with GGWSD Board Members and the engineers that prepared the PER, and discussions with the Agency. On-site work was conducted in May and June, 2010.

External scoping included requests for input and information from other Agencies with potential interest or jurisdiction early in the project. Records of these contacts are included in Appendix B. The GGWSD has held multiple public meetings, for which notices were published in local news media. There is currently a monthly meeting of the Board, which is open to the public and for which agenda and minutes are posted on the GGWSD website. Appendix C includes representative documentation of public participation and input. Additional evidence of community support for this proposed action and concerns about water quality were voiced throughout the Gallatin Gateway Community Planning process, documented at http://www.gallatin.mt.gov/public_documents/gallatincomt_plandept/gallatincomt_lrplan/gateway

The issues recognized during site investigations and conversations with people knowledgeable with the proposed actions were:

1. Concerns about cost and the ability of the community to support the proposed project;
2. Questions concerning ability of the system to meet discharge and ground water non-degradation requirements; and,
3. An interest in predictability and flexibility in the future.

2. ALTERNATIVES

The proposed project scope of work includes provision of a wastewater collection system, including a lift station, and a wastewater treatment system. This section provides a description of reasonable alternative actions that address the Purpose and Need in sufficient detail to identify potential environmental impacts. The No-Action Alternative is included primarily as a baseline and for comparison (40 CFR 6.205(e)(1)(ii)).

A full complement of alternatives were examined and analyzed in the PER. Several alternatives were discarded by technical / engineering screening analysis performed in the PER. The alternatives that are considered in this ER are those that met technical / engineering screening criteria in the PER. The alternatives are listed here, with the preferred alternatives underlined. The preferred alternatives, as recommended by the PER, are underlined.

1. Collection System Alternatives

1.1. Gravity Collection – Street Layout

1.2. Gravity Collection – Alley Layout

2. Lift Station Alternatives

2.1. Single Centralized Lift Station

3. Treatment Alternatives

3.1. Connection to the Utility Solutions Wastewater Treatment Plant

3.2. Storage and Irrigation (Low Rate Land Application)

3.3. Septic Tank / Level 2 / Pressure Dosed Drainfield

3.4. Biological Nutrient Removal Mechanical Treatment Plant, Drainfield

The Board of Directors of the GGWSD voted unanimously to accept the recommendations of the PER and pursue the preferred alternatives identified in the PER (Meeting minutes, February 1, 2010). Discussions with USDA-Rural Development-Bozeman have indicated a desire that all alternative be retained through the ER to provide maximum options. Therefore, this ER will address all alternatives that satisfied screening criteria in the PER, and the No Action Alternative. Only a single Lift Station Alternative met the screening criteria, so all active alternatives will incorporate the Single Centralized Lift Station.

Descriptions of alternatives and figures of these alternatives were taken from the PER.

2.1. No Action Alternative

The No Action Alternative would continue wastewater treatment systems that currently exist in Gallatin Gateway. Current systems are individual cesspools, seepage pits or metal septic tanks with drainfields. These systems are old, do not meet current regulations, and continue to fail. Replacement of failed systems in these small lots often requires a variance of current regulations, which in most cases cannot be granted since it is not appropriately protective of human health, safety and the environment.

2.2. Collection System Alternatives

Two collection system alternatives met the screening criteria of the PER: Gravity Collection – Street Layout; and Gravity Collection – Alley Layout. Potential implementation of these alternatives are shown in Figures 3 and 4, from the PER. Gravity collection has no energy requirements. As with any engineered alternative, care would be required to properly install the collection system and any future expansions / future services – in this case, to prevent ground water infiltration. The PER preferred alternative is the Alley Layout.

Figure 3: Gravity Collection – Street Layout

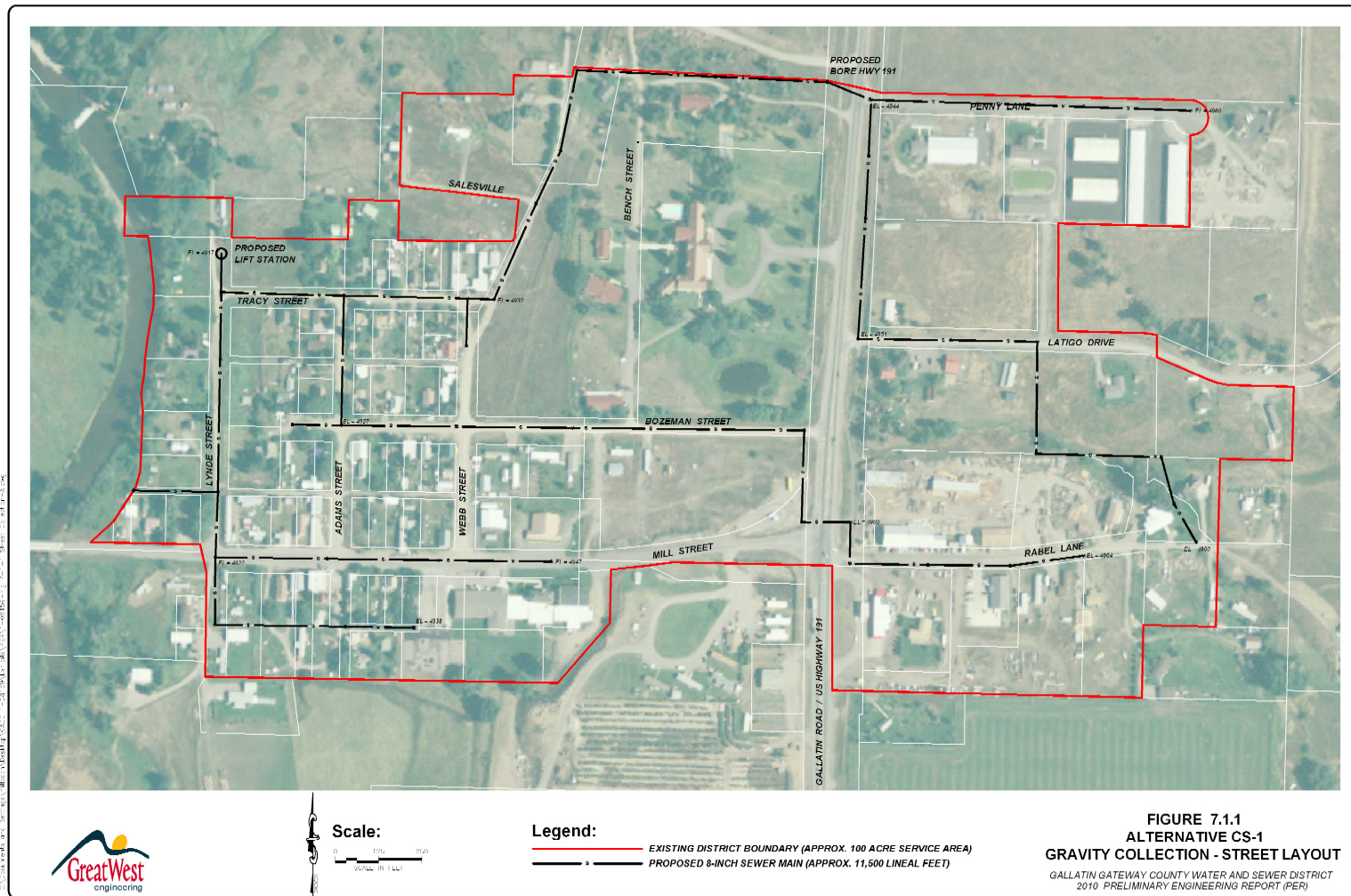
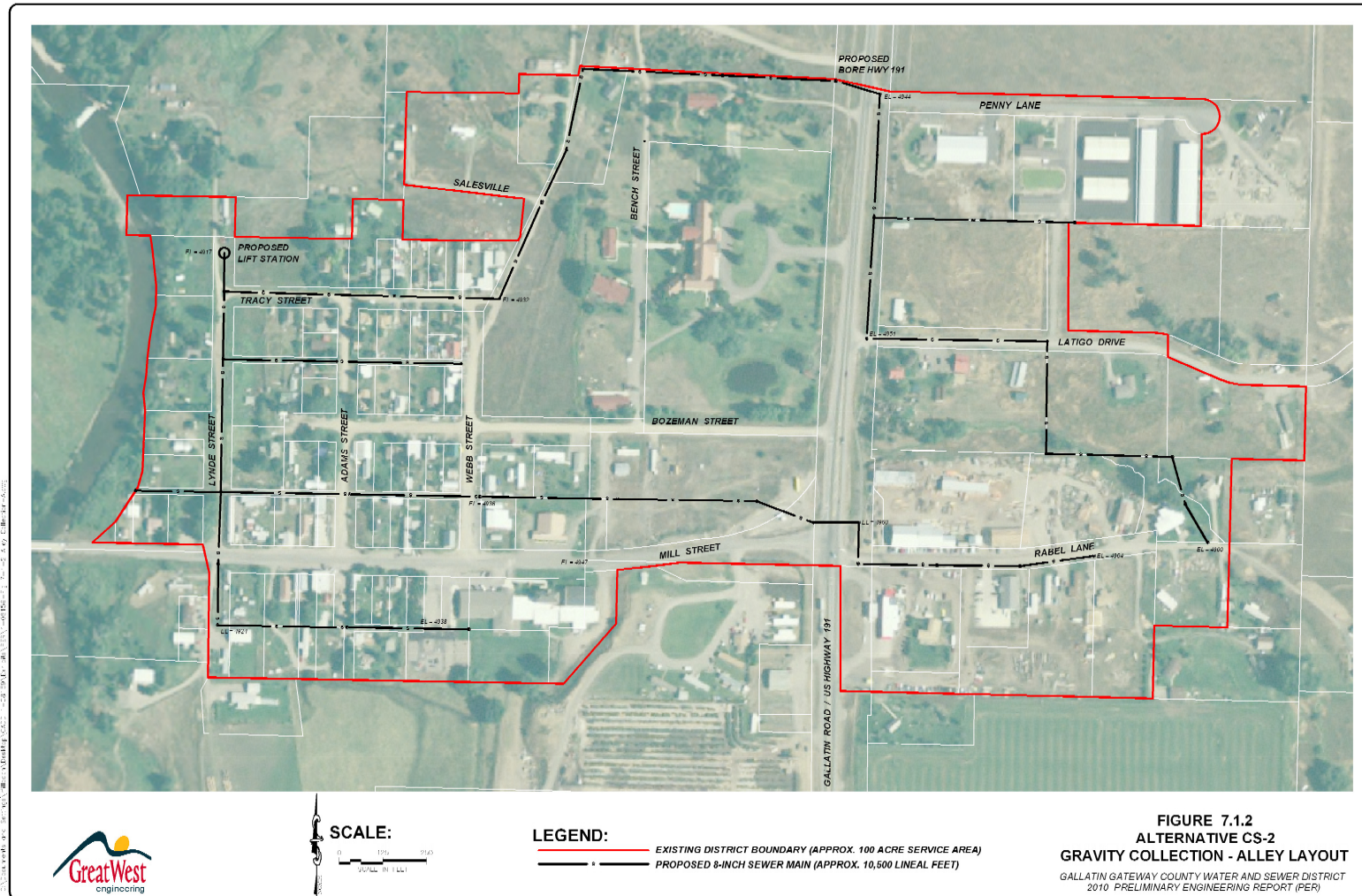


Figure 4: Gravity Collection – Alley Layout -- PER Preferred Collection Alternative



2.3. Lift System

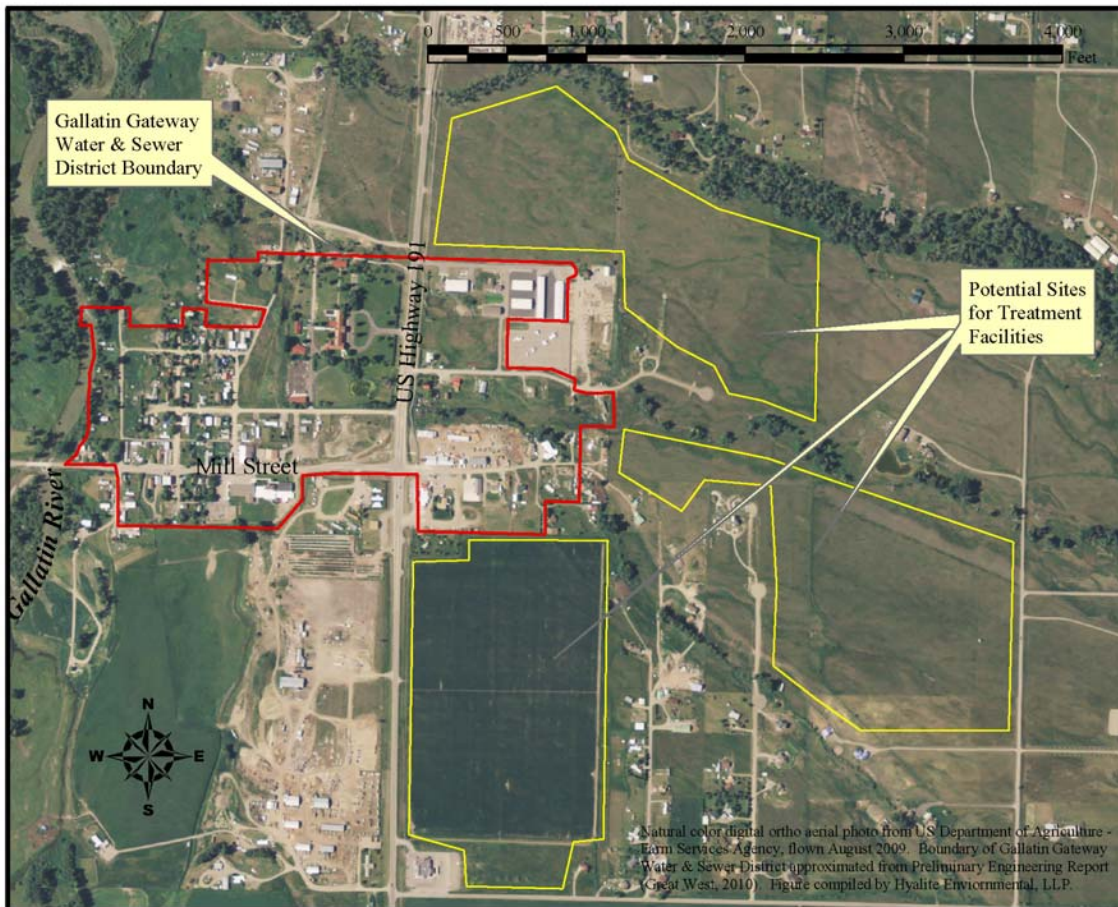
The only lift system alternative that satisfied engineering screening criteria was a single centralized lift station. Analysis in the PER recommended a packaged submersible lift station.

The location of the potential lift station has been further considered since the representative location shown in Figure 3 and 4 from the PER. Two locations are being considered: either the east side of Lynde Street, north of Tracy Street, or in the right-of-way for Bozeman Street on the northwest corner of the intersection of the right-of-way for Bozeman Street with Lynde Street. Both of these locations are outside of the 500-year floodplain of the Gallatin River.

2.4. Treatment Alternatives

There are four active treatment alternatives. Three of these would require a treatment site located in the vicinity of the GGWSD. Potential treatment sites identified in the PER for the three local treatment alternatives are illustrated in Figure 5.

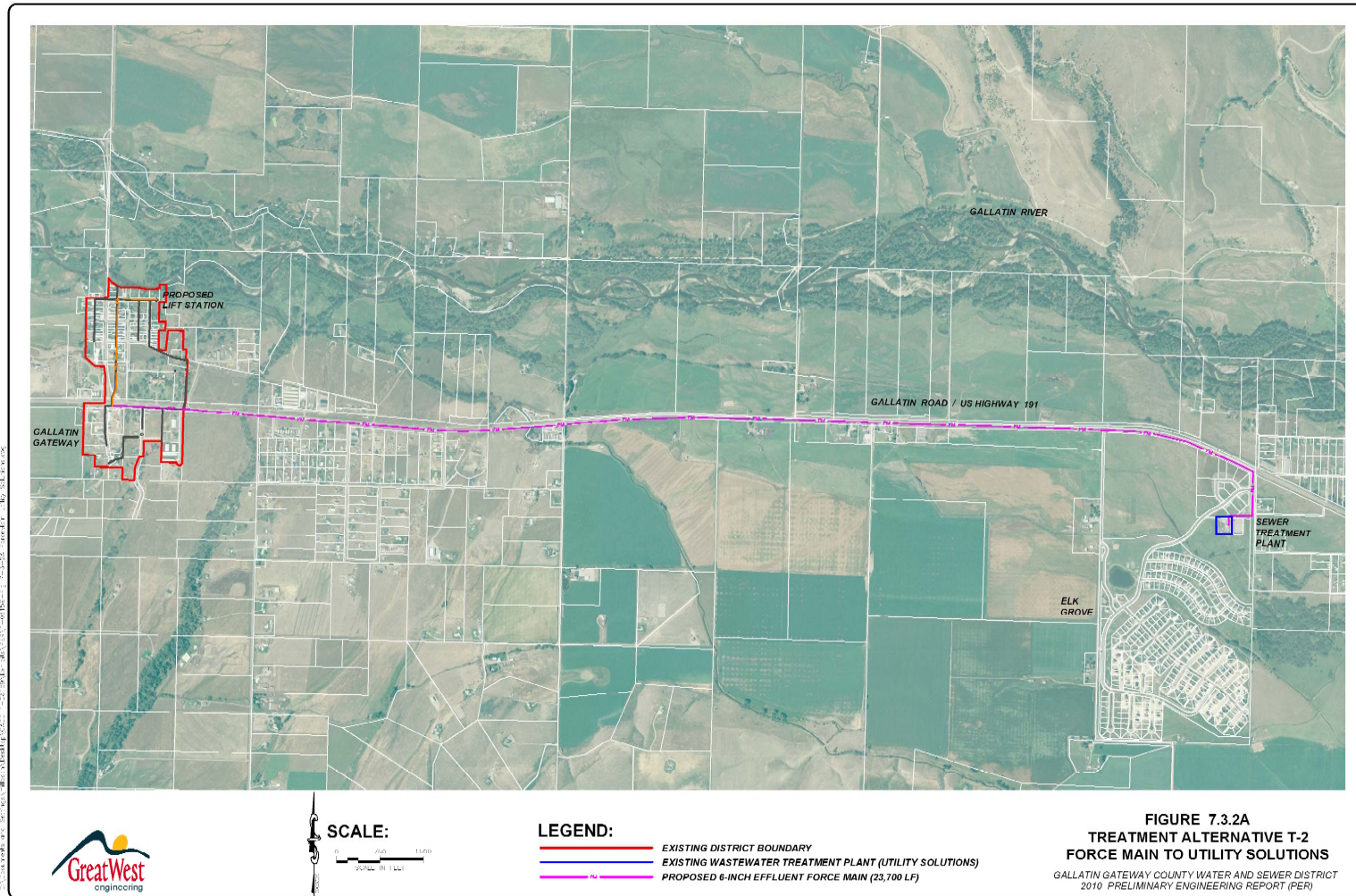
Figure 5: Potential Areas for Treatment Facilities



2.4.1. Connection to the Utility Solutions Wastewater Treatment Plant

The GGWSD is approximately 4 miles from the Utility Solutions wastewater treatment plant at Elk Grove. Discussions with Utility Solutions have indicated that they have sufficient capacity to accommodate the GGWSD wastewater. Wastewater from the Gallatin Gateway collection system would be transported to the Utility Solutions treatment facility in a force main that would be installed in US Highway 191 right-of-way. Construction of the line would require coordination and approval from the Montana Department of Transportation. Wastewater at the Utility Solutions plant is treated by the use of an Oxidation Ditch Mechanical Treatment Plant that discharges to groundwater through infiltration / percolation galleries. Treatment energy and land requirements, sludge disposal and other operations and maintenance concerns would all be deferred from the GGWSD to Utility Solutions with this alternative. Utility Solutions would require that they have control over installation, operations and maintenance of the force main system. Ongoing business changes and issues make the Utility Solution alternative uncertain, but the alternative has been retained for decisions made later in the funding cycle for the project. This alternative is illustrated in Figure 6.

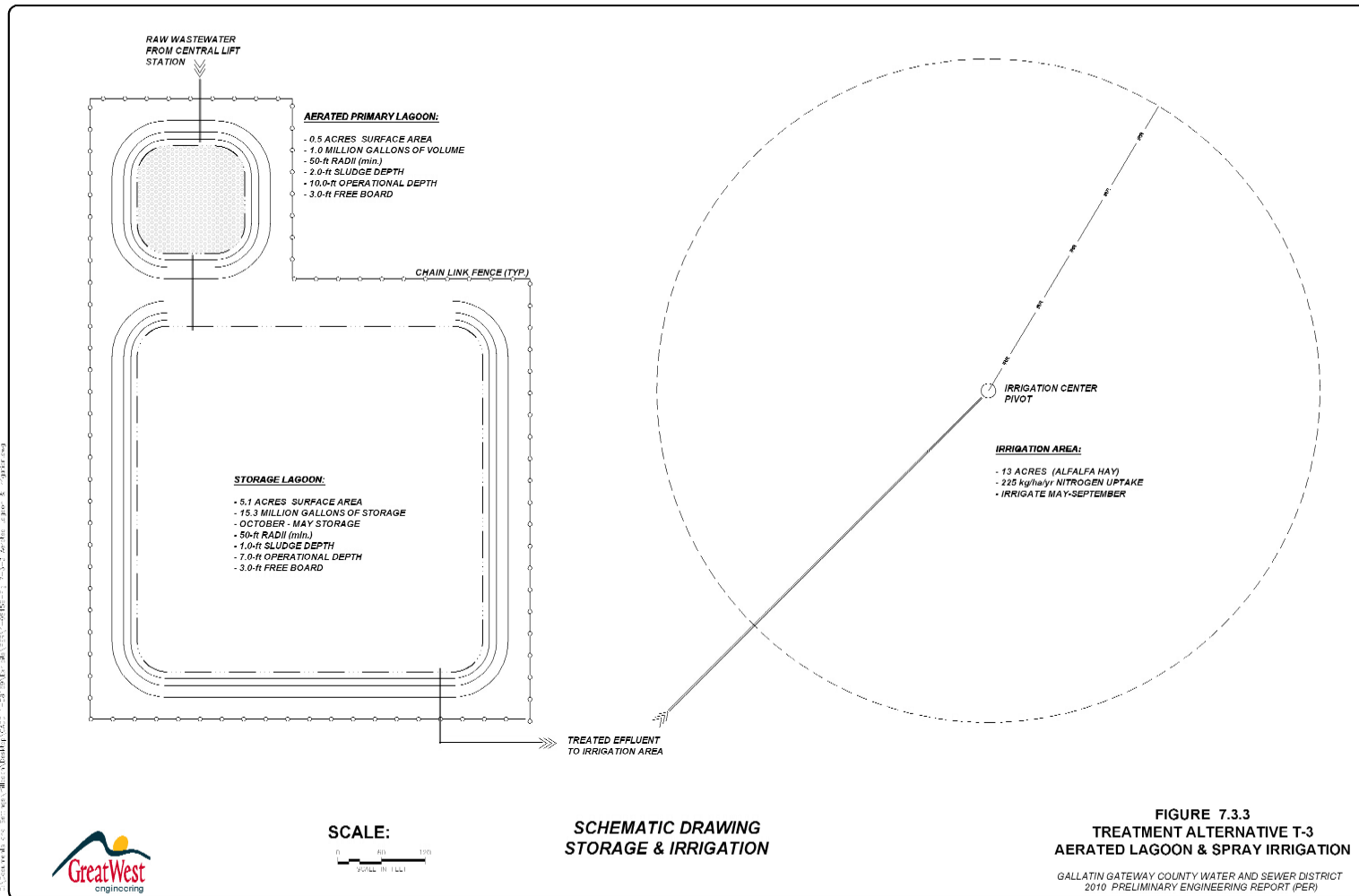
Figure 6: Connection to the Utility Solutions Wastewater Treatment Plant



2.4.2. Storage and Irrigation (Low Rate Land Application)

The storage and irrigation alternative consists of primary treatment lagoon(s), storage lagoon(s) and a spray irrigation system for effluent disposal. The PER engineering analysis selected an aerated, rather than non-aerated, primary treatment lagoon. The combined storage and treatment lagoons would require 5.6 acres, and would require appropriate liners and subsoils. Effluent production would require 13 acres of alfalfa hay to be irrigated, for a total facility of 18.6 acres, minimum. This alternative has significant energy requirements, estimated to be approximately 87,500 kilowatt-hours/year. Sludge would be removed and disposed from treatment and storage lagoons at regular intervals, as required. This alternative is illustrated in Figure 7.

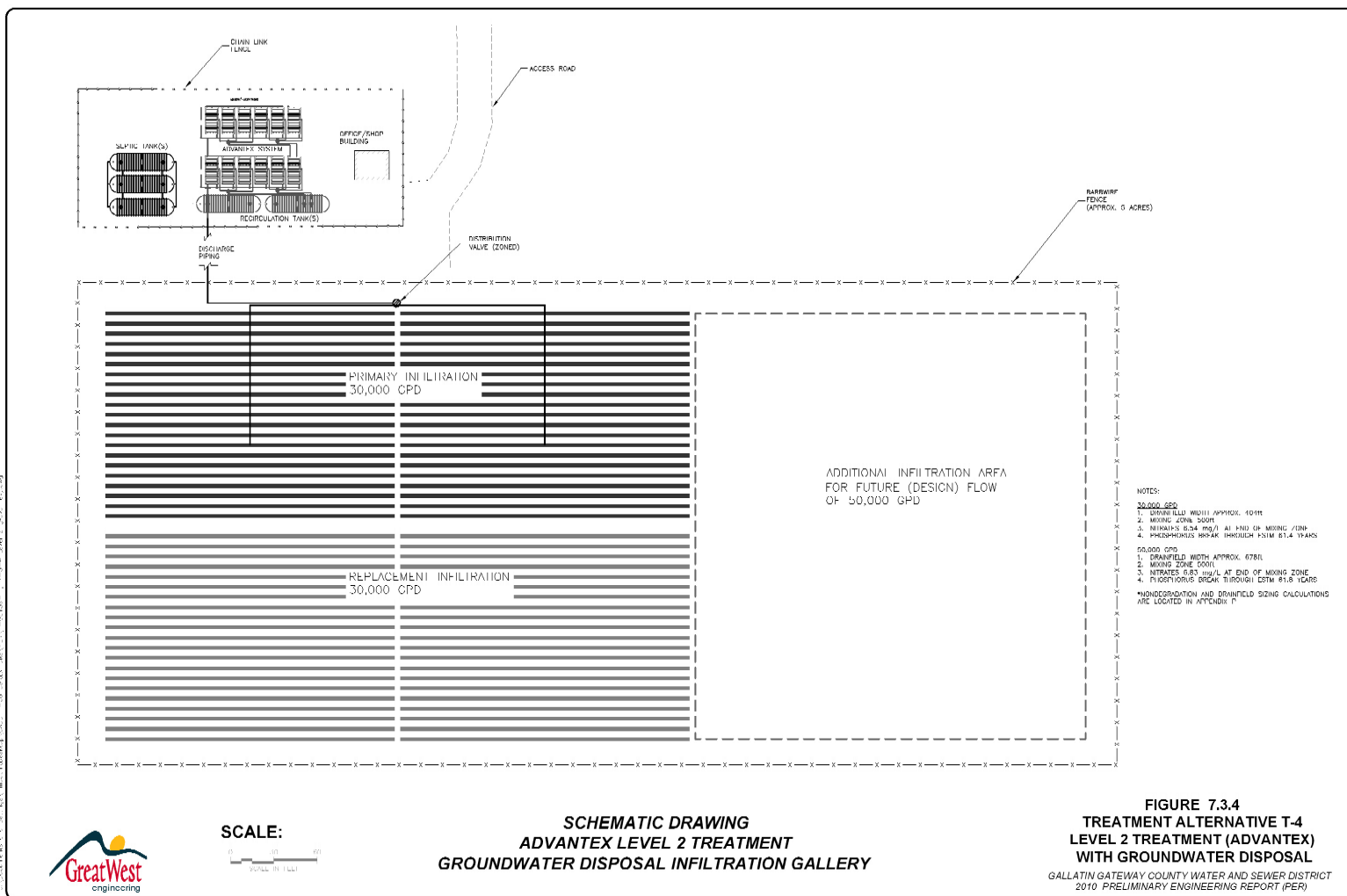
Figure 7: Storage and Irrigation (Low Rate Land Application)



2.4.3. *Septic Tank / Level 2 / Pressure Dosed Drainfield – PER Preferred Treatment Alternative*

This alternative consists of three primary components: a centralized septic tank, Level 2 treatment system, and a pressure-dosed drainfield. The septic tank uses gravity settling and flotation to separate solids from liquids. The liquid, or effluent, is then pumped to the Level 2 subsurface wastewater treatment system. The system includes a piping network and synthetic textile media filters. The effluent is filtered, collected and re-circulated through the system several times. This process is an oxygen-rich aerobic environment where microorganisms can remove impurities from the effluent. The clean effluent is pumped to the drainfield (infiltration gallery). The drainfield consists of a series of distribution pipes with holes through which the wastewater is uniformly distributed. The distribution pipes discharge the wastewater into buried seepage trenches designed to spread the wastewater out and facilitate seepage into the subsoil. The soil matrix provides continued treatment. The system would require 5.5 acres, and would require appropriate subsoils. Energy consumption would be approximately 47,000 kilowatt-hours/year. Sludge would be removed and disposed from the tank at regular intervals, as required. This alternative is illustrated in Figure 8.

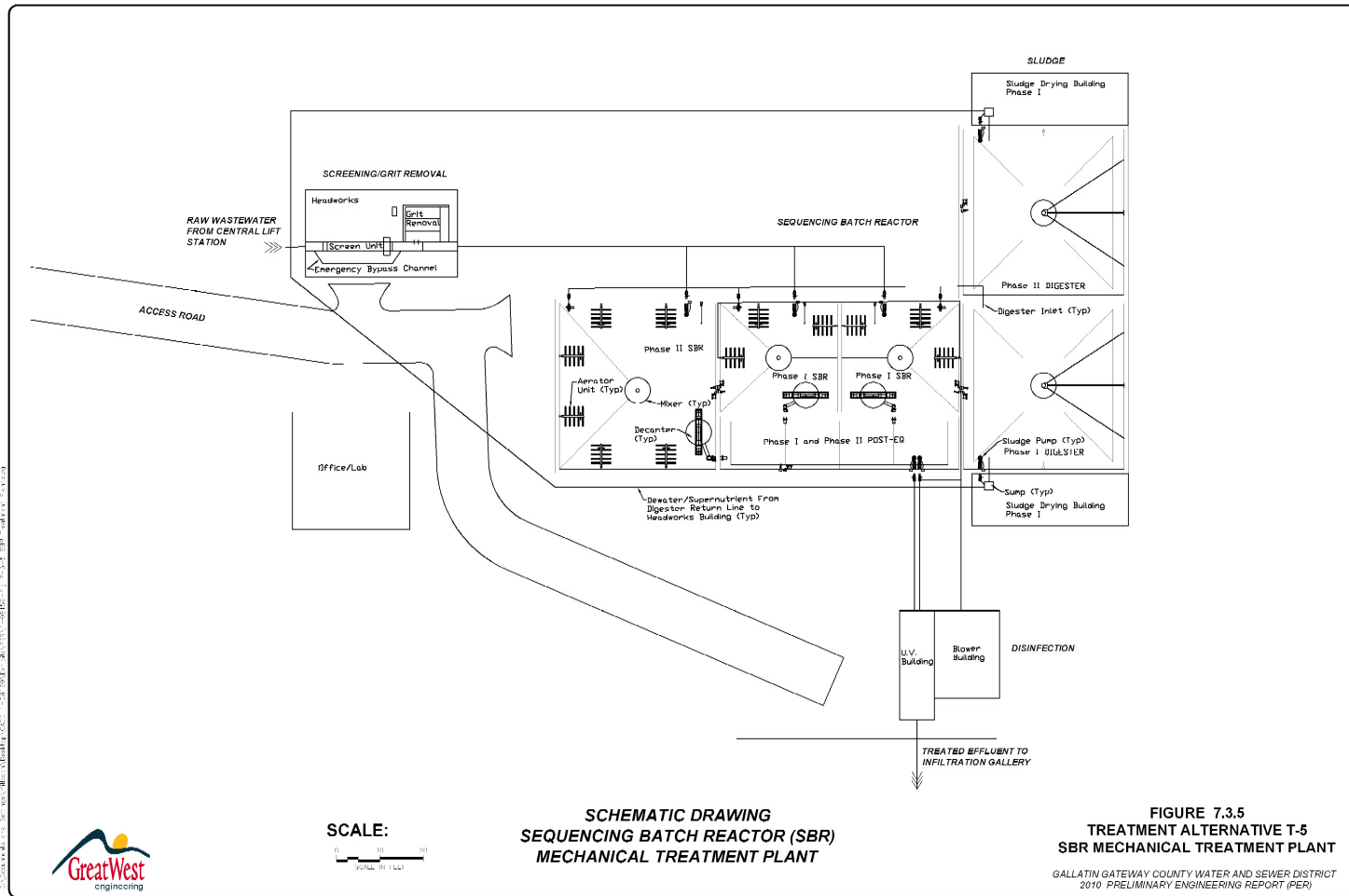
Figure 8: Septic Tank / Level 2 / Pressure Dosed Drainfield – PER Preferred Treatment Alternative



2.4.4. Biological Nutrient Removal Mechanical Treatment Plant, Drainfield

The Biological Nutrient Removal alternative considered in the PER is Sequential Batch Reactors (SBR). An SBR is a mechanically aerated activated sludge system with the capability to adjust the treatment process to remove both nitrogen and phosphorous, improving the ability of the system to meet ground water discharge non-degradation limits. This system includes pretreatment, at least two tanks, biological fixation of nutrients, clarification, disinfection and discharge of effluent to a ground water infiltration gallery. Sludge is dewatered and stored for periodic disposal. SBR would have the smallest footprint of the treatment alternatives considered, approximately 1 acre for facilities and 2 acres for the drainfield. The drainfield would require appropriate subsoils. The energy requirements of this alternative are high, approximately 110,000 kilowatt-hours/year. This treatment alternative is illustrated in Figure 9.

Figure 9: Biological Nutrient Removal Mechanical Treatment Plant with Discharge to Drainfield



3. AFFECTED ENVIRONMENT

The GGWSD is located in the Northern Rocky Mountains physiographic province, in the Gallatin Valley (Townsend Basin geomorphological landform) (Woods and others, 2002). The climate is semiarid continental, typical of an intermontane valley, with a mean average annual temperature of 43.6 degrees Fahrenheit and 16.32 inches of annual precipitation (WRCC, 2010). The average maximum temperature in July is 82.3 degrees Fahrenheit, average minimum temperature in January is 12.4 degrees Fahrenheit, and average snow depth in February is 3 inches (WRCC, 2010). The proposed facilities would serve a community centered around an historic small town located approximately 9.3 miles southwest of Bozeman, MT, and approximately 12.6 miles south of Belgrade, MT.

The possible alternatives would potentially affect three areas: the GGWSD itself (Figure 2), the potential treatment areas east of the GGWSD (Figure 5), and / or the Highway 191 corridor north from the GGWSD to Elk Grove and the Utility Solutions treatment facility (Figure 6).

3.1. Earth Resources

3.1.1. Geology

The Gallatin Valley lies at the eastern margin of basin-and-range extension in Montana and is within the eastern half of the Three Forks intermontane structural basin (Vuke and others, 2002; Slagle, 1995; Hackett and others, 1960). The valley is an east-tilted graben (down-dropped fault block). Precambrian rocks probably floor the valley, but the majority of the basin is filled with Tertiary sedimentary rocks, over which Quaternary alluvium was deposited. The GGWSD is primarily underlain by Quaternary alluvial fan deposits (Vuke and others, 2002). The westernmost portion of the GGWSD also includes some areas of Quaternary alluvium of modern channels and floodplains. Alluvial fan deposits are primarily composed of a heterogeneous mixture of coarse-to fine-grained sediments ranging in size from boulders to clay. The stream-related alluvial deposits are sorted, and consist of cobbles and gravel intermixed with sand, silt, and clay (Slagle, 1995). Bedrock is well over 100 feet below the ground surface in the GGWSD (GWIC, 2010).

The potential treatment facility sites located east of the GGWSD, are underlain by the same two geologic units: Quaternary alluvial fan and stream deposits. The Highway 191 corridor north of Gallatin Gateway to the Utility Solutions facility is underlain by older alluvial fan deposits.

3.1.2. Soils

The GGWSD is dominated by areas of three soil units (NRCS, 2010): Sudworth Nesda loams, 0-2% slopes; Hyalite-Beaverton complex, 0-4% slopes; and Corbly very gravelly sandy loam, 0 to 4% slopes. None of these units or the minor occurrences of other units within the District boundary are rare soil units or hydric soil units. None of these units are considered to be prime farmland or farmland of statewide importance, but they are each considered to be “farmland of local importance.” Although the Sudworth-Nesda loam itself is not a hydric unit, it may contain components that are hydric in 2% of its mapped areal extent.

The areas east of the GGWSD that are potential sites for a treatment facility are characterized by Hyalite Beaverton complex, 0-4% slopes; Corbly very gravelly sandy loam, 0-4% slopes; and Beaverton cobbly clay loam, 0-2% slopes (NRCS, 2010). None of these soil units are rare or hydric. All three units are “farmland of local importance.”

The US Highway 191 corridor north from the GGWSD to the Utility Solutions treatment facility crosses areas of the following soil units (NRCS, 2010): Beaverton cobbly clay-loam, 0-2% slopes; Hyalite-Beaverton complex, 0-4% slopes; Bandy-Riverwash-Bonebasin complex, 0-2% slopes; Ancy-Trimad-Meagher complex, 15-60% slopes; Meadowcreek loam 0-4% slopes; Lamoose silt loam, 0-2% slopes; and Meadowcreek silty clay loam, 0-2% slopes. None of these soil units are rare. The Bandy-Riverwash-Bonebasin and Lamoose are hydric soil units in 50 to 85 % of the area in which they are mapped. The Meadowcreek may contain a hydric component in approximately 10% of its mapped areal extent. The Meadowcreek soil unit is classified as “prime farmland if irrigated.” The Beaverton, Hyalite-Beaverton, and Lamoose are considered to be “farmland of local importance.”

3.1.3. Topography

The western portion of the District is located on a relatively flat stream terrace above the Gallatin River. The eastern portion of the District is located on a gently sloping alluvial fan. There is a relatively steep topographic step between these two portions of the District, located just west of US Highway 191. The topographic step is expressed most strongly at the southern center of the GGWSD, and dies out toward the northern boundary. The highest point of the District is in the southeast, at approximately 4975 feet above mean sea level, and the lowest is along the Gallatin River in the northwest, at approximately 4915 feet above mean sea level (USGS, 2000). Wortman Creek flows westward through the center of the District and a distributary channel of South Cottonwood Creek crosses the northeast corner of the District.

The three potential treatment areas are adjacent to the District to the east, slightly up slope on the alluvial fan. Area A, northeast of the District, slopes gently to the west-northwest and ranges from approximately 5000 to 4950 feet above mean sea level (USGS, 2000). Area B, east of the District, and Area C, southeast of the District, show a

similar gradual west-northwest slope. Area B is approximately 5030 to 5980 feet above mean sea level, and Area C is approximately 5000 to 4970 feet above mean sea level.

The Highway 191 corridor north of the District to the Utility Solutions treatment facility is directly north across the alluvial fan. In the vicinity of the District, the slope of the alluvial fan is west-northwest. Within approximately one mile north of the District, the slope of the alluvial is more directly north. This corridor is approximately 4945 feet above mean sea level at the northern boundary of the District and approximately 4780 feet above mean sea level at the Utility Solutions treatment facility (USGS, 2000). The corridor crosses South Cottonwood Creek, two un-named tributaries of the West Gallatin River, Farmers Canal, and Elk Grove Slough.

3.2. Water Resources

3.2.1. *Ground Water*

Within the District boundaries, ground water is 30 to 40 feet below the ground surface on the bench east of the highway, and 5 to 10 feet below the ground surface in the western portion of the District along the Gallatin River (Great West Engineering, Inc., 2010). Public ground water data and a publicly available ground water study indicate that the ground water flow direction is approximately 24-degrees north of west at a gradient of 0.013 feet/feet (GWIC, 2010; Nicklin Earth & Water, Inc., 2006).

Ground water in the three potential treatment areas identified range from approximately 10 feet below the ground surface in the vicinity of streams to 46 feet below the ground surface on the easternmost portions on the alluvial fan (GWIC, 2010).

Within the Highway 191 corridor to the north of the GGWSD, ground water ranges from 20 to 40 feet below the ground surface at the northern edge of the GGWSD to Zachariah Lane (GWIC, 2010). North of Zachariah Lane to the Utility Solutions Elk Grove treatment facility ground water is 5 to 10 feet below the ground surface.

Ground water well logs indicate that regionally the majority of wells produce from the unconfined alluvial aquifer (GWIC, 2010). In the vicinity of the GGWSD there is a clay layer that may act as a confining layer, at least locally, for some wells (Great West Engineering, Inc., 2010).

Ground water quality data is primarily limited in the areas of interest to the public water supply wells, which typically produce from deeper ground water than private wells. The available water quality data from these public water supply wells do not show any water quality issues. There have been no water quality violations in the previous five years (MDEQ, 2010a) for (from south to north): Stacey's Old Faithful Bar and Restaurant, Gallatin Gateway School, Gallatin Gateway Inn, Gateway Market and Café, Gallatin Gateway Community Church, Gravel Hollow Subdivision or Elk Grove Subdivision. There have been a few coliform and nitrate violations at the public water supply well at Country Court, which have been resolved. Source Water Delineation and Assessment

reports for the Gateway Market and Gallatin Gateway Inn noted a few positive total coliform sampling results, which were resolved. There is ground water quality data from a single domestic water supply well in the Highway 191 corridor which likely produces from 31 feet below the ground surface (Hugh Spraggins well, GWIC#130168)(GWIC, 2010). That well had no exceedances of water quality standards when sampled in 1992. This well is not a public water supply, so there are no coliform monitoring data available.

There is concern about ground water quality in the town core of Gallatin Gateway, due to small lot sizes, insufficient distance between wells and adjacent septic systems, and many old, potentially failing septic systems that do not meet current health and safety standards. There is little or no scientific data to confirm these concerns, as documented in the PER, but the concerns are considered to be valid from qualitative evidence.

The ground water table in the Lamoose silt loam, 0-2% slopes, encountered in the Highway 191 corridor just north of Zachariah lane to slightly north of Axtell-Anceny Road, can be as high as 1 to 2 feet below the ground surface in April through July (NRCS, 2010). It must be anticipated that shallow ground water may be encountered in this reach of the corridor.

3.2.2. Surface Water

As mentioned previously in Section 3.1.3, there are several surface water bodies within the potential project boundaries. The GGWSD is bound on the west by the Gallatin River. This reach of the Gallatin River is not considered to be impaired (Yashan, 2010, Appendix B page B9). Flow data is available for the USGS station at the confluence of Spanish Creek with the Gallatin River, approximately 7 miles upstream of Gallatin Gateway.

Two small drainages cross the GGWSD: Wortman Creek and an un-named distributary channel of South Cottonwood Creek. Surface water rights are owned on these streams (DNRC, 2010), but there is no publicly available flow or water quality data for them. The potential treatment areas are located adjacent to the two streams that cross the GGWSD and South Cottonwood Creek, but do not include the channels in any of these drainages.

The US Highway 191 corridor north of the GGWSD to Elk Grove to the Utility Solutions treatment facility crosses South Cottonwood Creek, two un-named tributaries of the Gallatin River, Farmers Canal, and Elk Grove Slough. Farmers Canal is a privately owned irrigation ditch distributing Gallatin River water rights. There is no publicly available streamflow data for the other streams, but there are water rights from each of them (DNRC, 2010).

The westernmost portion of the GGWSD lies within the Gallatin River riparian zone. A map of the floodplain and floodway is included in Appendix D. Some of the proposed gravity sewer lines may lie within the 500-year floodplain, but none of the main infrastructure (lift station, treatment facility) would be located within the 500-year floodplain of the Gallatin River (FEMA, 2010). Some of the proposed sewer collection

sewer collection lines will cross the floodplains of Wortman Creek and the un-named distributary channel of South Cottonwood Creek. The force main in the US Highway 191 corridor from the GGWSD to the Utility Solutions facility at Elk Grove would cross through the floodplain of each of the stream crossed, as identified previously.

3.3. Air Resources

The potential project location(s) are located in an “unclassifiable”/attainment area of Montana for air quality under 40 CFR 81.327, as amended. The nearest air quality monitoring data is from the Belgrade (12.5 miles) and Bozeman (9.9 miles) air quality monitoring stations. These stations are currently at 86% and 63% of their 24-hour limit of PM_{2.5}, and 65% and 43% of the annual limit of PM_{2.5} (EPA, 2010a). (Odors are addressed as an aesthetic issue in Section 3.6.3.)

3.4. Biological Resources

3.4.1. Vegetation and Habitat Types

The GGWSD is primarily developed, urban land use, with informal landscaping. The developed area ranges from “developed, medium intensity” in a few spots to regions of “developed, low intensity” in a matrix of “developed, open space” (USGS, 2010).

The native communities in the vicinity of the GGWSD include Rocky Mountain lower montane riparian woodland and shrubland in riparian corridors and small drainages, dominated by willows (*Salix spp.*), cottonwood (*Populus spp.*), and red osier dogwood (*Cornus sericea*) in the wetter sites and chokecherry (*Prunus virginiana*), Saskatoon serviceberry (*Amelanchier alnifolia*), common snowberry (*Symphoricarpos alba*), and Woods’ rose (*Rosa woodsii*) on drier sites. Grasses in the upland areas away from stream drainages are typical Rocky Mountain lower montane, foothill and valley grassland communities. Un-disturbed sites contain a rough fescue / Idaho fescue or bluebunch wheatgrass / Idaho fescue community. However, most sites have been disturbed and show higher occurrences of smooth brome (*Bromis inermis*), Sandberg’s bluegrass (*Poa secunda*), and western wheatgrass (*Pascopyrum smithii*). Agricultural land use in the vicinity is primarily hay and pasture.

The potential treatment areas are currently hay fields, pasture, and cultivated cropland with minor Rocky Mountain subapline montane mesic meadow (USGS, 2010). The US Highway 191 corridor is characterized by typical roadside grasses indicative of disturbance, adjacent hay fields and pasture, and informally landscaped yards. The US Highway 191 corridor close to the highway is primarily classified as “developed, open space” land cover, with some “developed, low intensity” areas. The relatively highly disturbed roadway corridor typically has higher occurrences of species such as cheatgrass and downy brome, as well as invasive and nuisance weeds.

The vegetation communities in the vicinity of the proposed project are not rare. Northern Rocky Mountain lower montane riparian woodland and shrubland and Rocky Mountain lower montane, foothill and valley grassland are ranked S4, a statewide ranking of “apparently secure”, and the Rocky Mountain subalpine-montane mesic meadow is ranked as S5, “secure” (MNHP, 2010).

3.4.2. Wildlife

There are land use limitations on the wildlife habitat both within and immediately surrounding the GGWSD. The GGWSD is developed, providing very little habitat. The vicinity surrounding the GGWSD to the south, east and north is primarily a rural, agricultural environment with open spaces. Common wildlife in these areas include rodents (moles, voles, ground squirrels, gophers, mice), foxes, skunk, deer, and coyotes, and a diverse bird community. Common reptiles include varieties of garter snakes, milksnake and western fence lizard. Amphibian communities include common toads, frogs and salamanders.

The Gallatin River riparian corridor provides important wildlife habitat in areas in which it has not been impacted by adjacent development. Common wildlife include those found in the adjacent shrub/woodlands and grasslands, but also include more typically riparian species such as martens, weasels, fishers, and raccoons. The riparian zone provides habitat for ducks, geese, herons, eagles, sandpipers and kingfishers as well as the bird species of the adjacent non-riparian areas. Common riparian reptiles include skinks, racers, turtles, gartersnakes and gophersnakes. The Gallatin River riparian corridor is habitat for many common species of frogs, toads and salamanders.

The Montana Fish, Wildlife and Parks MFISH database (MFWP, 2010) includes data for South Cottonwood Creek fisheries. Surveys and observations of the fishery in South Cottonwood Creek indicate that brook trout are common, and rainbow trout are abundant. Brown trout and longnose dace are rare. The area is not within a bull trout core or node area, and the fisheries resource value is considered to be substantial. The lowest six miles were found to be chronically dewatered. Wortman Creek, Elk Grove Slough and the un-named tributaries in the potential project area are too small to have been surveyed for the MFISH database and likely provide little fishery resource. However, these small streams are often a significant habitat for aquatic macroinvertebrates.

3.4.3. Federal Threatened and Endangered Species and Critical Habitat

There are no federally listed threatened or endangered species (including those species proposed for listing) or critical habitat (designated or proposed) within one mile of the GGWSD area, the proposed potential treatment areas, or the US Highway 191 corridor leading north to the Utility Solutions treatment facility at Elk Grove. The US Fish and Wildlife Service had no issues or concerns about the proposed potential project related to Federal Threatened and Endangered Species and Critical Habitat (Wilson, 2010; Appendix B, page B33).

3.4.4. Montana Species of Concern

The Montana Natural Heritage Program (MNHP) has no record of occurrences of any Montana Species of Concern occurring within one mile of the GGWSD area, the proposed potential treatment areas, or the US Highway 191 corridor leading north to the Utility Solutions treatment facility at Elk Grove (Miller, 2010, Appendix B page B18).

3.4.5. Wetlands

There are likely jurisdictional wetlands associated with each of the surface water drainages and channels discussed in Section 3.2.2. North of Zachariah Lane, the US Highway 191 corridor crosses several areas of hydric soils. Full wetland delineation would be required, as well as permitting, if an alternative that would disturb any of these areas is selected.

There are two additional sources of preliminary wetland information: the National Wetlands Inventory (NWI) aerial mapping, and an ongoing effort from the MNHP that uses aerial mapping (natural color and color infrared) with minor ground-truthing. The NWI of wetlands has mapped wetlands associated with South Cottonwood Creek, Farmers Canal and Elk Grove Slough, but none associated with the un-named tributaries or the portion of Wortman Creek that is of interest. On the other hand, MNHP has mapped numerous small isolated wetland areas in the GGWSD and potentially jurisdictional wetlands associated with the un-named tributaries and Wortman Creek within the area of interest, as well as wetlands associated with South Cottonwood Creek, Farmers Canal and Elk Grove Slough. None of the existing databases indicate that riparian wetlands associated with the Gallatin River riparian zone extend into the GGWSD.

3.5. Cultural Resources

Materials concerning the site and proposed project were submitted to the Montana State Historic Preservation Office (MSHPO) for review. MSHPO responded with a *Cultural Resource Assessment Section 106 Review* (Murdo, 2010, Appendix B, page B28) that states: “It is SHPO’s position that any structure over fifty years of age is considered historic and is potentially eligible for listing on the National Register of Historic Places. If any structures are to be altered and are over fifty years old we would recommend that they be recorded and a determination of their eligibility be made.” Furthermore, they stated that: “As long as there will be no disturbance or alteration to structures over fifty years of age we feel that there is a low likelihood cultural properties will be impacted. We, therefore, feel that a recommendation for a cultural resource inventory is unwarranted at this time. However, should structures need to be altered or if cultural materials be inadvertently discovered during this project we would ask that our office be contacted and the site investigated.”

There are two sites that are currently listed in the National Register of Historic Places in the GGWSD: the Gallatin Gateway Inn, and Farmers Canal. Additional listed sites in the US Highway 191 corridor include the historic rail alignment.

It is likely that the scope of work for the proposed project will not impact any historical structures. At the same time, it is important to note that many of the structures in the town core area of Gallatin Gateway are older than 50 years old: for example, the church was built in 1885 (Smith, 1996). The old electric rail line operated from 1908 through 1930 (Spritzer, 1999), Gallatin Gateway Inn and surrounding gardens were built in 1927, and the Farmers Canal was built in 1890 (Smith, 1996). It is quite possible that artifacts of historic interest will be encountered during trench excavations.

3.6. Aesthetic Resources

3.6.1. *Visual*

The town core of Gallatin Gateway, the main area of the GGWSD, is an historic western small town, characterized by a mixture of buildings and architecture representing many historic periods and many different stages of preservation. The area in the vicinity of GGWSD is considered to be a rural landscape, characterized by primarily agricultural land use with interspersed rural residences.

3.6.2. *Noise*

There is no background ambient noise data for the GGWSD site. The site is dissected by a busy highway. There are sensitive noise receptors within the GGWSD and in the vicinity of the treatment areas and corridor to the Elk Grove Utility Solutions treatment facility: the Gallatin Gateway School, several churches and multiple residences.

3.6.3. *Odors*

Background odors related to wastewater disposal are episodic and infrequent, caused by failure or malfunction of the existing private systems.

3.7. Socio-Economic Resources

There is detailed socio-economic data in the PER. The population of the GGWSD is estimated at 168 persons. There is an average of 2.43 persons per home, and the projected population for the 20-year planning period for the GGWSD is 336 persons. Income surveys received at the time that the PER was written (April 2010) identified the Median Household Income at approximately \$29,000. In the larger area of Census Tract 12, Block Group 1 (west of US Highway 191, from the mouth of the canyon to the Norris Road), the Median Household Income is \$36,993 (USCB, 2000). In the larger area of Census Tract 12, Block Group 2 (east of US Highway 191, from Four Corners to the National Forest), the Median Household Income is \$47,841 (USCB, 2000).

3.8. Other Concerns: Hazardous Materials

Hazardous materials permits and spills were investigated in the area within one mile of GGWSD and the potential project areas using the US Environmental Protection Agency (EPA) and Montana Department of Environmental Quality databases (EPA, 2010b; MDEQ, 2010b). There are no Superfund (Comprehensive Environmental Response, Compensation and Liability Act, or CERCLA) sites within one mile of the GGWSD and the potential project areas. There are no Montana State Superfund (Comprehensive Environmental Cleanup Responsibility Act, or CECRA). There are no Resource Conservation and Reclamation Act (RCRA) Treatment, Storage or Disposal facilities within one mile of the GGWSD and the potential project areas.

There are no Solid Waste Landfills or any unresolved Leaking Underground Storage Tanks (LUSTs) within one-half mile of the GGWSD and the potential project areas (MDEQ, 2010b; Kuhn, 2010, Appendix B page B10; Harris, 2010, Appendix B page B11; Alvee, 2010, Appendix B page B12). There are three LUST sites within the radius of interest of the GGWSD that have been resolved and are considered to be closed: one within the GGWSD at the old Gateway Post Office (currently Post Office Pizza), another approximately a third of a mile south of the GGWSD at the Buffalo Station, and a final site at 75777 Gallatin Road (Lumber Enterprises Inc.) in the US Highway 191 corridor north of Gallatin Gateway. None of these sites is anticipated to be an issue in the GGWSD, potential treatment areas, or the corridor north to the Elk Grove Utility Solutions facility.

There is a single RCRA-registered facility within the proposed potential project areas, a Used Oil Program facility, Mountain Mobile Oil Change, LLC, at 116 Penny Lane, which is in compliance with regulations and should not be an issue to the proposed project. There are registered Underground Storage Tanks (USTs) within the GGWSD and the corridor north along US Highway 191 that should be found and marked by a utility locator prior to excavation. The MDEQ database suggests that the only tanks that remain in the ground are those at the Gateway Exxon Market, and that all other registered tanks were removed upon closure with the exception of a single tank at the Gateway Exxon Market that was closed in place. There may be smaller, unregulated tanks that should be located before excavation.

There are no Toxic Release Inventory Sites adjacent to or within the proposed project locations (EPA, 2010b). There are no National Response Center spill or release sites adjacent to or within the proposed project locations (NRC, 2010).

There is possibility of encountering asbestos-containing materials in existing systems and piping or buildings.

4. ENVIRONMENTAL EFFECTS

The discussion of potential environmental consequences of the proposed potential alternatives to the environment is summarized in Table 1. The alternatives are described in Section 2. Definitions of environmental effects terms used in this ER are:

- **Short-term** – used here to indicate the time interval during which construction is ongoing, until the proposed facility repairs and improvements have been implemented
- **Long-term** – time interval after action has been implemented, following active construction, during which there are only normal operations and maintenance. Long-term impacts are further categorized in this EA as direct, indirect or cumulative
- **Direct effects** – those effects which are caused by the action and occur at the same time and place as the action
- **Indirect effects** – those effects which are caused by the action and occur later in time or further removed in distance, but are still reasonably foreseeable and causally linked to the action
- **Cumulative effects** – impacts to the environment which result from incremental impact of the action when added to the other past, present, and reasonably foreseeable future actions, regardless of what agency or person undertakes such actions

In Table 1, the direct, indirect and cumulative short-term impacts are combined in a single “short-term” category. The direct, indirect and cumulative long-term impacts are included in the table as separate entries.

Table 1. Environmental Effects

Effects	Alternatives						
	No Action	Collection		Treatment			
		Street Layout	Alley Layout	Connection to Utility Solutions Wastewater Treatment Plant	Storage and Irrigation (Low Rate Land Application)	Septic Tank / Level 2 / Pressure Dosed Drainfield	Biological Nutrient Removal Mechanical Treatment Plant, Drainfield
			✓			✓	
Earth Resources							
Short-term	N	N	N	N	N	N	N
Direct	N	N	N	N	N	N	N
Indirect	N	N	N	N	N	N	N
Cumulative	N	N	N	N	N	N	N
Biological Resources							
Short-term	N	N	N	N	N	N	N
Direct	N	N	N	N	N	N	N
Indirect	N	N	N	N	N	N	N
Cumulative	N	N	N	N	N	N	N
Water Resources							
Short-term	I	N	N	N	N	N	N
Direct	S	N	N	+S	+I	+I	+S
Indirect	I	N	N	+I	+I	+I	+I
Cumulative	S	N	N	+S	+I	+I	+S
Air Resources							
Short-term	N	N	N	N	N	N	N
Direct	N	N	N	N	N	N	N
Indirect	N	N	N	N	N	N	N
Cumulative	N	N	N	N	N	N	N
Cultural Resources							
Short-term	N	N	N	N	N	N	N
Direct	N	N	N	N	N	N	N
Indirect	N	N	N	N	N	N	N
Cumulative	N	N	N	N	N	N	N
Aesthetic Resources							
Short-term	N	I	I	I	I	I	I
Direct	N	N	N	N	I	N	I
Indirect	N	N	N	N	N	N	N
Cumulative	N	N	N	N	N	N	N
Socio-Economic Resources							
Short-term	I	+I	+I	+I	+I	+I	+I
Direct	I	N	N	+I	+I	+I	+I
Indirect	I	N	N	+I	+I	+I	+I
Cumulative	I	N	N	+I	+I	+I	+I
Hazardous Materials							
Short-term	N	N	N	N	N	N	N
Direct	N	N	N	N	N	N	N
Indirect	N	N	N	N	N	N	N
Cumulative	N	N	N	N	N	N	N
Irreversible and Irretreivable Commitments of Natural Resources							
Short-term	N	N	N	N	N	N	N
Direct	N	N	N	I	I	I	I
Indirect	N	N	N	N	N	N	N
Cumulative	N	N	N	N	N	N	N

Explanation

✓
PER
Preferred
Alternative

N
Areas of Negligible
or No Impact

I
Areas of Minor,
Insignificant Impact
Primarily Adverse

+I
Areas of Minor,
Insignificant Impact
Beneficial

S
Areas of Potentially
Significant Impact,
Primarily Adverse

+S
Areas of Potentially
Significant Impact,
Beneficial

Alternatives
and impact terms
defined in text

4.1. No Action

The No-Action Alternative will have no effects on earth, biological, air, cultural or aesthetic resources. There will be no issues from the No-Action Alternative concerning hazardous materials. There will be no significant irreversible and irretrievable commitments of natural resources, although there is an ongoing cost of energy and replacement materials related to operations and maintenance of the private septic systems throughout the town.

The No-Action Alternative will have a significant adverse direct and cumulative impact to water resources. Many of the existing private septic systems do not meet current health, safety, and environmental standards. The legacy systems and failing systems present an imminent direct adverse impact to ground water and an indirect adverse impact to surface water and the watershed.

The No-Action Alternative will have both a short- and long-term minor adverse impact to the socio-economic resources of Gallatin Gateway. Property values are negatively impacted and development or growth in the GGWSD is prohibited or severely hampered by the legacy septic systems. Aging and failing systems are expensive and difficult to replace. The No-Action Alternative will also have a minor adverse indirect and cumulative impact to the community as an unintended consequence, since it will influence growth and development in the area.

4.2. Collection Alternatives

4.2.1. *Gravity Collection – Street Layout*

The Gravity Collection – Street Layout Alternative will have no environmental impacts to earth, biological, water, air, or aesthetic resources. There will be no impacts or issues related to hazardous materials, and there will be negligible impacts concerning irreversible and irretrievable commitments of natural resources. Construction of the collection system will create a short-term positive economic impact due to construction – related employment.

There will be short-term minor adverse impacts to aesthetic resources related to construction. Trenches will be within existing rights-of-way and easements that have been previously disturbed by development. There will be minor dust and noise during construction, which will be minimized and mitigated by Best Management Practices (BMPs).

4.2.2. *Gravity Collection –Alley Layout – PER Preferred Collection Alternative*

The Gravity Collection – Alley Layout Alternative will have no environmental impacts to earth, biological, water, air, or aesthetic resources. There will be no impacts or issues related to hazardous materials, and there will be negligible impacts concerning irreversible and irretrievable commitments of natural resources. Construction of the

collection system will create a short-term positive economic impact due to construction – related employment.

There will be short-term minor adverse impacts to aesthetic resources related to construction. Trenches will be within existing rights-of-way and easements that have been previously disturbed by development. There will be minor dust and noise during construction, which will be minimized and mitigated by Best Management Practices.

4.3. Treatment Alternatives

4.3.1. *Connection to the Utility Solutions Wastewater Treatment Plant*

The Connection to the Utility Solutions Wastewater Treatment Plant Alternative will have no or negligible impact on earth, biological, air, and cultural resources.

There will be a significant direct and cumulative beneficial impact and minor indirect beneficial impact to water resources since the Utility Solutions treatment facility is capable of treating water to a very high water quality standard. There will be minor positive short-term socio-economic impact related to construction, and minor positive direct, indirect and cumulative socio-economic impact to the community since property values and the potential for community growth and development will be improved.

There will be short-term minor adverse impacts to aesthetic resources related to construction. This Alternative will not require creation of a treatment facility adjacent to or in the near vicinity of the GGWSD. There will be minor dust and noise during construction, which will be minimized and mitigated by Best Management Practices.

This Alternative will create no hazardous materials issues. There will be direct irreversible and irretrievable commitments of natural resources related to the footprint of the force main and the Utility Solutions treatment facility, and the energy requirements of this Alternative.

4.3.2. *Storage and Irrigation (Low Rate Land Application)*

The Storage and Irrigation (Low Rate Land Application) Alternative will have no or negligible impact on earth, biological, air, and cultural resources.

There will be a minor direct, indirect and cumulative beneficial impact to water resources since the Storage and Irrigation Alternative is capable of treating water to a water quality standard that is an improvement over current and existing systems. There will be minor positive short-term socio-economic impact related to construction, and minor positive direct, indirect and cumulative socio-economic impact to the community since property values and the potential for community growth and development will be improved.

There will be short-term minor adverse impacts to aesthetic resources related to construction. This Alternative will require creation of a treatment facility adjacent to or in the near vicinity of the GGWSD. There will be minor dust and noise during construction, which will be minimized and mitigated by Best Management Practices. During operation there will be minor direct long-term aesthetic impacts due to the view and odors associated with the storage and treatment lagoons.

This Alternative will create no hazardous materials issues. There will be direct irreversible and irretrievable commitments of natural resources related to the footprint of the footprint (18.6 acres) and the energy requirements (87,500 kilowatt-hours/year) of this Alternative.

4.3.3. Septic Tank / Level 2 / Pressure-Dosed Drainfield

The Septic Tank / Level 2 / Pressure-Dosed Drainfield Alternative will have no or negligible impact on earth, biological, air, and cultural resources.

There will be a minor direct, indirect and cumulative beneficial impact to water resources since the Septic Tank / Level 2 / Pressure-Dosed Drainfield Alternative is capable of treating water to a water quality standard that is an improvement over current and existing systems. There will be minor positive short-term socio-economic impact related to construction, and minor positive direct, indirect and cumulative socio-economic impact to the community since property values and the potential for community growth and development will be improved.

There will be short-term minor adverse impacts to aesthetic resources related to construction. This Alternative will require creation of a treatment facility adjacent to or in the near vicinity of the GGWSD. There will be minor dust and noise during construction, which will be minimized and mitigated by Best Management Practices. During operation there will be no direct long-term aesthetic impacts since the components of this treatment alternative are installed below ground.

This Alternative will create no hazardous materials issues. There will be direct irreversible and irretrievable commitments of natural resources related to the footprint of the footprint (5.5 acres) and the energy requirements (47,000 kilowatt-hours/year) of this Alternative.

4.3.4. Biological Nutrient Removal Mechanical Treatment Plant, Drainfield

The Biological Nutrient Removal Mechanical Treatment Plant, Drainfield Alternative will have no or negligible impact on earth, biological, air, and cultural resources.

There will be a significant direct and cumulative beneficial impact and minor indirect beneficial impact to water resources since the Biological Nutrient Removal Mechanical Treatment Plant, Drainfield Alternative is capable of treating water to a very high water quality standard. There will be minor positive short-term socio-economic impact related to construction, and minor positive direct, indirect and cumulative socio-economic impact

to the community since property values and the potential for community growth and development will be improved.

There will be short-term minor adverse impacts to aesthetic resources related to construction. This Alternative will require creation of a treatment facility adjacent to or in the near vicinity of the GGWSD. There will be minor dust and noise during construction, which will be minimized and mitigated by Best Management Practices. During operation there will be minor direct long-term aesthetic impacts due to the view and odors associated with the treatment facility.

This Alternative will create no hazardous materials issues. There will be direct irreversible and irretrievable commitments of natural resources related to the footprint of the footprint (3 acres) and the energy requirements (110,000 kilowatt-hours/year) of this Alternative.

5. SUMMARY OF MITIGATION

None of the alternatives considered trigger any sort of compensatory mitigation. The mitigation employed will include Best Management Practices for construction and operating dust and noise controls, erosion control, surface water protection, traffic controls and public health and safety. Construction and operating practices will comply with all relevant regulations and standards for protection of human health and the environment.

6. CORRESPONDENCE AND COORDINATION

Appendix B includes a table summarizing correspondence and coordination with other governmental agencies. There is documentation of public participation in Appendix C, including public notices and meetings.

7. LIST OF PREPARERS

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- David Sullivan, Board Member, GGWSD
- Charlie White, Vice President, GGWSD
- Earl Wortman, Board Member, GGWSD
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MFWP – see Montana Fish, Wildlife and Parks

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Appendix A

Compliance With Environmental Statutes

The following three tables list some of the Federal, State and Local legal mandates that are pertinent to the proposed action, Wastewater Collection and Treatment Project, at the Gallatin Gateway Water and Sewer District. This list is representative, not exhaustive, and is compiled for information, not for legal purposes.

Pertinent Federal Legal Mandates – representative, not exhaustive

Element	Authority	Compliance
Air Quality	The Clean Air Act of 1970, as amended (42 USC 7401 et seq.) National Emissions Standards for Hazardous Air Pollutants (40 CFR Parts 61 and 63)	Proposed project does not require air quality permitting. Fugitive dust will be controlled during construction by BMPs. Any asbestos-containing-materials will be handled and disposed in compliance with air quality and waste regulations.
Bald Eagles	Bald Eagle Protection Act (16 USC 668).	USFWS analysis found no issues concerning bald eagles (Wilson, 2010, Appendix B page B33)
Cultural, Archeological and Historical Resources	National Historic Preservation Act, as amended (16 USC 470); Antiquities Act of 1906 (16 USC 431-433); Archeological and Historic Preservation Act (AHPA) of 1974 (16 USC 469 et seq.); Archaeological Resources Protection Act of 1979 (16 USC 470(aa) et seq.); Historic Sites, Buildings and Antiquities Act of 1935 (16 USC 461-462, 424-467; 49 Stat.666), as amended National Register of Historic Places (36 CFR 60) Protection of Historic and Cultural Properties (35 CFR 700)	Correspondence with the MT SHPO (Murdo, 2010, Appendix B page B28) states “As long as there will be no disturbance or alteration to structures over fifty years of age we feel that there is a low likelihood cultural properties will be impacted. We, therefore, feel that a recommendation for a cultural resource inventory is unwarranted at this time.”
Endangered Species	Endangered Species Act of 1973 (16 USC 1531 et seq.)	USFWS analysis found no issues (Wilson, 2010, Appendix B page B33); MT NRHP database found

Pertinent Federal Legal Mandates – representative, not exhaustive

Element	Authority	Compliance
		no occurrences of threatened or endangered species (Miller, 2010, Appendix B page B18)
Energy	Energy Policy Act (EPACT) of 1992 (PL 102-486) National Energy Conservation Policy Act of 1978 (PL 95-619) EO 12759, April 15, 1991, Federal Energy Management EO 12902, March 8, 1994, Energy Efficiency and Water Conservation at Federal Facilities EO 13123, June 3, 1999, Greening the Government Through Energy Efficient Management	
Environmental Justice	EO 12898, February 11, 1994, Environmental Justice	This project does not impact minority or low-income populations inequitably.
Environmental Protection	National Environmental Policy Act (NEPA) of 1969 as amended (PL 91-190, 42 USC 4321 et seq.)	
Farmland	Farmland Protection Policy Act (7 U.S.C. 4201, et seq.)	There is no prime farmland within the GGWSD or the potential treatment sites. There is a single unit of “prime farmland if irrigated” that would be crossed by force main in the US Highway 191 corridor to the Utility Solutions treatment plant.
Floodplains	Watershed Protection and Flood Prevention Act (16 U.S.C. 1101, et seq. 33 U.S.C. 701b) EO 11988, May 24, 1977, Floodplain Management Floodplain Management (42 CFR 26951)	None of the major components of the proposed project would be located within the 100-year or 500-year floodplain of streams or rivers. There may be trenching/boring for placement of pipeline in floodplain areas. The placement of collection infrastructure within the floodplain will require

Pertinent Federal Legal Mandates – representative, not exhaustive

Element	Authority	Compliance
		floodplain permitting (O’Callaghan, 2010, Appendix B page B2)
Hazardous and Solid Waste	Hazardous and Solid Waste Amendments of 1984 (PL 98-616) Federal Facilities Compliance Act of 1992 (PL 102-386) Hazardous Materials Transportation Uniform Safety Act of 1990 (PL 101-615) Pollution Prevention Act of 1990 (42 USC 13101 et seq.) Resource Conservation and Recovery Act of 1976, as amended (42 USC 2901 et seq.) Toxic Substances Control Act of 1976 (15 USC 2601 et seq.) Solid Waste Disposal Act of 1965, as amended (42 USC 3251 et seq.) EO 12856, August 3, 1993, Federal Compliance with Right-to-Know Laws and Pollution Prevention Requirements EO 12873, October 20, 1993, Federal Acquisition, Recycling and Waste Prevention EO 13101, September 15, 1998, Greening the Government Through Waste Prevention, Recycling, and Federal Acquisition	There are not regulated hazardous materials sites that will be encountered by installation of the proposed project infrastructure. Hazardous and solid waste will be minimized to the maximum extent practicable during implementation of the proposed project. Biosolids handling and disposal are regulated by Region 8 EPA. Any asbestos-containing-materials will be handled and disposed in compliance with air quality and waste regulations.
Health and Safety	Occupational Safety and Health Act of 1970 (29 USC 651 et seq) Occupational Safety and Health Standards (29 CFR 1910)	All actions proposed will comply with appropriate health and safety regulations and standards.

Pertinent Federal Legal Mandates – representative, not exhaustive

Element	Authority	Compliance
Migratory Birds	Migratory Bird Treaty Act of 1918, as amended, 16 USC 703-71	USFWS analysis found no issues (Wilson, 2010, Appendix B page B33); MT NRHP database found no issue with migratory birds (Miller, 2010, Appendix B page B18)
Noise	Noise Control Act 1972 (42 U.S.C. Sec 4901 et seq.)	Noise emission levels at the project site could increase temporarily during construction; however appropriate measures would be taken to keep the noise level within the compliance levels.
Noxious Weeds	Federal Noxious Weed Act of 1974 (7 USC 2801 et seq.) Noxious Plant Control Act of 1968 (45 USC 1241 et seq.) Nonindigenous Aquatic Nuisance Prevention and Control Act of 1990 (16 USC 4701, 104 Stat. 4761, Title I of P.L. 101-646) EO 13112, February 3, 1999, Invasive Species Carlson-Foley Act of 1968 (PL 90-583)	The project will be implemented with BMPs to comply with noxious weed regulations.
Soil	Soil Conservation Act of 1938 (16 USC 5901 et seq.)	Erosion control and BMPs will be used during implementation of the proposed project.
Water Quality	Clean Water Act of 1977, as amended, (PL 95-217, 33 U.S.C. 1251 et seq.) – Section 401 Oil Pollution Act of 1990 (PL 101-380, 33 USC 2701 et seq.) Pollution Prevention Act of 1990 (42 USC 13101 et seq.) Water Quality Act of 1965 (PL 89-234) Safe Drinking Water Act (SDWA) of 1974 (42	The proposed project will require permitting (for example, the Septic Tank/ Level 2 / Drainfield alternative would require a MT Ground Water Pollution Control System permit.) The proposed action will be implemented so that there are no impacts to ground water or surface water.

Pertinent Federal Legal Mandates – representative, not exhaustive

Element	Authority	Compliance
	USC 3000(f) et seq.)	
Wetlands	Clean Water Act of 1977, as amended, (PL 95-217, 33 U.S.C. 1251 et seq.) – Section 404 North American Wetlands Conservation Act, 16 U.S.C. Sec. 4401 et seq. EO 11990, May 24, 1977, Protection of Wetlands	A full wetland delineation of construction areas of the chosen alternative will need to be completed. Impacts to any wetlands will need to be permitted. If stream crossings are placed by boring under the stream bed, no CWA Section 404 permit is required, (Tillinger, 2010, Appendix B page B34)
Wildlife	Fish and Wildlife Conservation Act of 1980 (16 USC 2901 et seq) Wildlife and Fisheries (40 CFR 1-End)	No additional permits or actions are required for implementation of the proposed project (Wilson, 2010, Appendix B page B33)

Notes:

- BMP – Best Management Practices
- CFR – Code of Federal Regulations
- EO – Executive Order
- PL – Public Law
- Stat. – Statute
- USC – United States Code

Pertinent Montana State Legal Mandates -- representative, not exhaustive

Element	Authority	Compliance
Air Quality	Air Quality, Title 75, Chapter 2, Parts 1 through 4 ; ARM Title 17, Chapter 8. Air Quality	Proposed project does not require air quality permitting. Fugitive dust will be controlled during construction by BMPs.
Asbestos	Asbestos Control, Title 75, Chapter 2, Part 5 ; ARM Title 17, Chapter 74, Subchapters 3 and 4, Asbestos Control	Any asbestos containing materials encountered will be handled and disposed in compliance with air quality and waste regulations.
Cultural, Archeological and Historical Resources	Montana Antiquities Act, as amended (1995); Montana Human Skeletal Remains and Burial Site Protection Act (1999) MCA 22-3-801.	Correspondence with the MT SHPO (Murdo, 2010, Appendix B page B28) states "... a recommendation for a cultural resource inventory is unwarranted at this time." If archeological artifacts are encountered during construction, work will halt until further consultation with MT SHPO.
Endangered Species and Wildlife	MT Nongame and Endangered Species Conservation Act MCA 87-5-101 through 132	Correspondence with MT NRHP (Miller, 2010, Appendix B pages B-19 and B-22) found that there were no occurrences of species of concern in the GGWSD or potential treatment areas. The US Highway 191 corridor to the Utility Solutions treatment facility encountered recorded occurrences of three species of concern.
Environmental Protection	MT Environmental Policy Act MCA 75-1-1 through 3.	State agencies and permitting will require compliance with MEPA
Floodplains	Floodplain and Floodway Management MCA 76-5; ARM 36	None of the major components of the proposed project would be located within the 100-year or 500-year floodplain of streams or rivers. There may be trenching/boring for placement of pipeline in floodplain areas. The placement of collection infrastructure within the floodplain will require floodplain permitting (O'Callaghan, 2010, Appendix

Pertinent Montana State Legal Mandates -- representative, not exhaustive

Element	Authority	Compliance
		B page B2)
Hazardous and Solid Waste	Hazardous Waste Management MCA 75-10-4; ARM 17-53 MT Solid Waste Management Act MCA 75-101-201	No regulated hazardous materials sites will be encountered by installation of the proposed project infrastructure. Hazardous and solid waste will be minimized to the maximum extent practicable during implementation of the proposed project. Biosolids handling and disposal are regulated by Region 8 EPA. Any asbestos-containing-materials will be handled and disposed in compliance with air quality and waste regulations.
Health and Safety	MT Occupational Safety and Health Act MCA 50-71	All actions proposed will comply with appropriate health and safety regulations and standards.
Noxious Weeds	MT Noxious Weed Management ARM 4-5; County Weed Control MCA 7-22-2101 et seq	The project will be implemented with BMPs to comply with noxious weed regulations
Water Quality	Natural Streambed and Land Preservation Act MCA 75-5-101, et seq; ARM 36.2.401 through 410 Streamside Management Zones MCA 77-5-301, et seq.; ARM 36.11.301 through 312 Water Quality Act MCA 75-55-101, et seq.; ARM 17.30.101 through 2006	The proposed project will require permitting (for example, drainfields require a MT Ground Water Pollution Control System permit; pipeline at streams may require a 310 permit; construction will require an MPDES permit; etc.) The proposed action will be implemented so that there are no impacts to ground water or surface water.

Notes:

ARM – Administrative Rules of Montana <http://www.mtrules.org/notice/search.asp>

BMP – Best Management Practices

MCA – Montana Code Annotated http://data.opi.mt.gov/bills/mca_toc/index.htm

Pertinent Gallatin County Local Legal Mandates – representative, not exhaustive

Element	Authority	Compliance
Floodplain	Floodplain permitting is administered locally by the Planning Department	Installation of any infrastructure within the floodplain of streams will require permitting http://www.gallatin.mt.gov/public_documents/GallatinCoMT_PlanDept/GallatinCoMT_PlanForms/GallatinCoMT_FldForm/ .
Noxious Weeds	Weed Control is administered locally by the County Weed Department	If implementation of the project requires subdivision, a weed management plan will be submitted for approval to the Gallatin County Weed Department.
Public Road Access	County Roads are administered by the County Road Department	County road access, encroachment or installation of facilities in county road right-of-way will require permitting by the County Roads Department. http://www.gallatin.mt.gov/Public_Documents/gallatincomt_roads/encroachutility.pdf
Zoning	Gallatin Gateway Zoning Task Force is creating regulations that may be implemented by the time the project is constructed.	Proposed project actions will comply with pertinent zoning regulations. If zoning has been implemented, a Land Use permit will be required. http://www.gallatin.mt.gov/public_documents/GallatinCoMT_PlanDept/gallatincomt_planforms/LandUse/LUP

Appendix B

Agency Coordination

Inter-Agency Consultation -- Gallatin Gateway Water and Sewer District -- Wastewater Collection and Treatment System

Agency	Contact	Phone	Adress	Phone	Mail/Email	Response
		(all 406)	(all MT)			
Local						
Gallatin County Commission	Bill Murdock, Steve White, Joe Skinner	582-3000	311 W Main, Room 306, Bozeman 59715	6/21/2010	5/21/2010	6/21/2010
Gallatin County Health Dept	Tim Roark, Dir of Environmental Health	582-3120	215 W Mendenhall, Rm 108, Bozeman 59715		5/21/2010	6/6/2010
Gallatin County Road Dept	Lee Provence	582-3250	205 Baxter Lane West, Bozeman 59718		5/21/2010	5/26/2010
Floodplain Management	Sean O'Callaghan, Planning Dept	582-3130	311 West Main, Room 108, Bozeman 59715		5/21/2010	6/1/2010
Gallatin County Planning	Sean O'Callaghan, Planning Dept	582-3130	311 West Main, Room 108, Bozeman 59715		5/21/2010	6/1/2010
Local Water Quality District	Allan English	582-3148	1709 W College St, Ste 104, Bozeman 59715	6/21/2010	5/21/2010	none
State						
MT Dept of Env Quality						
Water Quality Discharge	Tom Reid, Sr Env Sci Specialist	444-5329	1520 E 6th Ave, PO Box 200901, Helena 59620	6/21; 6/24	5/21/2010	6/24/2010
Solid Waste Program	Renee Hill	444-5345	1520 E 6th Ave, PO Box 200901, Helena 59620	6/21; 6/24	5/21/2010	6/24/2010
Watershed Management	Dean Yashan, Env Prog Mgr	444-5317	1520 E 6th Ave, PO Box 200901, Helena 59620	6/21/2010	5/21/2010	6/21/2010
Haz Waste LUST/Brownfield	Jeff Kuhn, Section Supervisor	841-5055	1100 N Last Chance Gulch, PO 200901, Helena 59620	6/21; 6/24	5/21/2010	6/24/2010
LUST	Kent Harris	841-5048	1100 N Last Chance Gulch, PO 200901, Helena 59620	6/24/2010		6/24/2010
CECRA	Laura Alvee	841-5062	1100 N Last Chance Gulch, PO 200901, Helena 59620	6/24/2010		6/24/2010
MT Dept of Transportation	Jeff Ebert, Dist Administrator	494-9600	PO Box 3068, Butte 59702	5/20/2010	5/21/2010	6/10/2010
MT Fish, Wildlife and Parks						
Fisheries	Mike Vaughan, Regional Fisheries Mgr	994-3155	1400 S 19th St, Bozeman 59718	6/21; 6/24	5/21/2010	6/25/2010
Wildlife	Kurt Alt, Regional Wildlife Manager	994-6935	1400 S 19th St, Bozeman 59718	6/21; 6/24	5/21/2010	none
MT Natural Heritage Program	online information request	444-5354	http://nris.mt.gov/reqapp/userRequestForm.asp		5/22/2010	5/24/2010
MT State Historic Preservation	online information request	666-7767	http://www.his.state.mt.us/shpo/forms.asp		5/22/2010	5/24/2010
Federal						
USFWS	Mark Wilson, Field Supervisor	449-5225	484 Shepard Way, Helena 59601	6/21/2010	5/21/2010	6/23/2010
US COE	Todd Tillinger Program Mgr	441-1375	10 West 15th Street, Helena 59626		5/21/2010	6/18/2010
NRCS Gallatin County CD	Marcie Munion, District Administrator	522-4000	3710 Fallon Street, Suite B, Bozeman 59718	6/21/2010	5/21/2010	6/21/2010



GALLATIN COUNTY

Carol Lee-Roark, Ph.D, P.G.
Hyalite Environmental, LLP
P.O. Box 90
Gallatin Gateway, MT 59730

June 1, 2010

Re: NEPA Request for Input – Wastewater System for Gallatin Gateway

Dear Carol:

Thank you for the opportunity to provide comments on the various wastewater treatment options being considered for the Gallatin Gateway Water and Sewer District. The Gallatin County Planning Department's primary interests in the development of the wastewater treatment system are compliance with the adopted Gallatin Gateway Community Plan and compliance with the Gallatin County Floodplain Regulations.

Gallatin Gateway Community Plan: The Gallatin Gateway Community Plan was adopted as part of the Gallatin County Growth Policy on March 17, 2010. Policy 3.3 of the Plan advocates for exploration of "options to form a public water and sewer district and provide central water and sewer in the Town Core to protect the area's water quality." Wastewater treatment options are necessary to serve existing development, but also to serve future development in the Town Core. Policy 7.4 states: "New development shall be required to include necessary infrastructure concurrent with the impacts and demands of new development." The plan includes sewer/treatment facilities in the list of infrastructure.

Based on the above, it appears that all the proposed wastewater treatment options comply with the policies and intent of the adopted Community Plan.

Gallatin County Floodplain Regulations: Figure 2.3.4 shows the FEMA floodplain boundary in relation to the Gallatin Gateway Water & Sewer District boundary. The floodplain only appears to be an issue at the western edge of the District, but please be advised that for regulatory purposes the floodplain boundary is not based on the FEMA maps, but rather is based on comparison of the ground elevation to the 100-year water-surface-elevation. This issue is raised primarily because installation of the wastewater collection infrastructure as shown on Figure 7.1.2 will need to document that it is outside of the floodplain or obtain a floodplain permit. The same will apply to new development projects in that area.

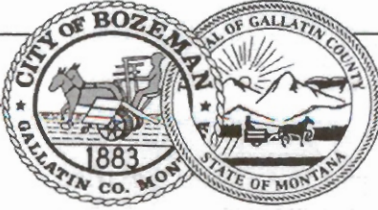
Thanks again for the opportunity to comment. Please feel free to contact me with any questions.

Sincerely,

A handwritten signature in blue ink that reads "Sean O'Callaghan".

Sean O'Callaghan, CFM
Senior Planner/Floodplain Administrator

F:\PLNR\Sean\Misc\Gateway_NEPA.docx



www.gallatin.mt.gov/health

Gallatin City-County Health Department

Human Services
215 W. Mendenhall, Rm 117
Bozeman, MT 59715-3478
(406) 582-3100 • Fax (406) 582-3112

Environmental Health Services
215 W. Mendenhall, Rm 108
Bozeman, MT 59715-3478
406-582-3120 • Fax: 406-582-3128

June 6, 2010

Carol Lee-Roark, Ph.D.
Hyalite Environmental, LLP
PO Box 90
Gallatin Gateway, MT 59730

Re: NEPA Request for Input, Wastewater System, Gallatin Gateway Water & Sewer District

Dear Ms. Lee-Roark,

Thank you for the opportunity to comment on this project. As noted in a previous letter of support, our department is very interested in the successful establishment of a public wastewater treatment system to service the Gallatin Gateway community. The only comment I would offer is to remind the district and their representatives that there are a few public water supply wells located downgradient from the potential treatment areas shown in Figure 4. The closest one is Public Water Supply MT0001284 serving "The Game" Sportsbar at 76250 Gallatin Road, which is located directly north and downgradient of the southern potential treatment site according to the USGS Slagle Study gradient estimate (Water-Resources Investigations Report 95-4034). There are also a number of private individual water supply wells serving structures on lots that are immediately downgradient from the potential treatment areas. These wells need to be taken in consideration when finalizing the siting of the proposed treatment system and any corresponding mixing zone(s).

If you need further information, please contact me at (406) 582-3120.

Sincerely,

Denise Moldroski, MS RS
Environmental Health Specialist
Gallatin City-County Health Department

CKLR

From: "Provance, Lee" <lee.provance@gallatin.mt.gov>
To: <carol@hyaliteenvironmental.com>
Cc: "Durkin, George" <George.Durkin@gallatin.mt.gov>
Sent: Wednesday, May 26, 2010 11:37 AM
Subject: Gateway Water and Sewer

Carol,

Good plan, those folks need something better for the future.

I have no issues other than the installation of the mains in the rights-of-way. Firstly, you'll need encroachment permits. Formerly being a water/sewer guy, I'd assume that the mains will be placed in the road for easy access and minimal disruption to private property during construction. If this is the case, the roads will need to be paved to preserve the location and integrity of the valve boxes and manholes. Big expense, tougher sell.

If the roads were to be left in a gravel state, the grader will definitely wipe out the valve boxes and manholes. If you put them too deep, they're pretty inaccessible and will probably be disturbed nonetheless. If they are placed on the edge of the roads, we'll still get them during large snow events when we wing back the snow as far as we can.

I would also require that any residential clean-outs, air relief valves, lift stations or curb stops be placed on private property or public property outside of the right-of-way.

If the roads are paved, should there be any consideration given to stormwater?

Thanks -Lee

_____ Information from ESET NOD32 Antivirus, version of virus signature database 5201
(20100616) _____

The message was checked by ESET NOD32 Antivirus.

<http://www.eset.com>



Hyalite Environmental, LLP -- Communication Record

Re:	Interagency consultation	Date:	6/21/2010
Contact:	Crystal Turner	Hyalite:	CKLR
	Administrator, GCC	Project:	GGWSD ER
Phone:	582-3000	Pages:	1

Gallatin County Commissioners, Bill Murdock; Joe Skinner; Steve White

CKLR: explained, asked if the GCCs would have any input

Crystal Turner: no, they filed the letter and do not intend to respond



Gallatin Local Water Quality District

1709 W. College Street, Suite 104 - Judge Guenther Memorial Center - Bozeman, MT 59715
406-582-3148 www.gallatin.mt.gov/GLWQD



February 11, 2010

Mr. Rich Fillbach, PE
Great West Engineering, Inc.
602 Ferguson Avenue, Suite 1
Bozeman, MT 59718

Subject: Water Quality Concerns in the Gallatin Area

Dear Mr. Fillbach:

No response to RFI 5/21/2010 this letter from PER

It is my understanding that you are working with folks in the Gallatin Gateway area to prepare a Preliminary Engineering Report for a community sewage system. Current sewage treatment in this area is primarily by individual septic systems, and a few public sewage systems. Due to the hydrogeology in the area, there are several concerns with the continued use of individual septic systems, and potential expanded use of septic systems as the population in the area grows.

The existing high density development in Gallatin Gateway has resulted in a situation where individual wells are intermingled with septic systems on small lots. This places drinking water wells and septic systems in close proximity, increasing the public health risk. Specifically, much of the current development is on lots under 1/2-acre in size, resulting in wells that are closer than the standard 100-foot separation from nearby septic systems.

The close proximity of wells and septic systems is even more of a health risk in this area because the water table is shallow (typically less than 15 feet deep), and the aquifer materials are primarily coarse sands and gravels. In this setting bacteria and viruses can travel further and faster, increasing the risk of contamination of wells in the community.

For these reasons, the development of a community sewage system, if properly sited, would reduce the public health risk in the area and help improve water quality. In closing, I support and encourage development of a community wastewater treatment system in the Gallatin Gateway area, if there is anything I can do to assist the community, please let me know.

Sincerely,

Alan English
Manager

Our mission is to protect, preserve and improve the quality of surface water and ground water.



Hyalite Environmental, LLP -- Communication Record

Re:	Interagency consultation	Date:	6/21/2010; 6/24/2010
Contact:	Tom Reid	Hyalite:	CKLR
	Water Quality Discharge	Project:	GGWSD ER
Phone:	444-5329	Pages:	1

6/21 – left msg

CKLR: explained, asked if his office would have any input

Tom Reid: no, will review applications when submitted, but have no input at this point in time



Hyalite Environmental, LLP -- Communication Record

Re:	Interagency consultation	Date:	6/21/2010; 6/24/2010
Contact:	Renee Hill	Hyalite:	CKLR
	Biosolids disposal	Project:	GGWSD ER
Phone:	444-1434	Pages:	1

6/21 – Rick Thompson, Solid Waste, re-directed CKLR to Renee Hill

6/21 – left msg

CKLR: explained, asked if her office would have any input

Renee Hill: no, will review applications when submitted, but have no input at this point in time

RH: biosolids are regulated by EPA in Region 8, Bob Brobst

RH: applications and permits required for land application

RH: if landfilled, must be dewatered; regs are written to encourage composting

CKLR: is there any reason to think there is a limit for capacity or that there will be any problem getting a waste disposal company to take care of it if it is not land applied?

RH: no, it is a reasonably competitive market



Hyalite Environmental, LLP -- Communication Record

Re:	Interagency consultation	Date:	6/21/2010
Contact:	Dean Yashan	Hyalite:	CKLR
	Watershed Section Mgr	Project:	GGWSD ER
Phone:	444-5317	Pages:	1

CKLR: explained, asked if his office would have any input

Dean Yashan: not looking at the Gateway reach of the Gallatin as impaired

DY: no input at this time, though always in support of achieving more rigorous discharge levels



Hyalite Environmental, LLP -- Communication Record

Re:	Interagency consultation	Date:	6/21/2010; 6/24/2010
Contact:	Jeff Kuhn	Hyalite:	CKLR
	Haz Waste/LUST Mgr	Project:	GGWSD ER
Phone:	841-5055	Pages:	1

6/21/2010 – left msg

CKLR: explained, asked if his office would have any input

Jeff Kuhn: hasn't gotten to writing a letter, will be content to have CKLR record his input with phone notes

JK: no indication of any problems or issues

JK: single active LUST site, Kent Harris is the project manager, CKLR should speak with him at 841-5048

JK: recommends CKLR also check with Laura Alvee concerning CERCLA or CECRA type of issues, she is at 841-5062



Hyalite Environmental, LLP -- Communication Record

Re:	Interagency consultation	Date:	6/24/2010
Contact:	Kent Harris	Hyalite:	CKLR
	Haz Waste/LUST Mgr	Project:	GGWSD ER
Phone:	841-5062	Pages:	1

CKLR: explained, about active LUST site in Gallatin Gateway for which he is listed as site officer

Kent Harris: Buffalo Station

KH: site is closed

KH: there is no plume, although there may be some residual

KH: should have no bearing on the GGWSD project



Hyalite Environmental, LLP -- Communication Record

Re:	Interagency consultation	Date:	6/24/2010
Contact:	Laura Alvee	Hyalite:	CKLR
	CECRA / CERCLA	Project:	GGWSD ER
Phone:	841-5048	Pages:	1

CKLR: explained, asked if there were any issues in GGWSD vicinity

Laura Alvee: all Gallatin Gateway sites are closed, except for the Karst Mine site which is far up the canyon from the GGWSD



Montana Department of Transportation

2701 Prospect Avenue
PO Box 201001
Helena MT 59620-1001

Jim Lynch, Director
Brian Schweitzer, Governor

June 10, 2010

Carol Lee-Roark, Ph.D.
Hyalite Environmental, LLP
PO Box 90
Gallatin Gateway, MT 59730

Subject: Gallatin Gateway Water and Sewer District Wastewater System
Comments on NEPA Request for Input

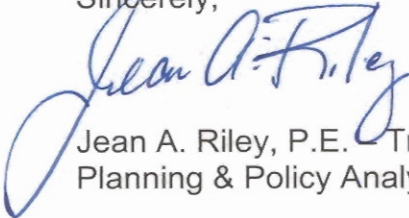
Dear Carol,

The Montana Department of Transportation (MDT) staff has reviewed your letter and attachments of May 20, 2010 concerning the Gallatin Gateway Water and Sewer District Wastewater System project. Some of the proposed project is located within the MDT right-of-way and is crossing US 191 in two separate locations. MDT has the following comments concerning the proposed improvements.

- The Gallatin Gateway Water and Sewer District (GGW&SD) must complete a Encroachment Application and Permit (<http://www.mdt.mt.gov/other/rw/external/forms/970.pdf>) and Environmental Checklist (<http://www.mdt.mt.gov/other/rw/external/forms/976.pdf>) for the project. The executed agreement is required prior to working within the MDT right-of-way.
- The GGW&SD must submit a set of plans for the work within MDT right-of-way. MDT staff will review the plans and if appropriate approve the work. The review may take multiple iterations.
- The GGW&SD's contractor must supply a traffic control plan for any work within MDT right-of-way.
- The GGW&SD's contractor may be required to enter into a contractor agreement with MDT prior to starting work.
- The 8-inch sewer main crossings of US 191 must be bored, MDT will not allow the trenching of the installations across US 191.
- The location of the project for the longitudinal encroachment on US 191 must be located as close to the MDT right-of-way limit as practicable.
- There are other Utilities within this area, please coordinate with Rob Bukvich concerning the permitted utility locations.
- MDT staff will inspect the completed construction to confirm that all impacts to the MDT facilities have been repaired.
- The GGW&SD is responsible for all environmental permits.
- All regulatory permits and authorizations must be obtained prior to any work within MDT right-of-way.

Please submit the Utility Occupancy and Location Agreement with the Environmental Checklist to Rob Bukvich in the MDT Bozeman Area Office. If you have any questions concerning this letter, please contact me at (406)444-9456 or email at jriley@mt.gov or Rob at (406)556-4714 or email at rbukvich@mt.gov.

Sincerely,



Jean A. Riley, P.E. Transportation Planning Engineer
Planning & Policy Analysis Bureau

Copies: Jeff Ebert, P.E. – MDT Butte District Administrator
Ray Stocks – MDT Bozeman Area Maintenance Chief
Rob Bukvich – MDT Bozeman Area Utility Agent
Jim Skinner – MDT Planning & Policy Analysis Bureau Chief
File



Montana Fish, Wildlife & Parks

1400 South 19th Ave
Bozeman, MT 59718
June 24, 2010

Carol Lee-Roark
Hyalite Environmental, LLP
P.O. Box 90
Gallatin Gateway, MT 59730

Dear Ms. Lee-Roark,

Today I reviewed a vicinity map, and other materials concerning alternatives for the proposed wastewater system for the Gallatin Gateway Water and Sewer District. I would like to provide a few comments to you as requested in your letter of May 20.

Based on the materials you have provided my principle concern for impacts to fish and wildlife at this time is generic to this type of development and it's potential to harm local waterways. In general you should plan to avoid any activity near surface waters that might destabilize existing channel configurations. You will want to avoid disturbing riparian or wetland vegetation. And you will want to avoid situations that might deliver pollutants to surface waters as can happen for example when paved surfaces concentrate oil or other petroleum products that can be washed into channels by rain or snowmelt. Drainage within the project area is a critical consideration to avoid increasing sediment or other contaminants that might be delivered to local waterways.

My other main concern is to prevent localized stream disturbances during construction. I anticipate that your construction plans will include actions to reduce or mitigate sediment delivery, and to prevent discharges of petroleum products or other harmful substances into nearby ditches, or to lands capable of delivering these substances to nearby waterways. An important project goal should be to ensure that the completed wastewater system poses no direct or persistent environmental threat to the local watershed.

At this time I cannot make an informed choice between alternatives other than to say that any of them other than no action should be an improvement over the wastewater situation in the area as it exists today.

I look forward to hearing how your project plans develop. Please contact me with any questions.

Sincerely,

A handwritten signature in black ink that reads "Michael W. Vaughn". The signature is fluid and cursive.

Michael W. Vaughn
FWP Fisheries Biologist
406-994-6938
mvaughn@mt.gov



Hyalite Environmental, LLP

Chris Thelen, P.E.
4699 Chaparral Way
Bozeman, MT 59715
(406) 582-9702
chris@hyaliteenvironmental.com

Carol Lee-Roark, Ph.D., P.G.
P.O. Box 90
Gallatin Gateway, MT 59730
(406) 763-4228
carol@hyaliteenvironmental.com

May 20, 2010

Kurt Alt
MFWP -- Wildlife
1400 S 19th St
Bozeman, MT 59718

**NEPA Request for Input
Wastewater System
Gallatin Gateway Water and Sewer District**

No response

Dear Kurt;

The Gallatin Gateway Water and Sewer District (GGWS&D) is in the process of performing an environmental review pursuant to the National Environmental Policy Act (NEPA) for the US Department of Agriculture, Rural Utilities Service in order that it may assess the environmental impacts of construction of a wastewater collection and treatment system in Gallatin Gateway, Gallatin County, MT. We wish to know of any specific concerns or other input that you have for this proposed project. Figures 1 and 2 show the location of the GGGW&SD.

Gallatin Gateway is a rural unincorporated community in which much of development and building was carried out prior to the establishment of Health Department regulations in 1966. Many of the buildings, homes and residences have individual septic disposal systems that do not comply with current regulations. The majority of these systems are cesspools, seepage pits or metal septic tanks with drainfields that have either failed, or have a high potential of failing in the near future. The coarse-grained soils that provide only limited filtering or treatment, closeness of drinking water wells to individual septic disposal systems, and proximity of the developed town area to the Gallatin River present a threat to human health, safety and the environment.

New construction or replacement of failed systems in Gallatin Gateway require variances of State and County septic regulations, which often can not be granted due to potential threat to human health, safety and the environment. The effect of this situation has been a moratorium on new construction in Gallatin Gateway.

Hyalite Environmental, LLP

mfwp wildlife doc5/23/10

MFWP -- Wildlife

2

May 20, 2010

Each of the treatment alternatives would include installation of a gravity collection system in the alleys of town and a single centralized lift station (Figure 3). Areas for potential treatment facilities are shown on Figure 4.

Figures and a succinct description of each of the treatment alternatives are included as attachments to this letter. Five treatment alternatives are being assessed in the Environmental Report:

- No Action;
- Septic Tank / Level 2 / Pressure Dosed Drainfield – *Engineering Preferred Alternative*; (Figure 5)
- Connection to the Utility Solutions Wastewater Treatment Plant; (Figure 6)
- Storage and Irrigation (Low Rate Land Application) (Figure 7); and
- Biological Nutrient Removal Mechanical Treatment Plant with Discharge to Groundwater (Figure 8).

We wish to know of any specific concerns or other input that you have for this proposed project. We would appreciate a response within 30 days. If you need further information, or wish to discuss the project please contact Carol Lee-Roark at (406)763-4228, or Ted Border at (406)580-0635.

Sincerely,



Carol Lee-Roark, Ph.D.
Hyalite Environmental, LLP

Enclosures: Figures 1 through 8; Description of Alternatives
Additional materials relevant to specific agency review/input

Hyalite Environmental, LLP

mfwp wildlife.doc 5/23/10

CKLR

From: "Miller, Martin" <martinm@mt.gov>
To: <roark@imt.net>
Sent: Tuesday, June 22, 2010 2:59 PM
Attach: 10mtsl0033.ZIP
Subject: GGWSD - non Util Sol Alts

Hi, Carol,

The information you requested is attached. If you would like a printed version of these documents, please let me know.

Let me know if you have any questions.

Thanks,

Martin Miller
(406) 444-3290
Data Assistant
Montana Natural Heritage Program

_____ Information from ESET NOD32 Antivirus, version of virus signature database 5219
(20100622) _____

The message was checked by ESET NOD32 Antivirus.

<http://www.eset.com>



P.O. Box 201800 • 1515 East Sixth Avenue • Helena, MT 59620-1800 • fax 406.444.0581 • tel 406.444.5354 • <http://mtnhp.org>

June 22, 2010

Carol Lee-Roark
Hyalite Environmental, LLP
PO Box 90
Gallatin Gateway, Montana 59730

Dear Carol,

I am writing in response to your recent request regarding species of concern in the vicinity of the GGWSD - non Util Sol Alts project, in Sections 11 and 12, T03S, R04E.

In checking our database for this area, I found no records of species of special concern. A map is enclosed so you can confirm that the search area is correct.

Also included is a map depicting wetland areas in the vicinity of your project.

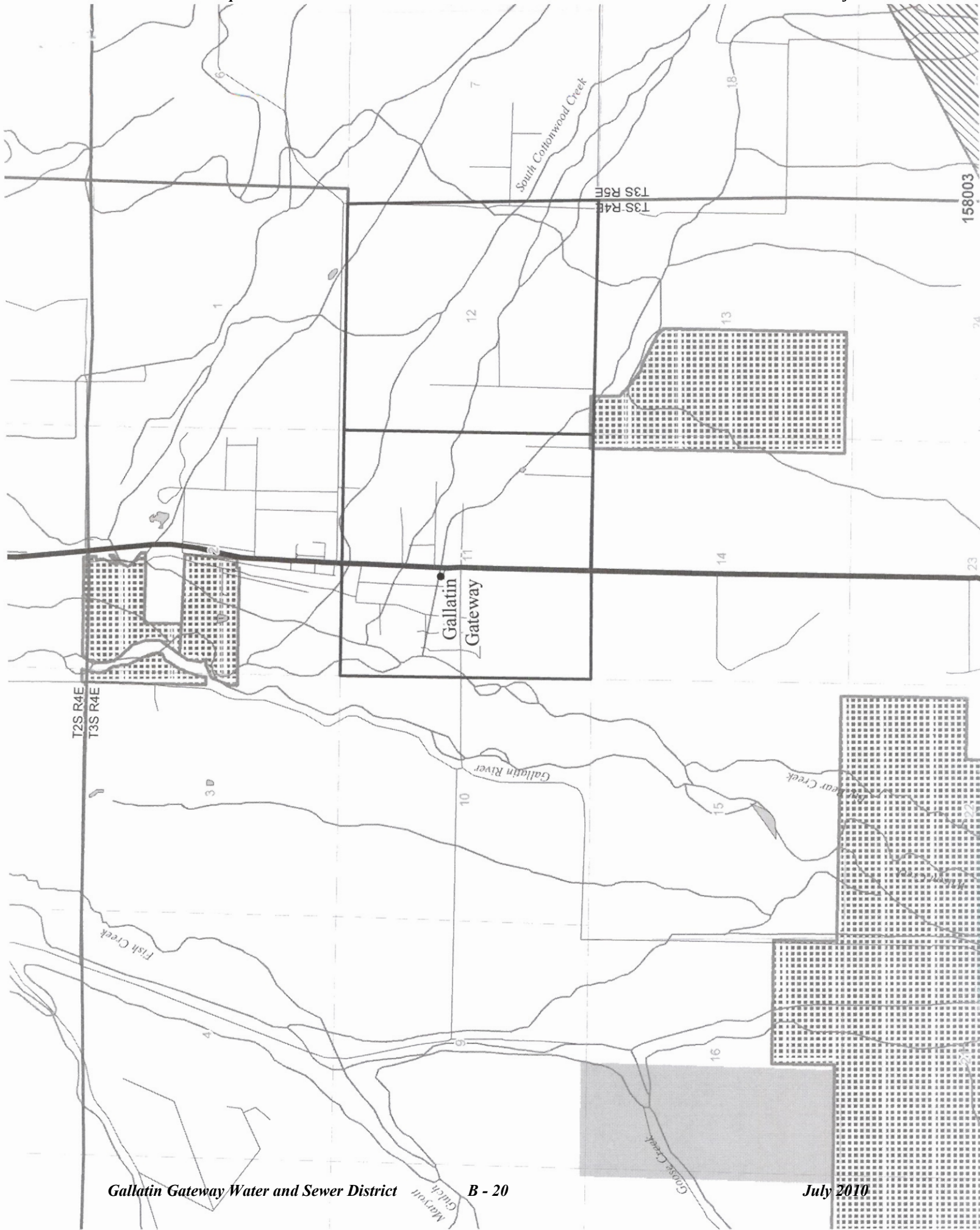
Please remember that results of a data search by the Montana Natural Heritage Program are not intended as a final statement on sensitive species within a given area, or as a substitute for on-site surveys, which may be required for environmental assessments.

The results of a data search by the Montana Natural Heritage Program reflect the current status of our data collection efforts. These results are not intended as a final statement on sensitive species within a given area, or as a substitute for on-site surveys, which may be required for environmental assessments. The information is intended for project screening only with respect to species of concern, and not as a determination of environmental impacts, which should be gained in consultation with appropriate agencies and authorities.

Should you have any questions or require additional information, please feel free to contact me at (406) 444-3290 or via my e-mail address below.

Sincerely,

Martin P. Miller
Montana Natural Heritage Program
martinm@mt.gov



CKLR

From: "Miller, Martin" <martinm@mt.gov>
To: <roark@imt.net>
Sent: Tuesday, June 22, 2010 2:56 PM
Attach: 10mtsI0032.ZIP
Subject: GGWSD-util solutions

Hi, Carol,

The information you requested is attached.

We have begun providing request responses in electronic format files. The attached zip file contains the information you requested. If you would like a printed version of these documents, please let me know.

One of the advantages in providing electronic files is that the map is in Adobe GeoPDF format. With the appropriate Adobe Reader, it provides a convenient way to query and understand the information presented on the map. Documentation is included.

We have also begun providing information on wetlands in the project vicinity. A map and explanatory material are included.

Let me know if you have any questions.

Thanks,

Martin Miller
(406) 444-3290
Data Assistant
Montana Natural Heritage Program

Information from ESET NOD32 Antivirus, version of virus signature database 5219
(20100622)

The message was checked by ESET NOD32 Antivirus.

<http://www.eset.com>



P.O. Box 201800 • 1515 East Sixth Avenue • Helena, MT 59620-1800 • fax 406.444.0581 • tel 406.444.5354 • <http://mtnhp.org>

June 22, 2010

Carol Lee-Roark
Hyalite Environmental, LLP
PO Box 90
Gallatin Gateway, Montana 59730

Dear Carol,

I am writing in response to your recent request regarding Montana species of concern in the vicinity of the GGWSD-util solutions project in Sections 2 and 11, T03S, R04E; and Sections 23-26 and 35, T02S, R04E. I checked our databases for information in this general area and have enclosed 3 species occurrence reports for 3 species of concern and one map. Note that the map is in Adobe GeoPDF format. With the appropriate Adobe Reader, it provides a convenient way to query and understand the information presented on the map. Documentation is included.

Also included is a map depicting wetland areas in the vicinity of your project. A document with descriptions of wetland characteristics is included.

Please keep in mind the following when using and interpreting the enclosed information and maps:

- (1) These materials are the result of a search of our database for species of concern that occur in an area defined by requested township, range and sections with an additional one-mile buffer surrounding the requested area. This is done to provide a more inclusive set of records and to capture records that may be immediately adjacent to the requested area. Reports are provided for the species of concern that are located in your requested area with a one-mile buffer. Species of concern outside of this buffered area may be depicted on the map due to the map extent, but are not selected for the SOC report.
- (2) On the map, polygons represent one or more source features as well as the locational uncertainty associated with the source features. A source feature is a point, line, or polygon that is the basic mapping unit of a Species Occurrence (SO) representation. The recorded location of the occurrence may vary from its true location due to many factors, including the level of expertise of the data collector, differences in survey techniques and equipment used, and the amount and type of information obtained. Therefore, this inaccuracy is characterized as locational uncertainty, and is now incorporated in the representation of an SO. If you have a question concerning a specific SO, please do not hesitate to contact us.
- (3) This report may include sensitive data, and is not intended for general distribution, publication or for use outside of your agency. In particular, public release of specific location information may jeopardize the welfare of threatened, endangered, or sensitive species or communities.
- (4) The accompanying map(s) display management status, which may differ from ownership. Also, this report may include data from privately owned lands, and approval by the landowner is advisable if specific location information is considered for distribution. Features shown on this map do not imply public access to any lands.
- (5) Additional biological data for the search area(s) may be available from other sources. We suggest you contact the U.S. Fish and Wildlife Service for any additional information on threatened and endangered species (406-449-5225). Also, significant gaps exist in the Heritage Program's fisheries data, and we suggest you contact the Montana Rivers Information System for information related to your area of interest (406-444-3345).

Electronic access to the Montana Natural Heritage Program is available at URL

<http://mtnhp.org>

- (6) **Additional information on species habitat, ecology and management is available on our web site in the Plant and Animal Field Guides, which we encourage you to consult for valuable information. You can access these guides at <http://mtnhp.org>. General information on any species can be found by accessing the link to NatureServe Explorer.**

The results of a data search by the Montana Natural Heritage Program reflect the current status of our data collection efforts. These results are not intended as a final statement on sensitive species within a given area, or as a substitute for on-site surveys, which may be required for environmental assessments. The information is intended for project screening only with respect to species of concern, and not as a determination of environmental impacts, which should be gained in consultation with appropriate agencies and authorities.

I hope the enclosed information is helpful to you. Please feel free to contact me at (406) 444-3290 or via my e-mail address, below, should you have any questions or require additional information.

Sincerely,



Martin P. Miller
Montana Natural Heritage Program
martinm@mt.gov

Montana Species of Concern GGWSD-util solutions Species of Concern

SPECIES OF CONCERN: A polygon feature representing only what is known from direct observation with a defined level of certainty regarding the spatial location of the feature.

NonVascular Plants

NonVascular Plants

Vascular Plants

Vascular Plants

Invertebrates

Invertebrates

Amphibians

Amphibians

Fish

Fish

Reptiles

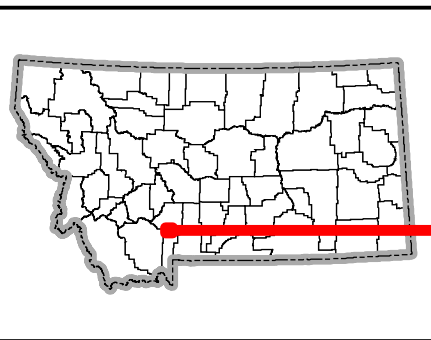
Reptiles

Birds

Birds

Mammals

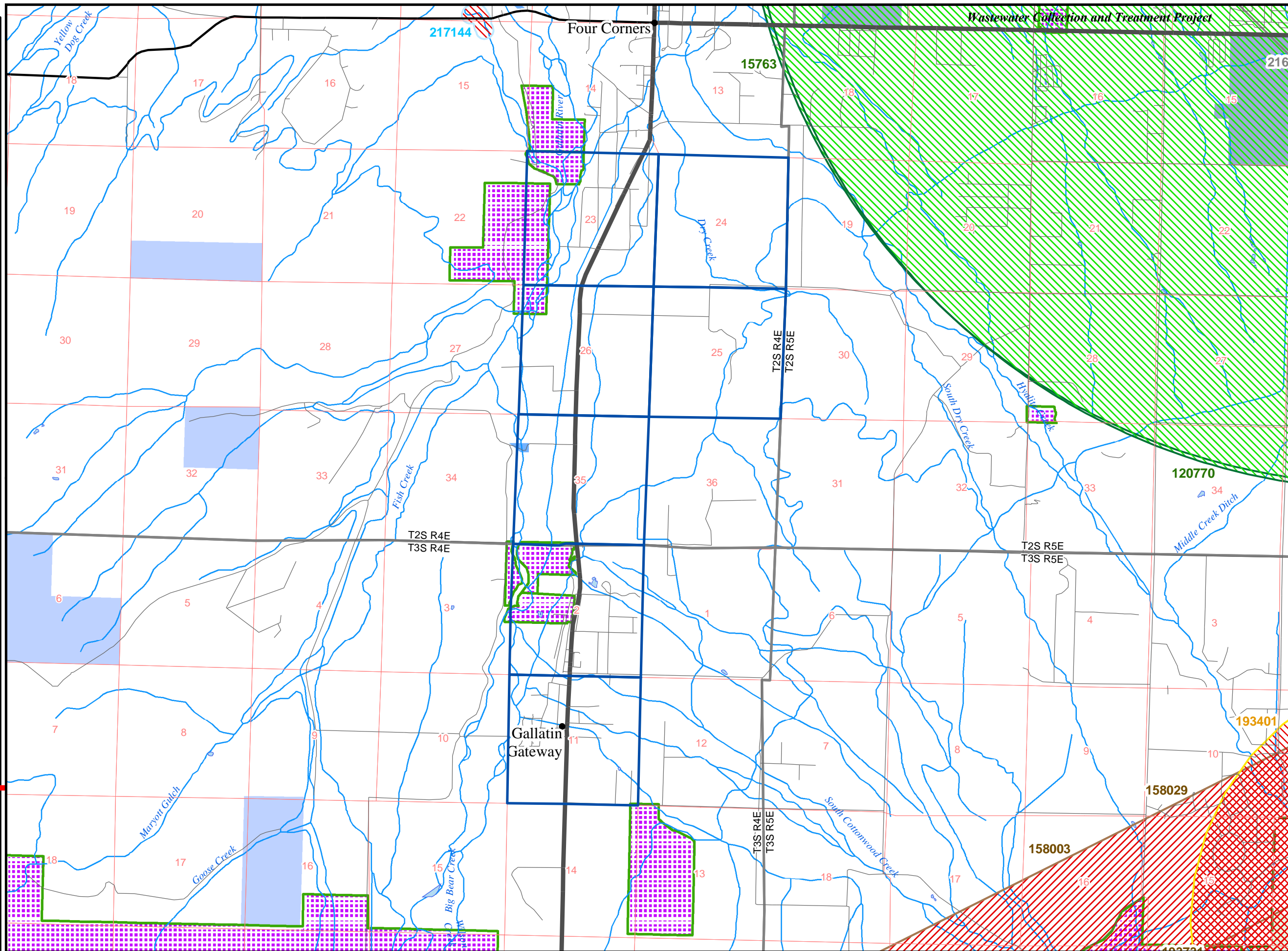
Mammals



Not all legend items may occur on the map.

Features shown on this map do not imply public access to any lands.

This map displays management status, which may vary from ownership.

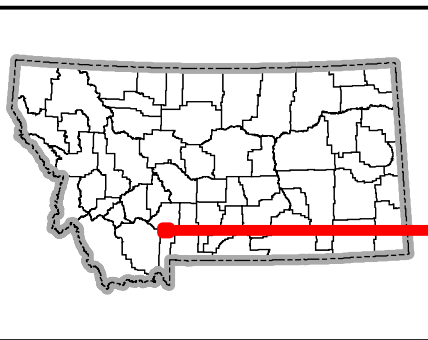


Montana Species of Concern GGWSD-util solutions Wetlands

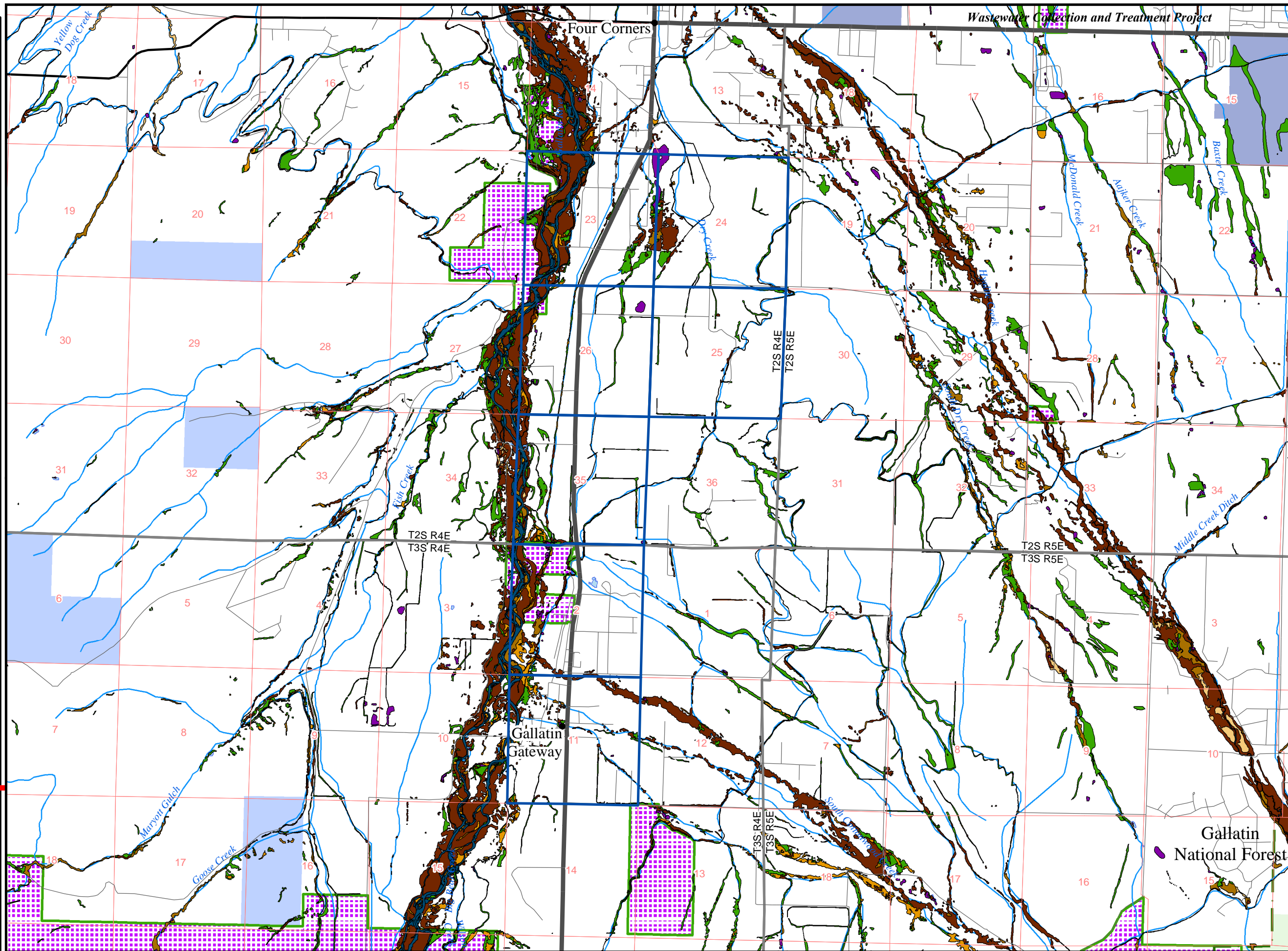
SPECIES OF CONCERN: A polygon feature representing only what is known from direct observation with a defined level of certainty regarding the spatial location of the feature.

Sites

- Sites
- Lacustrine
- Ponds
- Palustrine Emergent
- Palustrine Forested
- Palustrine Scrub-shrub
- Palustrine Shore
- Riverine
- Riverine Shore
- Riparian Emergent
- Riparian Scrub-shrub
- Riparian Forested



Not all legend items may occur on the map.
Features shown on this map do not imply public access to any lands.
This map displays management status, which may vary from ownership.



Wastewater Collection and Treatment Project

Gallatin National Forest





Natural Resource Information System
 Montana State Library
 P.O. Box 201800
 Helena, MT 59620-1800
 (406)444-3009 mtnhp@mt.gov

Species of Concern Data Report

Visit <http://mtnhp.org> for additional information.

Report Date:
 Tuesday, June 22, 2010

Spea bombifrons

[View Species Info in MT Field Guide](#)

Common Name: Plains Spadefoot

Description: Vertebrate Animal

Mapping Delineation:

Standing water bodies with confirmed evidence of reproduction (calling adults, eggs, larvae or new metamorphs) buffered by 100 meters in order to reflect importance of adjacent terrestrial habitats to survival of breeding adults and newly metamorphosed juveniles.

Species Status

Natural Heritage Ranks:

State: S3
 Global: G5

Federal Agency Status:

[Click for Status Help](#)

U.S. Fish & Wildlife Service:
 U.S. Forest Service: SENSITIVE
 U.S. Bureau of Land Management: SENSITIVE

FWP CFWCS Tier: 2

MT PIF Code:

Species Occurrences

Species Occurrence Map Label:	217144	SO Number:	1
First Observation Date:	1950-08-27	Acreage:	27
Last Observation Date:	1950-08-27	SO Rank:	

Physaria saximontana var. dentata

[View Species Info in MT Field Guide](#)

Common Name: Rocky Mountain Twinpod

Description: Vascular Plant

Mapping Delineation:

Individual occurrences are generally based upon a discretely mapped area provided by an observer and are not separated by any pre-defined distance. Individual clusters of plants mapped at fine spatial scales (separated by less than approximately 25-50 meters) may be grouped together into one occurrence if they are not separated by distinct areas of habitat or terrain features. Point observations are buffered to encompass any locational uncertainty associated with the observation.

Species Status

Natural Heritage Ranks:

State: S3
 Global: G3T3

Federal Agency Status:

[Click for Status Help](#)

U.S. Fish & Wildlife Service:
 U.S. Forest Service:
 U.S. Bureau of Land Management:

FWP CFWCS Tier:

MT PIF Code:

Species Occurrences

Species Occurrence Map Label:	120770	SO Number:	3
First Observation Date:	Jun 29 1899 12:00AM	Acreage:	49,683
Last Observation Date:	Jun 29 1899 12:00AM	SO Rank:	H



Natural Resource Information System
 Montana State Library
 P.O. Box 201800
 Helena, MT 59620-1800
 (406)444-3009 mtnhp@mt.gov

Species of Concern Data Report

Visit <http://mtnhp.org> for additional information.

Report Date:
 Tuesday, June 22, 2010

Sphenopholis intermedia

[View Species Info in MT Field Guide](#)

Common Name: Slender Wedgegrass

Description: Vascular Plant

Mapping Delineation:

Individual occurrences are generally based upon a discretely mapped area provided by an observer and are not separated by any pre-defined distance. Individual clusters of plants mapped at fine spatial scales (separated by less than approximately 25-50 meters) may be grouped together into one occurrence if they are not separated by distinct areas of habitat or terrain features. Point observations are buffered to encompass any locational uncertainty associated with the observation.

Species Status

Natural Heritage Ranks:

State: S1
 Global: G5

Federal Agency Status:

U.S. Fish & Wildlife Service:
 U.S. Forest Service:
 U.S. Bureau of Land Management:

[Click for Status Help](#)

FWP CFWCS Tier:

MT PIF Code:

Species Occurrences

Species Occurrence Map Label:	15763	SO Number:	1
First Observation Date:	Jul 25 1898 12:00AM	Acreage:	49,683
Last Observation Date:	Jul 26 1905 12:00AM	SO Rank:	H

CKLR

From: "Murdo, Damon" <dmurdo@mt.gov>
To: "CKLR" <roark@imt.net>
Sent: Monday, May 24, 2010 3:03 PM
Attach: CRABS.pdf; CRIS.pdf
Subject: RE: GGWSD SHPO -- Utility Solutions Alternative

Big Sky. Big Land. Big History.

Montana

Historical Society

State Historic Preservation Office • 1410 Eighth Ave • P.O. Box 201202
Helena, MT 59620-1202 • 406-444-7715

May 24, 2010

Carol Lee-Roark
Hyalite Environmental
PO Box 90
Gallatin Gateway, MT 59730

RE: WASTEWATER COLLECTION SYSTEM & TREATMENT PLANT, GALLATIN GATEWAY.
SHPO Project #2010052403

Dear Carol:

I have conducted a cultural resource file search for the above-cited project located in Sections 2, 11, T3S R4E and Sections 25, 35, T2S R4E. According to our records there have been a few previously recorded sites within the designated search locale. Site 24GA0746 is the historic Gallatin Gateway Inn, which is listed on the National Register of Historic Places. In addition to the sites there have been a few previously conducted cultural resource inventories done in the areas. I've attached a list of the reports. If you would like any further information regarding the sites or reports you may contact me at the number listed below.

It is SHPO's position that any structure over fifty years of age is considered historic and is potentially eligible for listing on the National Register of Historic Places. If any structures are to be altered and are over fifty years old we would recommend that they be recorded and a determination of their eligibility be made.

As long as there will be no disturbance or alteration to structures over fifty years of age we feel that there is a low likelihood cultural properties will be impacted. We, therefore, feel that a recommendation for a cultural resource inventory is unwarranted at this time. However, should structures need to be altered or if cultural materials be inadvertently discovered during this project we would ask that our office be contacted and the site investigated.

If you have any further questions or comments you may contact me at (406) 444-7767 or by e-mail at dmurdo@mt.gov. Thank you for consulting with us.

Sincerely,

Damon Murdo

Cultural Records Manager
State Historic Preservation Office

File: DEQ/AIR&WATER WASTE MNG/2010

_____ Information from ESET NOD32 Antivirus, version of virus signature database 5142
(20100524) _____

The message was checked by ESET NOD32 Antivirus.

<http://www.eset.com>



STATE HISTORIC PRESERVATION OFFICE
Cultural Resource Information Systems
Report

Report Date:
 05/24/2010

Site #	Twp	Rng	Sec	Qs	Site Typel	Site Type 2	Time Period	Owner	NR Status
24GA0811	2 S	4 E	35	Comb	Historic Euro-American Site	Historic Railroad, Stage Route, Travel	Prehistoric More Than One Period	State Owned	undetermined
24GA0811	2 S	4 E	35	Comb	Historic Euro-American Site	Historic Railroad, Stage Route, Travel	Prehistoric More Than One Period	State Owned	undetermined
24GA1676	2 S	4 E	35	NW	Historic Vehicular/Foot Bridge	Null	Historic More Than One Decade	Other	undetermined
24GA1676	2 S	4 E	35	NW	Historic Vehicular/Foot Bridge	Null	Historic More Than One Decade	Other	undetermined
24GA0811	3 S	4 E	2	Comb	Historic Euro-American Site	Historic Railroad, Stage Route, Travel	Prehistoric More Than One Period	State Owned	undetermined
24GA0811	3 S	4 E	2	Comb	Historic Euro-American Site	Historic Railroad, Stage Route, Travel	Prehistoric More Than One Period	State Owned	undetermined
24GA0998	3 S	4 E	11	NW	Historic Euro-American Site	Historic Irrigation System	Historic Period	Private	undetermined
24GA0746	3 S	4 E	11	comb	Historic Recreation/Tourism	Historic Hotel	1920-1930	Private	NR Listed



State Historic Preservation Office

Cultural Resource Annotated Bibliography System

CRABS Township Range Report

May 24, 2010

Township:02S Range: 04E Section: 25

LAHREN LARRY A.

12/ 8/ 1999 CULTURAL RESOURCE EVALUATIONS OF THE PROPOSED ELK GROVE
SUBDIVISION, GALLATIN CO., MT

CRABS Document Number: GA 6 22597 Agency Document No:

Township:02S Range: 04E Section: 25

PASSMANN DORI, ET AL.

11/ / 2004 CULTURAL RESOURCE INVENTORY OF THE 2004 NRCS FIELD STAFF
NEGATIVE REPORTS IN GALLATIN COUNTY, MONTANA

CRABS Document Number: GA 6 27406 Agency Document No:

Township:02S Range: 04E Section: 35

KRIGBAUM DAGNY

12/ 15/ 2004 NEGATIVE INVENTORY REPORT: CULTURAL RESOURCE INVESTIGATIONS OF
THE AXTELL BRIDGE FAS, LOCATED IN WEST GALLATIN COUNTY, MONTANA

CRABS Document Number: GA 6 27383 Agency Document No:

Township:02S Range: 04E Section: 35

ROSSILLON MITZI

9/ / 1989 AN EVALUATION OF THE GALLATIN VALLEY ELECTRIC RAILWAY GRADE ON
THE GALLATIN GATEWAY - NORTH AND SOUTH HIGHWAY PROJECT

CRABS Document Number: GA 4 3438 Agency Document No: F50-2(24)70

Township:03S Range: 04E Section: 2

HERBORT DALE P.

4/ / 1993 CULTURAL RESOURCE INVENTORY OF FOUR GRAVEL PIT RECLAMATION
PROJECTS

CRABS Document Number: ZZ 5 15073 Agency Document No:

Township:03S Range: 04E Section: 2

ROSSILLON MITZI

9/ / 1989 AN EVALUATION OF THE GALLATIN VALLEY ELECTRIC RAILWAY GRADE ON
THE GALLATIN GATEWAY - NORTH AND SOUTH HIGHWAY PROJECT

CRABS Document Number: GA 4 3438 Agency Document No: F50-2(24)70

Township:03S Range: 04E Section: 11

AXLINE JON A.

3/ 17/ 1994 GALLATIN RIVER BRIDGES - GALLATIN GATEWAY

CRABS Document Number: GA 4 15661 Agency Document No: BH 9016(14)



State Historic Preservation Office

Cultural Resource Annotated Bibliography System

CRABS Township Range Report

May 24, 2010

Township:03S Range: 04E Section: 11

LOVEJOY MARY
6/1/1994 PROPOSED POST OFFICE FACILITY, GALLATIN GATEWAY, GALLATIN COUNTY
MT.

CRABS Document Number: GA 6 16971 Agency Document No:



United States Department of the Interior
Fish and Wildlife Service



Ecological Services
Montana Field Office
585 Shepard Way
Helena, Montana 59601-6287

Phone: (406) 449-5225 Fax: (406) 449-5339

June 22, 2010

Ms. Carol Lee-Roark, Ph.D., P.G.
Hyalite Environmental, LLP
P.O. Box 90
Gallatin Gateway, MT 59730

Dear Ms. Lee-Roark:

In a letter dated March 2, 2010, we indicated that we would be supportive of any viable wastewater treatment option(s) that are likely to result in improved quality of the waters in the State of Montana, as this is generally beneficial to fish, wildlife, and habitat resources under the purview of the U.S. fish and Wildlife Service. After a review of the information attached to your May 20, 2010 cover letter, we are satisfied that the Septic Tank/Level 2/Pressure Dosed Drainfield alternative is in keeping with the goal of better water quality and the resulting indirect benefits to fish and wildlife resources.

Thank you for the opportunity to review and comment on the alternatives you considered. Please telephone me at 406/449-5225, ext. 205, if you have any questions regarding this matter.

Sincerely,

R. Mark Wilson
Field Supervisor



REPLY TO
ATTENTION OF

DEPARTMENT OF THE ARMY
CORPS OF ENGINEERS, OMAHA DISTRICT
MISSOULA REGULATORY OFFICE
1600 NORTH AVENUE WEST, SUITE 105
MISSOULA, MONTANA 59801-5500

June 18, 2010

Regulatory Branch
Montana State Program
Corps No. **NWO-2010-00410-MTH**

Subject: Wastewater System Installation – Gallatin Gateway Community

Hyalite Environmental, LLP
Attn: Carol Lee-Roark, Ph.D.
PO Box 90
Gallatin Gateway, Montana 59730-0090

Dear Ms. Lee-Roark:

We have reviewed the pre-application consultation request submitted on behalf of the Gallatin Gateway Community to install a wastewater treatment system and sewer lines. The proposed project is located in Section 11, Township 3 South, Range 4 East, in Gallatin County, Montana.

Under the authority of Section 404 of the Clean Water Act, Department of the Army (DA) permits are required for the discharge of fill material into waters of the U.S. Waters of the U.S. include the area below the ordinary high water mark of stream channels and lakes or ponds connected to the tributary system, and wetlands adjacent to these waters. Isolated waters and wetlands, as well as man-made channels, may be waters of the U.S. in certain circumstances, which must be determined on a case-by-case basis. The project site includes the East Fork of the Gallatin River and tributaries of the Gallatin River. The Gallatin River is a tributary of the Missouri River, a traditionally navigable water of the U.S. under DA jurisdiction.

Based on the information received, if the forced sewer or main lines are installed by boring beneath the creeks or canals, no DA permit is required for those crossings. If the sewer lines installation involves removal or placement of fill within the East Fork of the Gallatin River, its tributaries or canals, below the ordinary high water mark, a DA permit is required. If the project involves placement of fill in wetlands adjacent to the East Fork of the Gallatin River or its tributaries, a DA permit is required. It is unclear if the project area includes wetlands or waters that have not been delineated by the National Wetland Inventory. The project area should be reviewed by a qualified wetland delineator in order to determine if wetlands and jurisdictional waters are present.

In addition, it appears there may be six sites listed on the National Register of Historic Places in the project area. Consultation with the Montana Historical Society may be necessary.

This does not eliminate the requirement to obtain other applicable Federal, state, tribal and local permits. Information on DA permits and applications are available at <https://www.nwo.usace.army.mil/html/od-rmt/mthome.htm>.

Please contact Amy Gucker at (406)541-4845, extension 325, if you have any questions and reference Corps File Number NWO-2010-00410-MTH.

Sincerely,



Todd N. Tillinger
Montana Program Manager



Hyalite Environmental, LLP -- Communication Record

Re:	Interagency consultation	Date:	6/21/2010
Contact:	Marcie Munion	Hyalite:	CKLR
	Gallatin CD administrator	Project:	GGWSD ER
Phone:	522-4000	Pages:	1

CKLR: explained, asked if the CD would have any input

Marcie Munion: she received the request for input and reviewed it, looked at their maps and files and does not believe that they have any concerns or jurisdiction related to the proposed actions

CKLR: mentioned potential for crossing ditches and streams

MM: 310 permitting, if applicable

MM: is content for CKLR phone notes to serve as input from the CD

Appendix C

Example Documentation of Public Participation

Gallatin Gateway County Water & Sewer District

[Home](#) | [Organization](#) | [Documents](#) | [FAQ](#) |

Events

- Next Meeting - July 5

Links

Water & Sewer

- [Big Sky Water/Sewer District](#)
- [Hebgen Lake Water/Sewer District](#)
- [Lockwood Water/Sewer District](#)
- [Greater Woods Bay Water/Sewer District](#)
- [Somers Water/Sewer District](#)
- [Midwest Assistance Program](#)
 - [EPA Info on Treatment Technologies](#)
- [EPA Quick Reference Guides](#)
 - [EPA Safe Drinking Water](#)
 - [USDA Conservation & Development](#)
 - [National Rural Water](#)
- [Ground-Water Information Center](#)
 - [AWWA](#)

Gateway Community

- [Gallatin Gateway Fire Department](#)
 - [Gallatin Gateway Inn](#)
- [Gateway Community Center](#)
 - [Gateway Community Plan](#)
- [Gateway School-Home of the Gators](#)
 - [Bear Creek Log Homes](#)
 - [Big Timberworks](#)
 - [Canyon Cabins](#)
 - [C. Francis Sporting Agents](#)
 - [EJ's Western Artworks](#)
- [Geyser Whitewater Expeditions](#)
 - [Rockhaven Camp - First Presbyterian](#)
 - [Lumber Jack Log Homes](#)

Welcome to the GGWSD

IMPORTANT INFO

- The income survey is complete. Midwest Assistance Program will draw for the \$500 prize as soon as the survey is certified.

The Gallatin Gateway County Water & Sewer District was created on February 17, 2009 to serve the water and wastewater needs of the community of Gallatin Gateway in Gallatin County, Montana.

Meetings of the Board of Directors are held on the first Monday of the month at 6:30 PM in the boardroom of the Gallatin Gateway Fire Station. Meetings are always open to public. If you would like to receive a copy of the agenda for the upcoming meeting send a blank email to agenda@gatewaywsd.com. An automated reply will be sent back to you.

The timeline for building a wastewater collection and treatment system depends on state and federal budget cycles. The tentative timeline for central sewer is:

- 2009 - Choose the best option for Gallatin Gateway (Prelim. Eng. Review is complete)
- 2010 - Prepare and submit grant applications (Three of five applications complete)
- Spring 2011 - Find out results of grant applications
- Summer 2011 - Finalize financing
- Fall 2011 - Design system
- Summer 2012 - Begin construction

This website will continue to be developed as more information becomes available.

- [Stacey's Bar and Steakhouse](#)

State and County *Environmental Report*

- [MT Code - Water/Sewer Districts](#)
 - [MT Dept. of Commerce](#)
 - [MT Subdivision Review](#)
- [Gallatin County Growth Plan](#)

Wastewater Collection and Treatment Project

Last Modified:
May 15, 2010

Gallatin Gateway County Water and Sewer District - PO Box 383 - Gallatin Gateway, MT 59730
[| Contact Information |](#)

Gallatin Gateway County Water & Sewer District

PUBLIC MEETING

Date: November 2, 2009

Time: 6:30PM

Place: Gallatin Gateway Fire Station, 320 Webb St., Gallatin Gateway, MT

For: Regular Meeting of the Board of Directors

AGENDA

I. Call To Order

- A. Call To Order (Adams)
- B. Public Participation on Non-Agenda Items¹ (Adams)

II. Approval of Minutes

- A. Approval of Meeting Minutes for September 14, 2009 (Donnelly)

III. Reports of Officers, Standing Committees, and Special Committees

- A. Report of General Manager & Report of Financial Condition (Donnelly)

IV. Unfinished Business and General Orders

- A. Report from Great West Engineering on Status of Preliminary Engineering Review (Guest)
- B. Discussion on Status of Income Survey (Guest)

V. New Business

- A. Any New Business Which May Come Properly to the Board (Adams)

VI. Adjourn

¹ The opportunity for members of the public to comment on District matters which are not on the agenda. Time limits may be imposed at the discretion of the President.

Gallatin Gateway County Water & Sewer District

MINUTES OF THE

BOARD OF DIRECTORS

A regular meeting of the Board of Directors of the Gallatin Gateway County Water & Sewer District was held in the boardroom of the Gallatin Gateway Fire Station on November 2, 2009. Present at the meeting were board members Merle Adams, Ted Border, David Sullivan and Earl Wortman. Director White was not present. Attorney Susan Swimley and general manager Matt Donnelly were present.

The meeting was called to order at 6:28 p.m. by President Adams. Matt Donnelly was asked to act as Secretary and record the minutes.

President Adams asked for public comment and, seeing none, moved to the approval of minutes. After confirming that all directors had a copy of the minutes of the last meeting, President Adams asked whether there were any corrections. Seeing no comments, Director Border then moved that the minutes be approved. Director Wortman seconded the motion, which was unanimously adopted.

Mr. Donnelly was then asked to give the report of the General Manager and Treasurer. Mr. Donnelly explained that there were no material changes to the operational or financial condition of the District since the last meeting. Mr. Donnelly noted that the Gateway Birthday Bash organization had donated another \$4850 in addition to their previous donation. The Board expressed their gratitude.

Ms. Swimley then led a discussion of annexation procedures. Ms. Swimley and the Board concluded that it would be beneficial for the District to proceed with annexation of contiguous properties so long as the petitioners sign an agreement stipulating that they understand they will not get service until the sewer project is complete. Ms. Swimley agreed to draft such an agreement. The Board indicated that they were willing to move forward with annexations using this procedure.

Ms. Swimley then gave a report on the status of the Four Corners County Water & Sewer District's efforts to purchase Utility Solutions. There is to be a hearing on November 11 after which Ms. Swimley felt that there would be more certainty as to the outcome of the proposed purchase.

Next on the agenda was a report from Great West Engineering on the status of the PER. Terry Threlkeld led a "kickoff" discussion that included scope and timing for the PER. Mr. Threlkeld presented the Board with a detailed

agenda for the kickoff discussion which is appended to the minutes. A discussion of scope ensued. The Board learned that grant writing is considered by GW to be outside of the scope of the PER. Grant writing refers to completing the full grant proposal package for each of the funding agencies. A major section of the full proposal is the PER, but there is also additional writing required. The Board decided to further investigate the issue. To complete his report, Mr. Threlkeld asked the Board to deliver an estimate of the expected growth rate of the District for use in the PER.

President Adams then turned the meeting to a discussion of the income survey. Callie Ronning from MAP attended the meeting and informed the Board that Sandy Kust's mother had passed away and she had been out of the office. The Board expressed their sincere condolences to Ms. Kust and her family. Ms. Ronning reported that the income survey had been approved by RD and by CDBG. Sandy will send the letters out as soon as the format has received final approval by the Board. Ms. Ronning indicated that there may be some door-to-door canvassing necessary in order to get the required return rates.

The meeting then turned to new business. Seeing none, the President announced that the next meeting will be held on December 7.

President Adams then asked if there was any additional new business. Seeing none, Director Sullivan moved to adjourn and Director Border seconded. After unanimous vote the meeting was adjourned at 8:20 p.m.

Secretary

251925 169631

LEGAL#10182 G.G. WATER & SEWER

PO BOX 383
GALLATIN GATEWAY MT 59730

**AFFIDAVIT OF PUBLICATION
STATE OF MONTANA**

County of Gallatin

)
)SS.
)

Matt Rose

being duly sworn, deposes and says; that he/she is legal ad clerk of the Bozeman Daily Chronicle, a newspaper of general circulation, printed and published in Bozeman, Gallatin County, Montana; and that the notice here unto annexed 03/22/10 SPECIAL MEETING

has been correctly published in the regular and entire issues of every number of said paper for 2 insertions.

Said notice was published on:
03/14/2010 03/21/2010

[Signature]

Subscribed and sworn to before me this
23rd day of March , 2010

[Signature]

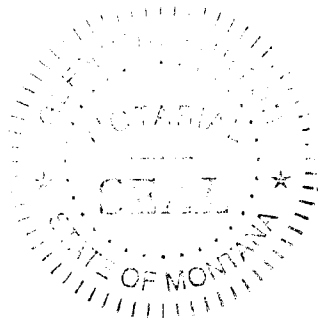
Notary Public for the State of Montana
Residing at Bozeman, Montana

[Signature]

Notary Public for the State of Montana
Residing at Bozeman, Montana
My Commission Expires June 28, 2012

**GALLATIN GATEWAY
COUNTY WATER & SEWER
DISTRICT NOTICE OF
SPECIAL MEETING.**

The Board of Directors of the Gallatin Gateway County Water & Sewer District will hold a special meeting on March 22 at 7:00PM at the Gallatin Gateway Community Center, 145 Mill St., Gallatin Gateway, MT to discuss the draft Preliminary Engineering Review for a proposed public wastewater system. A proposed wastewater collection and treatment technology and cost structure will be reviewed and discussed. Agendas will be posted at the Gallatin Gateway Post Office, the Gallatin Gateway Community Center, and on-line at www.gatewaywsd.com.



GALLATIN GATEWAY COUNTY WATER & SEWER DISTRICT

March 6, 2010

From the Board of Directors of the Gallatin Gateway Water & Sewer District

Informational Meeting March 22, 7PM, Community Center

Dear Gallatin Gateway Community Member,

You are invited to attend an informational meeting of the Board of Directors of the Gallatin Gateway Water & Sewer District on March 22 at 7PM in the Gateway Community Center, 145 Mill St. Gallatin Gateway, MT. The Board of Directors, with assistance from engineers representing Great West Engineering, will describe a proposed plan of action for providing a public sewer infrastructure for the District along with associated costs. A map of the District will be posted at the Post Office and Community Center, or you can view a map at <http://www.gatewaywsd.com/docs/boundaries.pdf>.

Obtaining state and federal grants for the proposed project is a priority for the Board of Directors. Every dollar of grant money that the Board is able to secure reduces the financial burden on the community. The purpose of this meeting is to inform the public about the proposed project and to generate support for the grant application process. The process is very lengthy—we are still at least two years away from beginning construction if all goes well. You will not be asked to approve the project at this point. You are only being asked whether you are supportive and would like the Board to proceed with grant applications.

The Gallatin Gateway County Water & Sewer District was formed in February 2009 to address the difficult wastewater issues facing our community. The Board of Directors meets on the first Monday of every month at 6:30PM in the boardroom of the Gateway Fire Station. All meetings of the Board are open to the public.

Please come to this meeting. You will learn:

- What kind of sewage treatment plant is proposed and where it might be located;
- Where the sewer lines might be run and what impact it might have on the community;
- What is the total project cost and how much might be offset by grants;
- What the monthly rates and charges might be for users connected to the system;
- Some of the experiences other communities have had.

You will also have the opportunity to meet the Board of Directors and the staff member for the District and to provide valuable input that could help the Board make the best choices for our community. We hope to see you there.

Gallatin Gateway Water & Sewer District
PO Box 383, Gallatin Gateway, MT 59730
www.gatewaywsd.com

Example email sent to over 80 Gallatin Gateway residents' email addresses.

From: **GGWSD News** <news@gatewaywsd.com>
Date: Sat, Mar 6, 2010 at 11:35 AM
Subject: Gateway Sewer Meeting -- March 22
To:

Dear Gallatin Gateway Community Member,

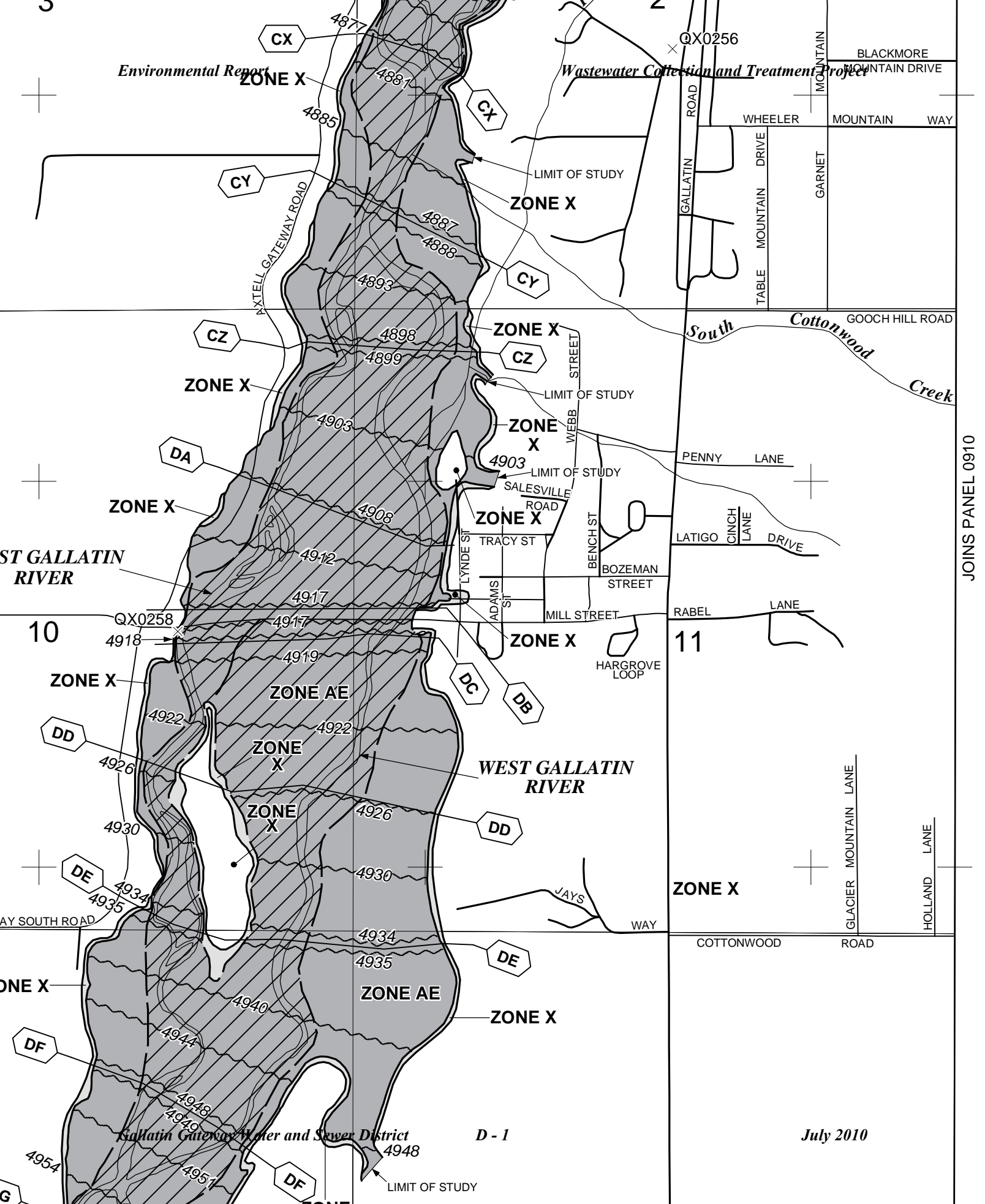
You are invited to attend an informational meeting regarding a proposed sewer system for Gallatin Gateway. The meeting will be held on March 22 at 7PM at the community center. More information is attached to this email and at www.gatewaywsd.com.

PLEASE DON'T REPLY TO THIS EMAIL. Instead, you can email Matt Donnelly, gm@gatewaywsd.com, if you have questions or comments.

Sincerely Yours,
The Board of Directors and staff of the GGWSD

Appendix D

Floodplain Map



Environmental Report

Wastewater Collection and Treatment Project

ZONE X

ZONE X

ZONE X

ZONE X

ZONE X

ZONE X

ZONE AE

ZONE X

ZONE X

ZONE AE

ZONE X

Gallatin Gateway Water and Sewer District

D - 1

July 2010

JOINS PANEL 0910

LEGEND



SPECIAL FLOOD HAZARD AREAS (SFHAs) SUBJECT TO INUNDATION BY THE 1% ANNUAL CHANCE FLOOD

The 1% annual chance flood (100-year flood), also known as the base flood, is the flood that has a 1% chance of being equaled or exceeded in any given year. The Special Flood Hazard Area is the area subject to flooding by the 1% annual chance flood. Areas of Special Flood Hazard include Zones A, AE, AH, AO, AR, A99, V and VE. The Base Flood Elevation is the water-surface elevation of the 1% annual chance flood.

- ZONE A** No Base Flood Elevations determined.
- ZONE AE** Base Flood Elevations determined.
- ZONE AH** Flood depths of 1 to 3 feet (usually areas of ponding); Base Flood Elevations determined.
- ZONE AO** Flood depths of 1 to 3 feet (usually sheet flow on sloping terrain); average depths determined. For areas of alluvial fan flooding, velocities also determined.
- ZONE AR** Special Flood Hazard Area formerly protected from the 1% annual chance flood by a flood control system that was subsequently decertified. Zone AR indicates that the former flood control system is being restored to provide protection from the 1% annual chance or greater flood.
- ZONE A99** Area to be protected from 1% annual chance flood by a Federal flood protection system under construction; no Base Flood Elevations determined.
- ZONE V** Coastal flood zone with velocity hazard (wave action); no Base Flood Elevations determined.
- ZONE VE** Coastal flood zone with velocity hazard (wave action); Base Flood Elevations determined.



FLOODWAY AREAS IN ZONE AE

The floodway is the channel of a stream plus any adjacent floodplain areas that must be kept free of encroachment so that the 1% annual chance flood can be carried without substantial increases in flood heights.



OTHER FLOOD AREAS

- ZONE X** Areas of 0.2% annual chance flood; areas of 1% annual chance flood with average depths of less than 1 foot or with drainage areas less than 1 square mile; and areas protected by levees from 1% annual chance flood.



OTHER AREAS

- ZONE X** Areas determined to be outside the 0.2% annual chance floodplain.
- ZONE D** Areas in which flood hazards are undetermined, but possible.



COASTAL BARRIER RESOURCES SYSTEM (CBRS) AREAS



OTHERWISE PROTECTED AREAS (OPAs)

CBRS areas and OPAs are normally located within or adjacent to Special Flood Hazard Areas.

————— Floodplain boundary

————— Floodway boundary

- - - - - Zone D boundary

●●●●●●●●●● CBRS and OPA boundary



← Boundary dividing Special Flood Hazard Areas of different Base Flood Elevations, flood depths or flood velocities.

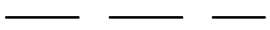


OTHERWISE PROTECTED AREAS (OPAs)

CBRS areas and OPAs are normally located within or adjacent to Special Flood Hazard Areas.

Environmental Report

Wastewater Collection and Treatment Project



Floodplain boundary



Floodway boundary



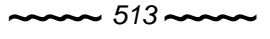
Zone D boundary



CBRS and OPA boundary



Boundary dividing Special Flood Hazard Areas of different Base Flood Elevations, flood depths or flood velocities.

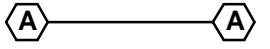


Base Flood Elevation line and value; elevation in feet*

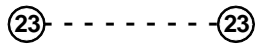
(EL 987)

Base Flood Elevation value where uniform within zone; elevation in feet*

* Referenced to the North American Vertical Datum of 1988 (NAVD 88)



Cross section line



Transect line

97°07'30", 32°22'30"

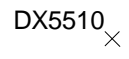
Geographic coordinates referenced to the North American Datum of 1983 (NAD 83)

4275⁰⁰⁰mN

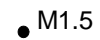
1000-meter Universal Transverse Mercator grid ticks, zone 12

6000000 M

5000-foot grid ticks: Montana State Plane coordinate system, (FIPZONE 2500), Lambert Conformal Conic



Bench mark (see explanation in Notes to Users section of this FIRM panel)



River Mile

MAP REPOSITORIES

Refer to Map Repositories list on Map Index

EFFECTIVE DATE OF COUNTYWIDE FLOOD INSURANCE RATE MAP

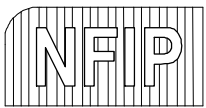
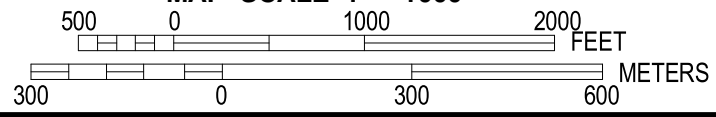
EFFECTIVE DATE(S) OF REVISION(S) TO THIS PANEL

For community map revision history prior to countywide mapping, refer to the Community Map History table located in the Flood Insurance Study report for this jurisdiction.

To determine if flood insurance is available in this community, contact your insurance agent or call the National Flood Insurance Program at 1- 800- 638- 6620.



MAP SCALE 1" = 1000'



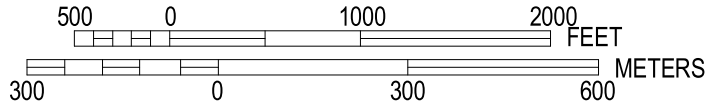
PANEL 0905D



FIRM



MAP SCALE 1" = 1000'



NFIP

PANEL 0905D

NATIONAL FLOOD INSURANCE PROGRAM

FIRM
FLOOD INSURANCE RATE MAP
GALLATIN COUNTY,
MONTANA
AND INCORPORATED AREAS

PANEL 905 OF 1725

(SEE MAP INDEX FOR FIRM PANEL LAYOUT)

CONTAINS:

<u>COMMUNITY</u>	<u>NUMBER</u>	<u>PANEL</u>	<u>SUFFIX</u>
GALLATIN COUNTY	300027	0905	D

Notice to User: The **Map Number** shown below should be used when placing map orders; the **Community Number** shown above should be used on insurance applications for the subject community.



MAP NUMBER
30031C0905D

EFFECTIVE DATE

Federal Emergency Management Agency