

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: Oroville Wildlife Area Robinson's Riffle Project

Contact Person: Chris Fritz

Organization/Affiliation: Sutter Butte Flood Control Agency

Contact Phone: (209) 304-1739

Contact Email: cfritz@pbieng.com

Project or Management Action Description and Status

Project or Management Action Name: Oroville Wildlife Area Robinson's Riffle Project

Project or Management Action Type: Project

Project or Management Action Proponent(s): Sutter Butte Flood Control Agency, Golden State Salmon Association

Project or Management Action Location: Oroville Wildlife Area (near Oroville, CA)

Project or Management Action Status (Planned, Potential, or Conceptual): Planned

Brief Project or Management Action Description (1-2 short paragraphs): The proposed Robinson's Riffle Restoration Project is a multi-benefit initiative located within the Oroville Wildlife Area (OWA) which provides hydraulic, ecological, recreational, flood management, educational, and local economic benefits to the disadvantaged community of Oroville and the surrounding area. The project area lies within the State owned 12,000-acre OWA in Butte County, California and is cooperatively managed by the California Department of Water Resources (DWR) and the California Department of Fish and Wildlife (CDFW). The project would directly enhance streamflow through grading improvements along the Feather River to reconnect the overbank areas to the main channel and by providing new additional side-channel and floodplain habitat. The project would also directly enhance the quality of water (reducing temperatures/improving flow) within this reach of the Feather River, providing new shaded riverine habitat, and by removing invasive vegetation, which are all critical stressors for this portion of the river, and further downstream. Additionally, the increased acreage of frequently inundated areas of the Feather River during small flood events will increase the surface available for recharge into the aquifer.

As part of the proposed project the Sutter Butte Flood Control Agency (SBFCA), in partnership with DWR and CDFW, would develop, design, and obtain permits for the Robinson's Riffle Restoration Project. The project aims to restore habitat, reduce flood stages, and increase flood conveyance and transitory storage within the Feather River by excavating tailing piles. This will lower the floodplain surface to a more naturalized condition, which will markedly improve conditions for listed salmonids including improving flows, reducing temperatures, and providing more frequently inundated rearing habitat. The ecosystem restoration component of this project will target streamflow enhancements to benefit critical habitat and the following species: Chinook - Central Valley fall/late fall run, Central Valley spring-run, Sacramento River winter-run, and Central Valley steelhead; green sturgeon, Swainson's Hawk, Monarch butterfly, giant garter snake, yellow billed cuckoo, Valley elderberry longhorn beetle (VELB) and others.

Measurable Objectives Expected to Benefit: Lowering Groundwater Levels, Reduction of Storage, Degraded Quality, Land Subsidence

Implementation Timing/ Criteria for Implementation: SBFCA is currently seeking ~\$1.7M in funding to get the Robinson's Riffle Project started. The goal is to develop the details of a preferred project in coordination with interested stakeholders and resource agencies through a series of workshops to build consensus support for moving the project forward through construction. In addition to developing the details of the preferred project, the funding would also be used to initiate the design, environmental documentation, and permitting. The planning, design, and permitting phases are scheduled to take approximately 18 months.

Estimated Cost: \$1.7M for Planning, Design, Environmental, and Permitting

Potential Funding Sources: Prop 1; Prop 68, Grants, DWR programs

Required Permitting and Regulatory Process: It is anticipated that the project will require CEQA/NEPA; USACE 408; USACE 404; CDFW ITP; CDFW 1600 LSAA; State Lands Commission Lease; CVRWQCB 401; CVFPB Encroachment Permit; DWR Encroachment Permit

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year): TBD

Status of permitting and CEQA/NEPA compliance: Not yet started

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? Yes, Oroville, CA

Additional Information Sources: California Department of Fish and Wildlife Oroville Field Office

Other: A summary of the benefits of the OWA Robinson's Riffle Project is listed below.

Flood benefits for Urban Areas & Small Communities:

- Attenuates small flood events caused by potential failure of gated or other issues in the Oroville complex.
- Lowers WSE locally for larger hydrologic events and increases resiliency of flood management structures in an urban area.
- Flood maintenance is reduced by improving hydraulic performance of the floodway and removal of invasive vegetative species.
- Improves sediment control.

Recreation and Education Benefits:

- Improved and increased access for both motorized and non-motorized boating.
- Improved trails and increased access for hikers and walkers.
- Increased fishing access.
- Interpretive opportunities including access to observe outgoing salmon and steelhead, as well as increased numbers of fish, and other rare and endangered species.
- Increased public parking.
- Increased and improved cycling routes.
- Improved hunting in designated areas.
- Improved viewscape.
- Improves conditions and venues for bird watching.
- Improved site security and public safety of a formerly blighted area.

Local Economic Benefits:

- Increased short- and long-term economic activity from capital construction and long-term maintenance activity in a disadvantaged community.
- Potential source of aggregate for local construction.
- Increased local spending from visitors, fishermen and hunters in a disadvantaged community.

Species Benefits:

- Floodplain salmonid habitat (rearing & cover) for Chinook - Central Valley fall/late fall run, Central Valley spring-run, Sacramento River winter-run and Central Valley steelhead.
- Reduced juvenile salmonid predation.
- Elimination or reduction of fish stranding and enhanced fish entry and exit from the floodplain.
- Habitat improvements/benefits for other listed species: green sturgeon, Swanson's Hawk, Monarch butterfly, giant garter snake, VELB and others.
- Improved species connectivity throughout State-owned conservation areas.

Ecological Benefits:

- Reduction or elimination of numerous invasive species.
- Improved floodplain connectivity.
- Increased volume and frequency of floodplain inundation
- Improved riparian habitat (riparian forest and shaded riverine aquatic).
- Increased local aquifer recharge (greater infiltration), resulting in improved conditions for groundwater dependent species.

State Water Project (SWP) Benefits:

- Elimination of largest upstream source of water primrose that threatens Delta pumping. Leverages recently completed Oroville Wildlife Area primrose removal and ongoing Live Oak sediment and primrose removal projects.
- Increases resiliency to absorb unplanned releases from SWP facilities and reduces associated liability.
- Meets or exceeds ecological and recreational requirements of FERC license.
- Delivers on commitments made to local community following 2017 Oroville spillways incident, improving local SWP relationships and reducing the potential for Oroville FERC relicensing delays.

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: Inter-Basin Water Transfer

Contact Person: Christopher Heindell

Organization/Affiliation: Thermalito Water and Sewer District

Contact Phone: (530) 533-0740

Contact Email: cheindell@twsd.info

Project or Management Action Description and Status

Project or Management Action Name: Inter-Basin Water Transfer

Project or Management Action Type: Project

Project or Management Action Proponent(s): TWSD, Butte County, DWR, Ag Users

Project or Management Action Location: Wyandotte Creek Subbasin

Project or Management Action Status (Planned, Potential, or Conceptual): Potential

Brief Project or Management Action Description (1-2 short paragraphs): Offset groundwater pumping by Agricultural users with available surface water

Measurable Objectives Expected to Benefit: Lowering Groundwater Levels, Reduction of Storage, Degraded Quality, Land Subsidence

Implementation Timing/ Criteria for Implementation: 6-12 months

Estimated Cost: TBD

Potential Funding Sources: TBD

Required Permitting and Regulatory Process: DWR and Butte County

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year): 3,000-5,000 acre-ft per year

Status of permitting and CEQA/NEPA compliance: TBD

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? Yes, Thermalito

Additional Information Sources:

Other:

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: Recharge Well (Injection Well)

Contact Person: Christopher Heindell

Organization/Affiliation: Thermalito Water and Sewer District

Contact Phone: (530) 533-0740

Contact Email: cheindell@twsd.info

Project or Management Action Description and Status

Project or Management Action Name: Recharge Well (Injection Well)

Project or Management Action Type: Project

Project or Management Action Proponent(s): DWR, Butte County, WCGSA

Project or Management Action Location: TWSD Service Area

Project or Management Action Status (Planned, Potential, or Conceptual): Conceptual

Brief Project or Management Action Description (1-2 short paragraphs): Installation of an injection well at the TWSD treatment plant. Raw water and backwash water would be discharged into the recharge well

Measurable Objectives Expected to Benefit: Lowering Groundwater Levels, Reduction of Storage, Degraded Quality, Land Subsidence

Implementation Timing/ Criteria for Implementation: 12-24 months

Estimated Cost: TBD

Potential Funding Sources: DWR, WCGSA, Butte County

Required Permitting and Regulatory Process: TBD

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year): TBD

Status of permitting and CEQA/NEPA compliance: TBD

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? Yes, Thermalito

Additional Information Sources:

Other:

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: Well Upgrades

Contact Person: Christopher Heindell

Organization/Affiliation: Thermalito Water and Sewer District

Contact Phone: (530) 533-0740

Contact Email: cheindell@twsd.info

Project or Management Action Description and Status

Project or Management Action Name: Well Upgrades

Project or Management Action Type: Project

Project or Management Action Proponent(s): DWR, Butte County, WCGSA

Project or Management Action Location: TWSD Service Area

Project or Management Action Status (Planned, Potential, or Conceptual): Potential

Brief Project or Management Action Description (1-2 short paragraphs): Installation of variable frequency drives and telemetry on groundwater wells would provide additional control and efficiencies.

Measurable Objectives Expected to Benefit: Lowering Groundwater Levels, Reduction of Storage, Degraded Quality, Land Subsidence

Implementation Timing/ Criteria for Implementation: 6-12 months

Estimated Cost: TBD

Potential Funding Sources: DWR, WCGSA, Butte County

Required Permitting and Regulatory Process: TBD

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year): TBD

Status of permitting and CEQA/NEPA compliance: TBD

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? Yes, Thermalito

Additional Information Sources:

Other:

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: Palermo Clean Water Improvement Project

Contact Person: Christina Buck

Organization/Affiliation: Butte County Dept. Water and Resource Conservation

Contact Phone: 530-552-3593

Contact Email: cbuck@buttecounty.net

Project or Management Action Description and Status

Project or Management Action Name: Palermo Clean Water Improvement Project

Project or Management Action Type: Project

Project or Management Action Proponent(s): Butte County, South Feather Water and Power, Palermo Community Council

Project or Management Action Location: Palermo, CA

Project or Management Action Status (Planned, Potential, or Conceptual): Potential

Brief Project or Management Action Description (1-2 short paragraphs): Palermo is an unincorporated, semi-rural community located approximately five miles south of the City of Oroville. As of 2010, there are 774 parcels in the project area with an estimated 635 dwellings corresponding to a population of almost 2000 people. Most parcels in this area are smaller in size, and served by individual water wells for potable water supply, as well as on-site septic systems for wastewater treatment and disposal. Because of the predominant soil types in the area, most parcels are subject to periodic flooding due to inadequate surface drainage, high groundwater and slower percolation rates. These issues combined are problematic for the long-term adequate functioning of septic systems, and there are an inordinate number of failures occurring throughout the winter months. Due to the inability of the soils to adequately treat effluent effectively and completely, it is common to have surfacing effluent, plumbing back-ups into homes, and the potential for cross contamination of the existing wells and possibly the drinking water aquifer with pathogens. Additionally, there are concerns that these failures may be contributing to elevated nitrate levels in the area. The community is desperate for a long-term solution to this public health risk.

There was a study conducted in 2010 to specifically evaluate alternatives to address the wastewater treatment needs in the Palermo Community (Palermo Wastewater Study Preliminary Engineering Report). The high cost, estimated \$28.4M, of the preferred alternative has made the project difficult to implement. Over the past eight years, there has been ongoing dialogue as to potential solutions to address the increasing public health concerns over contaminated groundwater in Palermo. The most promising option involves providing a treated water supply to residents in the Palermo Community by expanding the service area and water delivery capabilities of the South Feather Water and Power Agency to these residences.

Measurable Objectives Expected to Benefit: Lowering Groundwater Levels

Implementation Timing/ Criteria for Implementation: Project Design and Evaluation of Funding Sources is currently underway through a Technical Assistance grant project. Implementation could begin as early as 2021

Estimated Cost: TBD

Potential Funding Sources: Grant Funding

Required Permitting and Regulatory Process: TBD

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year):
Reduced domestic groundwater pumping. Amount unknown.

Status of permitting and CEQA/NEPA compliance: Not started

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? Yes, Palermo

Additional Information Sources:

Other:

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: Hydrant Metering to Reduce Non-Beneficial Consumptive Use

Contact Person: Kristen McKillop

Organization/Affiliation: South Feather Water & Power

Contact Phone: 530-534-1221

Contact Email: kmckillop@southfeather.com

Project or Management Action Description and Status

Project or Management Action Name: Hydrant Metering to Reduce Non-Beneficial Consumptive Use

Project or Management Action Type: Project

Project or Management Action Proponent(s): Butte County, South Feather Water and Power

Project or Management Action Location: Multiple locations throughout the service area

Project or Management Action Status (Planned, Potential, or Conceptual): Planned

Brief Project or Management Action Description (1-2 short paragraphs): Fire hydrants located throughout the service area are primarily utilized for fire suppression activities. However, at times, the Agency loans hydrant meters that track volume for payment to members of the public. These approved uses of hydrant water are most frequently for construction purposes, and ancillary support to fire suppression efforts. However, these hydrants are being accessed routinely by those without meters, and for a multitude of unconfirmed uses. Because the hydrants themselves do not all have meters installed, we are unable to account for the volume lost from our system through this extraction method. The Agency is working diligently to accurately account for all water uses, and this is a critical missing piece.

Measurable Objectives Expected to Benefit: Surface Water Depletion

Implementation Timing/ Criteria for Implementation: To be completed by 2025

Estimated Cost: \$800,000

Potential Funding Sources: Federal/State Water Use Efficiency grants

Required Permitting and Regulatory Process: N/A

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year):
Unknown.

Status of permitting and CEQA/NEPA compliance: N/A

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? Yes, All DAC within the service area, including Oroville and Palermo.

Additional Information Sources/Other: This metering project not only serves to quantify non-beneficial consumptive use, but will allow the Agency to comply with numerous state regulatory requirements.

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: TWSD Water Treatment Plant Capacity Upgrade

Contact Person: Christopher Heindell

Organization/Affiliation: Thermalito Water and Sewer District

Contact Phone: (530) 533-0740

Contact Email: cheindell@twsd.info

Project or Management Action Description and Status

Project or Management Action Name: TWSD Water Treatment Plant Capacity Upgrade

Project or Management Action Type: Project

Project or Management Action Proponent(s): TWSD, Division of Drinking Water, DWR

Project or Management Action Location: 535 Table Mountain Blvd, Oroville, CA

Project or Management Action Status (Planned, Potential, or Conceptual): Planned

Brief Project or Management Action Description (1-2 short paragraphs): Upgrading the capacity of the District's treatment plant would directly offset groundwater usage in the subbasin.

Measurable Objectives Expected to Benefit: Lowering Groundwater Levels, Reduction of Storage, Degraded Quality, Land Subsidence

Implementation Timing/ Criteria for Implementation: 6-12 months

Estimated Cost: 1,500,000-3,000,000

Potential Funding Sources: TBD

Required Permitting and Regulatory Process: Division of Drinking Water, Department of Water Resources

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year): 500+ acre-ft per year

Status of permitting and CEQA/NEPA compliance: Exempt

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? Yes, Thermalito

Additional Information Sources:

Other:

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: Residential Water Conservation

Contact Person: Kelly Peterson

Organization/Affiliation: Wyandotte Creek GSA

Contact Phone: 530-522-3595

Contact Email: wyandotteGSA@gmail.com

Project or Management Action Description and Status

Project or Management Action Name: Residential Water Conservation

Project or Management Action Type: Project

Project or Management Action Proponent(s): Wyandotte Creek GSA and municipal water providers including but not limited to California Water Service Oroville and Thermalito Water and Sewer District

Project or Management Action Location: Wyandotte Creek subbasin, including municipal water provider's service areas

Project or Management Action Status (Planned, Potential, or Conceptual): Planned

Brief Project or Management Action Description (1-2 short paragraphs):

Municipal water service providers provide water to the City of Oroville and other residents throughout the subbasin. Groundwater is one source of the water. The annual demand in the subbasin has fluctuated over the years. The anticipated demand is expected to increase based on planned developments through the City of Oroville General Plan and the Butte County General Plan. In their 2020 Urban Water Management Plans municipal service providers have identified residential water conservation projects including things such as installing low flow fixtures, toilet replacement, urinal valve and bowl replacement, clothes washer replacement, residential conservation kits, smart controllers, high efficiency irrigation nozzles and turf buy-back. Other projects include water waste prevention ordinances, metering, conservation pricing, public education and outreach, programs to assess and manage distribution system real loss, water conservation program coordination and staffing support, and other demand management measures.

Measurable Objectives Expected to Benefit: Chronic Lowering of Groundwater Levels, Groundwater Storage

Implementation Timing/ Criteria for Implementation: 2022-2025

Estimated Cost: TBD

Potential Funding Sources: Grants, local entities

Required Permitting and Regulatory Process: N/A

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year): 100 - 200 acre feet/year

Status of permitting and CEQA/NEPA compliance: N/A

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? Yes, Oroville and Thermalito

Additional Information Sources:

2020 Urban Water Management Plan (Chapter 9) Oroville District

Other:

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: Agricultural Irrigation Efficiency

Contact Person: Kelly Peterson

Organization/Affiliation: Wyandotte Creek GSA

Contact Phone: 530.552.3595

Contact Email: WyandotteGSA@gmail.com

Project or Management Action Description and Status

Project or Management Action Name: Agricultural Irrigation Efficiency

Project or Management Action Type: Project

Project or Management Action Proponent(s): Wyandotte Creek GSA

Project or Management Action Location: Wyandotte Creek subbasin

Project or Management Action Status (Planned, Potential, or Conceptual): Planned

Brief Project or Management Action Description (1-2 short paragraphs):

A survey of agricultural groundwater users is being conducted by the Agricultural Groundwater Users of Butte County, Butte County Farm Bureau and the Vina GSA to characterize current irrigation methods and practices and to identify opportunities to improve irrigation efficiency. The survey will determine the extent of adoption of irrigation efficient practices and the barriers to increased adoption. The project will identify recommendations to increase the adoption of efficient irrigation practices and methods that could lead to a reduction in groundwater demand which could be applied to users in the Wyandotte Creek subbasin. The survey and results are expected to be completed by July 2021. Agricultural groundwater demand in the Wyandotte Creek subbasin is approximately 36,000 acre-feet per year. Overall agricultural groundwater demand has declined over the past twenty years due to less agricultural acreage and increased irrigation efficiency with new plantings. A 3% reduction in groundwater demand from irrigation efficiency would reduce the groundwater demand by 1080 acre-feet per year.

Measurable Objectives Expected to Benefit: Chronic Lowering of Groundwater Levels

Implementation Timing/ Criteria for Implementation: 2022-2025

Estimated Cost: TBD

Potential Funding Sources: Prop 1, Prop 68, USDA, Drought Resiliency Grants

Required Permitting and Regulatory Process: N/A

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year): 4,000
acre feet (based on a 2% reduction)

Status of permitting and CEQA/NEPA compliance: N/A

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? Potentially

Additional Information Sources:

Other:

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: Flood MAR

Contact Person: Kelly Peterson

Organization/Affiliation: Wyandotte Creek GSA

Contact Phone: 530.552.3595

Contact Email: Wyandottegsa@gmail.com

Project or Management Action Description and Status

Project or Management Action Name: Flood MAR

Project or Management Action Type: Project

Project or Management Action Proponent(s): Wyandotte Creek GSA

Project or Management Action Location: Basin-wide

Project or Management Action Status (Planned, Potential, or Conceptual): Planned

Brief Project or Management Action Description (1-2 short paragraphs):

Studies have indicated that a number of opportunities exist for recharge projects. In 2018, Butte County prepared a study of recharge opportunities entitled, "Evaluation of Restoration and Recharge within Butte County Basins." The report found opportunities in the Wyandotte Creek subbasin for recharge programs using fields, recharge basins and/or recharge ponds. The report provides the foundation to conduct feasibility studies on specific locations. Groundwater sustainability in the Wyandotte Creek subbasin could benefit from recharge projects utilizing seasonal high flows in various creeks and streams. The Department of Water Resources has developed a Flood MAR initiative to advance recharge programs. The project would be an initial scoping of potential recharge opportunities to be conducted by the Wyandotte Creek GSA and implementation of the feasible projects identified as priority. The project will build upon previous analyses of potential recharge opportunities in the Wyandotte Creek subbasin to identify specific recharge opportunities. The project will focus on areas of greatest need to achieve measurable objectives, availability of a water supply, local acceptance and regulatory requirements. The Wyandotte Creek GSA will seek grant and other funds to implement the recharge projects. By having the Wyandotte Creek GSA conduct the recharge projects would avoid unintended consequences.

Potential recharge projects involve utilizing existing creek and rivers such as Wyandotte Creek, Wyman Ravine, Wilson Creek, North Honcut Creek, the Feather River and Ruddy creek and the recycling of irrigation tail water as a potential recharge sources. Projects could be located on

privately and publically owned properties including existing mine tailings which already pond water.

In addition to benefits to the groundwater conditions, catchment and recharge would benefit water use for wildlife habitat, riparian habitat restoration, and for irrigation purposes that would offset pumping in this region.

In addition, the Wyandotte Creek GSA will identify and develop other Flood MAR projects in the subbasin.

Measurable Objectives Expected to Benefit: Chronic Lowering of Groundwater Levels

Implementation Timing/ Criteria for Implementation: 2022-2032

Estimated Cost: TBD

Potential Funding Sources: Proposition 1, Proposition 68

Required Permitting and Regulatory Process: SWRCB Water Right Permit, CEQA

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year): TBD

Status of permitting and CEQA/NEPA compliance: Not initiated

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? No

Additional Information Sources:

“Evaluation of Restoration and Recharge within Butte County Basins” (Butte County, 2018)

Other:

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: Agricultural Surface Water Supplies

Contact Person: Kelly Peterson

Organization/Affiliation: Wyandotte Creek GSA

Contact Phone: 530.552.3595

Contact Email: Wyandottegsa@gmail.com

Project or Management Action Description and Status

Project or Management Action Name: Agricultural Surface Water Supplies

Project or Management Action Type: Project

Project or Management Action Proponent(s): Wyandotte Creek GSA, Agricultural Groundwater Users of Butte County, Farm Bureau

Project or Management Action Location: Wyandotte Creek subbasin

Project or Management Action Status (Planned, Potential, or Conceptual): Potential

Brief Project or Management Action Description (1-2 short paragraphs):

In 2018, Butte County prepared a study of recharge opportunities entitled, "Evaluation of Restoration and Recharge within Butte County Basins." The report found opportunities in the Vina subbasin for recharge programs using fields, recharge basins and/or recharge ponds. The report identified sources of surface water supplies in Butte County that could be put to use in the Wyandotte Creek subbasin. Water right holders in the Wyandotte Creek subbasin and the upper watershed hold the available surface water. It is undetermined how many acre feet may be available but this can be investigated. The source of the surface water will mostly come through Lake Oroville. The surface water is in close proximity to the Wyandotte Creek subbasin. Surface water made available to orchards would replace groundwater as a water supply. To incorporate surface water as a source, growers may need to acquire a dual irrigation system. The dual irrigation system would allow growers to use surface water when available and use groundwater when surface water is not available. The major impediment to implementing the project is the lack of conveyance and an organization to manage surface water acquisition and management.

Measurable Objectives Expected to Benefit: Chronic Lowering of Groundwater Levels

Implementation Timing/ Criteria for Implementation: 2025-2032

Estimated Cost: TBD

Potential Funding Sources: Proposition 1, Proposition 68

Required Permitting and Regulatory Process: SWRCB Water Right Permit, CEQA, others TBD

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year): 2,000-3,000 acre-feet

Status of permitting and CEQA/NEPA compliance: Not initiated

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? No

Additional Information Sources:

“Evaluation of Restoration and Recharge within Butte County Basins” (Butte County, 2018)

Other:

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: Fuel Management for Watershed Health

Contact Person: Kelly Peterson

Organization/Affiliation: Wyandotte Creek GSA

Contact Phone: 530-552-3595

Contact Email: WyandotteGSA@gmail.com

Project or Management Action Description and Status

Project or Management Action Name: Upper Watershed Recharge

Project or Management Action Type: Project

Project or Management Action Proponent(s): Wyandotte Creek GSA, Butte County Fire Safe Council, Butte County Resource Conservation District, NRCS

Project or Management Action Location: Multiple sites in the Wyandotte Creek Watershed and the upper watershed of the subbasin

Project or Management Action Status (Planned, Potential, or Conceptual): Potential

Brief Project or Management Action Description (1-2 short paragraphs):

Fuel management projects within the Wyandotte Creek subbasin and the upper watershed of the subbasin on public and private land.

Measurable Objectives Expected to Benefit: Lowering Groundwater Levels, Reduction of Storage, Degraded Quality, Surface Water Depletion

Implementation Timing/ Criteria for Implementation: 2022-2042

Estimated Cost: TBD

Potential Funding Sources: CAL FIRE, Sierra Nevada Conservancy, California Fire Safe Council, and other state and federal funding agencies

Required Permitting and Regulatory Process: CEQA

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year): TBD

Status of permitting and CEQA/NEPA compliance: TBD

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? Yes, all DACs in the subbasin and in the upper watershed of the subbasin

Additional Information Sources:

Other:

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: Extend Orchard Replacement

Contact Person: Kelly Peterson

Organization/Affiliation: Wyandotte Creek GSA

Contact Phone: 530- 552-3595

Contact Email: WyandotteGSA@gmail.com

Project or Management Action Description and Status

Project or Management Action Name: Extend Orchard Replacement

Project or Management Action Type: Project

Project or Management Action Proponent(s): Butte County

Project or Management Action Location: Wyandotte Creek subbasin

Project or Management Action Status (Planned, Potential, or Conceptual): Conceptual

Brief Project or Management Action Description (1-2 short paragraphs):

Orchards are a predominant agricultural land use in the Wyandotte Creek subbasin. As a permanent crop, orchards cannot be fallowed. However, a voluntary program to delay in replanting of orchards could be a fallowing type program. Approximately 2-4% of almond and walnut orchards are redeveloped during a given year. The timing of the removal of the existing orchard to replanting usually occurs within one season to reduce the revenue impact to the farm. If farmers were financially incentivized to voluntarily extend this timeline by an extra growing season, it could effectively fallow numerous acres per year. The extended redevelopment timeline would have the additional benefit of reducing the need for certain soil treatments including fumigation and expand recycling options for the previous orchard.

Measurable Objectives Expected to Benefit: Chronic lowering of groundwater levels.

Implementation Timing/ Criteria for Implementation:

Timing would be dependent upon the availability of financial incentives and the willingness of growers to participate.

Estimated Cost: TBD

Potential Funding Sources: Prop 1, Prop 68, USDA, NRCS

Required Permitting and Regulatory Process: N/A

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year): TBD

Status of permitting and CEQA/NEPA compliance: None

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)?

Additional Information Sources:

Other:

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: Removal of Invasive Species

Contact Person: Kelly Peterson

Organization/Affiliation: Wyandotte Creek GSA

Contact Phone: 530-552-3595

Contact Email: kpeterson@buttecounty.net

Project or Management Action Description and Status

Project or Management Action Name: Removal of Invasive Species

Project or Management Action Type: Project

Project or Management Action Proponent(s): Wyandotte Creek GSA, other local, state and federal organizations and agencies

Project or Management Action Location: Throughout Wyandotte Creek subbasin and the upper watershed of the subbasin

Project or Management Action Status (Planned, Potential, or Conceptual): Potential

Brief Project or Management Action Description (1-2 short paragraphs):

Invasive species not only disrupts the natural ecosystem, they consume water and hamper recharge. Removal of invasive species would have multi-benefits on water resources and the ecosystem. The project would entail mapping of invasive species and/native grasses within the subbasin, development of management plans specific to ground water management goals and invasive species management, identification of / securing funding and implementing projects to meet objectives.

Measurable Objectives Expected to Benefit: Chronic Lowering of Groundwater Levels

Implementation Timing/ Criteria for Implementation: 2022-2025

Estimated Cost: TBD

Potential Funding Sources: State and federal wildfire resiliency grants, other local, state and federal organizations and agency programs

Required Permitting and Regulatory Process: CEQA and/or NEPA depending on project location and impact

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year): TBD

Status of permitting and CEQA/NEPA compliance: Not initiated

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? Yes, all DACs with the subbasin

Additional Information Sources:

Other:

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: Streamflow Augmentation

Contact Person: Kelly Peterson

Organization/Affiliation: Wyandotte Creek GSA

Contact Phone: 530.552.3595

Contact Email: WyandotteGSA@gmail.com

Project or Management Action Description and Status

Project or Management Action Name: Streamflow Augmentation

Project or Management Action Type: Project

Project or Management Action Proponent(s): Wyandotte Creek GSA, PG&E, other surface water right holders in the subbasin

Project or Management Action Location: All surface waters in the subbasin

Project or Management Action Status (Planned, Potential, or Conceptual): Planned

Brief Project or Management Action Description (1-2 short paragraphs):

Excess untreated surface water available from water right holders in the watershed would be channeled via certain creeks or streams to portions of the Wyandotte Creek subbasin to increase stream flows and potential recharge (e.g., recharge ponds, in-lieu). The Wyandotte Creek GSA would acquire available surface water supplies and manage the project. Available surface water conveyed in creeks and streams could be made available for riparian water holders. The project could leave significant water in these waterways for natural aquifer recharge and enhanced salmon passage. A portion of the available surface water could be diverted to recharge ponds/basins. The initial step would involve the Wyandotte Creek GSA conducting an investigation and feasibility study. Surface water may not be available every year.

Measurable Objectives Expected to Benefit: Depletion of Interconnected Streams, Chronic Lowering of Groundwater Levels

Implementation Timing/ Criteria for Implementation: 2022-2025

Estimated Cost: \$50,000-\$100,000 per 1,000 acre feet (\$50-100/acre foot)

Potential Funding Sources:

<https://wcb.ca.gov/Programs/Stream-Flow-Enhancement>, Resource Renewal Institute

Proposition 1, Proposition 68, Wyandotte Creek GSA fees

Required Permitting and Regulatory Process: CEQA, SWRCB Water Right

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year): 1,000 to 5,000 acre-feet

Status of permitting and CEQA/NEPA compliance: Not initiated

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? No

Additional Information Sources:

Other:

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: Improving the Butte Basin Groundwater Model

Contact Person: Kelly Peterson

Organization/Affiliation: Butte County

Contact Phone: 530- 552-3595

Contact Email: BCwater@buttecounty.net

Project or Management Action Description and Status

Project or Management Action Name: Improving the Butte Basin Groundwater Model

Project or Management Action Type: Project (data)

Project or Management Action Proponent(s): Dr. Todd Greene and Dr. Steffen Mehl, CSU Chico, Center for Water and the Environment, Wyandotte Creek GSA, Wyandotte Creek GSA

Project or Management Action Location: Vina, Butte and Wyandotte Creek subbasins

Project or Management Action Status (Planned, Potential, or Conceptual): Potential

Brief Project or Management Action Description (1-2 short paragraphs): Groundwater models are invaluable tools to address measurable objectives in groundwater basins. By “asking” the model a particular question, simulations can be run to test how the aquifer would respond to various water or land management scenarios as well as different predictions for climate/precipitation fluctuations. However, the value of these models is dependent on the quality of data on which the model was built. Therefore, we propose a project that has two main components: 1) improve and update the existing groundwater model, and 2) recalibrate and run various model simulations to help better define measurable objectives. The Wyandotte Creek, Vina and Butte sub-basins lie within the Butte Basin Groundwater Model (BBGM) domain and we propose to use additional existing data and studies, including the recently acquired airborne electromagnetic (AEM) data, to improve and update the existing model structure. This will include adjusting various surfaces within the model to better match the hydrogeologic layers evident in the AEM data, as well as updating the variation in hydraulic conductivity of each layer in the model to better represent the aquifer, with particular focus on the shallow aquifer.

Once the model structure is updated, it can be recalibrated to investigate how the structural improvements affect model fit to observations of hydraulic heads and stream/aquifer interactions and how predictions of groundwater flow change. Comparisons to the original model can be used to assess data worth and guide future data collection efforts and can

augment previous and ongoing efforts to better understand stream/aquifer interaction via monitoring shallow groundwater levels near streams and more frequent streamflow measurements. By incorporating the new data into the BBGM, both lateral and vertical connectivity between aquifer layers as well as connections to surface water features can be simulated more realistically to help avoid undesirable results. In addition, the updated structure, vertical connectivity, and hydraulic conductivities in the shallow aquifer could be used in modeling scenarios to better target areas of potential recharge zones to augment groundwater supplies through management actions such as managed aquifer recharge.

Measurable Objectives Expected to Benefit: Lowering Groundwater Levels

Implementation Timing/ Criteria for Implementation:

Estimated Cost: TBD

Potential Funding Sources: TBD

Required Permitting and Regulatory Process: N/A.

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year): The data and analysis will contribute to the sustainable long term yield of the 4 county basin

Status of permitting and CEQA/NEPA compliance: N/A

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? Yes. This project will be conducted in all three subbasins in Butte County including all disadvantaged communities including but not limited to Oroville, Palermo, Thermalito and Chico, designated as a disadvantaged community in 2018. The information generated by this project will directly benefit all Butte County residents, from municipal customers to agricultural and domestic well users.

Additional Information Sources:

This PMA is submitted by faculty at Chico State, who are part of the Center for Water and the Environment (CWE). They are interested in working collaboratively when beneficial connections exist between their PMAs.

Other:

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: 3 County Contour Mapping

Contact Person: Kelly Peterson

Organization/Affiliation: Wyandotte Creek GSA

Contact Phone: 530- 552-3595

Contact Email: WyandotteGSA@gmail.com

Project or Management Action Description and Status

Project or Management Action Name: 3 County Contour Mapping

Project or Management Action Type: Project (data)

Project or Management Action Proponent(s): Wyandotte Creek GSA

Project or Management Action Location: Butte, Yuba and Sutter Counties

Project or Management Action Status (Planned, Potential, or Conceptual): Planned

Brief Project or Management Action Description (1-2 short paragraphs): Existing data has allowed DWR to compose maps showing groundwater contours intermediate depths (100 to 450 foot well depths) and groundwater flow direction. Existing and expanded monitoring of groundwater elevation in the 3-county region during spring, summer and fall will produce data to identify groundwater contours and to estimate vertical and lateral flow direction and volume. The goal is to identify interbasin flow patterns that will influence the ability of GSAs to achieve their aquifer management goals. These flow patterns may influence surface water flows, replenishment locations and will enhance interbasin coordination.

Measurable Objectives Expected to Benefit: Lowering Groundwater Levels

Implementation Timing/ Criteria for Implementation:

Estimated Cost: TBD

Potential Funding Sources: TBD

Required Permitting and Regulatory Process: N/A.

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year): The data and analysis will contribute to the sustainable long term yield of the 3 county basin

Status of permitting and CEQA/NEPA compliance: N/A

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? TBD

Additional Information Sources:

<https://data.cnra.ca.gov/dataset/9d8cccaa-2602-4aae-9332-4a90b8600166/resource/838109d9-fbc3-4d4d-b23d-f38d2bb5a852/download/2020-nsv-gw-elevation-change-and-contour-maps.zip>

Other:

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: Large Diameter Well Moratorium

Contact Person: Kelly Peterson

Organization/Affiliation: Wyandotte Creek GSA

Contact Phone: 530- 552-3595

Contact Email: WyandotteGSA@gmail.com

Project or Management Action Description and Status

Project or Management Action Name: Large Diameter Well Moratorium

Project or Management Action Type: Action

Project or Management Action Proponent(s): Butte County

Project or Management Action Location: Basin-wide

Project or Management Action Status (Planned, Potential, or Conceptual): Potential

Brief Project or Management Action Description (1-2 short paragraphs):

Butte County, at the request of the Wyandotte Creek GSA would enact a moratorium on issuing permits for the development of new Large Diameter Production Wells (LDPW) to enhance stabilization and restoration of GW levels. Furthermore, the GSA would, through voluntary interbasin coordination, encourage adjacent sub-basins to enact a LDPW moratorium while data gaps are identified and rectified.

Measurable Objectives Expected to Benefit: The expected growth of demand associated with expanding groundwater dependent irrigation and urban growth.

Implementation Timing/ Criteria for Implementation:

Landscape Ordinance creation and implementation associated with new building permits would require a period of planning, public discussion and evolving code enforcement

Estimated Cost: TBD

Potential Funding Sources: N/A

Required Permitting and Regulatory Process: Amend land use ordinances

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year): TBD

Status of permitting and CEQA/NEPA compliance: None

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? Yes

Additional Information Sources:

Butte County BMO alert locations 2019:

http://www.buttecounty.net/wrcdocs/Programs/Monitoring/GWLevels/2019/2019_Spring_GWL_Alerts.pdf

NORTHERN SACRAMENTO VALLEY CHANGE IN GROUNDWATER ELEVATION MAP FALL 2004 TO FALL 2020 Deep Wells:

<https://data.cnra.ca.gov/dataset/northern-sacramento-valley-groundwater-elevation-change-maps/resource/838109d9-fbc3-4d4d-b23d-f38d2bb5a852>

Other:

The Wyandotte Creek GSA can take a lead in enacting a precautionary large diameter production well moratorium and, through the ICG, encourage nearby sub-basins to accept the fact that the shared foundational deep aquifer system has been "exercised" beyond the sustainable carrying capacity of the system.

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: Landscape Ordinance

Contact Person: Kelly Peterson

Organization/Affiliation: Wyandotte Creek GSA

Contact Phone: 530- 552-3595

Contact Email: WyandotteGSA@gmail.com

Project or Management Action Description and Status

Project or Management Action Name: Landscape Ordinance

Project or Management Action Type: Action

Project or Management Action Proponent(s): Butte County City of Oroville

Project or Management Action Location: Basin-wide

Project or Management Action Status (Planned, Potential, or Conceptual): Potential

Brief Project or Management Action Description (1-2 short paragraphs):

1. The City of Oroville and Butte County should enact an ordinance that would require new development (residential, commercial and industrial) to focus landscape plantings on species that are highly drought resistant and to limit the size of grass turf lawns that require great amounts of irrigation.
2. Focus domestic conservation efforts and money on reduction of landscape irrigation and swimming pool.
3. Promote xeriscaping

The City of Oroville and Butte County have the sole jurisdiction to enact these actions. The Wyandotte Creek GSA will make a request to the City of Oroville and Butte County to enact these actions.

Measurable Objectives Expected to Benefit: Lowering Groundwater Levels, Reduction of Storage, Degraded Quality, Land Subsidence, Surface Water Depletion, Education and outreach

Implementation Timing/ Criteria for Implementation:

Landscape Ordinance creation and implementation associated with new building permits would require a period of planning, public discussion and evolving code enforcement

Estimated Cost: TBD

Potential Funding Sources: N/A

Required Permitting and Regulatory Process: Amend land use ordinances

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year): TBD

Status of permitting and CEQA/NEPA compliance:

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? TBD

Additional Information Sources:

Other:

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: Groundwater Allocation

Contact Person: Kelly Peterson

Organization/Affiliation: Wyandotte Creek GSA

Contact Phone: 530- 552-3595

Contact Email: WyandotteGSA@gmail.com

Project or Management Action Description and Status

Project or Management Action Name: Groundwater Allocation

Project or Management Action Type: Action

Project or Management Action Proponent(s): Wyandotte Creek GSA

Project or Management Action Location: Basin-wide

Project or Management Action Status (Planned, Potential, or Conceptual): Potential

Brief Project or Management Action Description (1-2 short paragraphs): In the event that other projects and management actions fail to achieve the 2032 interim target and the Wyandotte Creek GSA Board determines that actions are unlikely to achieve sustainable criteria by 2042, an action will be initiated to regulate demand reduction. The action would occur not before 2032 and contingent upon failing to meet the 2032 interim target and the likelihood of not meeting the sustainable criteria by 2042. The action would be initiated, if appropriate in 2032 with the development of a program to allocate groundwater demand, except for de minimus users, to achieve measurable objectives. The program would be implemented by 2037.

Measurable Objectives Expected to Benefit: Lowering Groundwater Levels, Reduction of Storage, Degraded Quality, Land Subsidence, Surface Water Depletion, Education and outreach

Implementation Timing/ Criteria for Implementation: The action would be not be implemented prior to 2032. The action would be contingent upon failing to meet the 2032 interim target and the likelihood of failing to achieve the measurable objective by 2042. However, if interim targets are being met and the measurable objectives are likely to be met, the action would not occur.

Estimated Cost: TBD

Potential Funding Sources: Fees

Required Permitting and Regulatory Process:

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year): TBD

Status of permitting and CEQA/NEPA compliance:

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? TBD

Additional Information Sources:

Other:

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: Well Permitting Ordinance

Contact Person: Kelly Peterson

Organization/Affiliation: Wyandotte Creek GSA

Contact Phone: 530- 552-3595

Contact Email: wyandotteGSA@gmail.com

Project or Management Action Description and Status

Project or Management Action Name: Well Permitting Ordinance

Project or Management Action Type: Action

Project or Management Action Proponent(s): Wyandotte Creek GSA

Project or Management Action Location: Basin-wide

Project or Management Action Status (Planned, Potential, or Conceptual): Potential

Brief Project or Management Action Description (1-2 short paragraphs): The Minimum Thresholds established for the Wyandotte Creek subbasin is based on a small number of domestic wells being dewatered. The Measurable Objective is set sufficiently above the Minimum Thresholds to provide a measure of protection. Current Butte County Code requires that wells be screened below the groundwater levels during the 1989-1994 drought. To be protective of domestic wells, the well ordinance should be amended to require that well drillers screen domestic wells below the Minimum Threshold depth for the respective Representative Monitoring Network area. Butte County has sole jurisdiction over well permitting. For this action, the Wyandotte Creek GSA would submit a request to Butte County recommending the amendment to the well ordinance.

Measurable Objectives Expected to Benefit: Lowering Groundwater Levels

Implementation Timing/ Criteria for Implementation: The action would require action to be taken by Butte County.

Estimated Cost: TBD

Potential Funding Sources: TBD

Required Permitting and Regulatory Process: County Ordinance Amendment

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year): 0

Status of permitting and CEQA/NEPA compliance: N/A

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? TBD

Additional Information Sources:

Other:

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: Expansion of Water Purveyors' Service Area

Contact Person: Kelly Peterson

Organization/Affiliation: Wyandotte Creek GSA

Contact Phone: 530- 552-3595

Contact Email: wyandottegsa@gmail.com

Project or Management Action Description and Status

Project or Management Action Name: Water Purveyor Service Area Expansion

Project or Management Action Type: Action

Project or Management Action Proponent(s): Wyandotte Creek GSA

Project or Management Action Location: Basin-wide

Project or Management Action Status (Planned, Potential, or Conceptual): Conceptual

Brief Project or Management Action Description (1-2 short paragraphs): The reliability of domestic drinking water could be improved by expanding the service area of water purveyors to areas reliant upon private groundwater wells. The Wyandotte Creek GSA would promote the expansion of water purveyors into residential areas currently reliant upon groundwater.

Measurable Objectives Expected to Benefit: Lowering Groundwater Levels

Implementation Timing/ Criteria for Implementation: The action would require action to be taken by individual water purveyors, support of residents and approval by LAFCO and the CPUC.

Estimated Cost: TBD

Potential Funding Sources: TBD

Required Permitting and Regulatory Process: CEQA, Butte County Local Agency Formation Commission, the California Public Utilities Commission.

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year): TBD

Status of permitting and CEQA/NEPA compliance: N/A

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? TBD

Additional Information Sources:

Other:

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: Butte County and City of Oroville General Plan Updates

Contact Person: Kelly Peterson

Organization/Affiliation: Wyandotte Creek GSA

Contact Phone: 530- 552-3595

Contact Email: wyandotteGSA@gmail.com

Project or Management Action Description and Status

Project or Management Action Name: General Plan Updates

Project or Management Action Type: Action

Project or Management Action Proponent(s): Wyandotte Creek GSA

Project or Management Action Location: Basin-wide

Project or Management Action Status (Planned, Potential, or Conceptual): Conceptual

Brief Project or Management Action Description (1-2 short paragraphs): Butte County and the City of Oroville are in the process of updating their General Plans. The Action would involve the Wyandotte Creek GSA to evaluate and propose amendments to the respective General Plans to ensure they recognize and support the Wyandotte Creek Groundwater Sustainability Plan.

Measurable Objectives Expected to Benefit: Lowering Groundwater Levels

Implementation Timing/ Criteria for Implementation: The action would require action to be taken by Butte County and the City of Oroville.

Estimated Cost: TBD

Potential Funding Sources: TBD

Required Permitting and Regulatory Process: N/A.

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year): TBD

Status of permitting and CEQA/NEPA compliance: N/A

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? TBD

Additional Information Sources:

Other:

Wyandotte Creek Subbasin GSP Project and Management Actions

Project or Management Action Name and Contact

Project or Management Action Name: Domestic Well Mitigation

Contact Person: Kelly Peterson

Organization/Affiliation: Wyandotte Creek GSA

Contact Phone: 530-552-3595

Contact Email: WyandotteGSA@gmail.com

Project or Management Action Description and Status

Project or Management Action Name: Domestic Well Mitigation

Project or Management Action Type: Action

Project or Management Action Proponent(s): Wyandotte Creek GSA

Project or Management Action Location: Wyandotte Creek subbasin

Project or Management Action Status (Planned, Potential, or Conceptual): Potential

Brief Project or Management Action Description (1-2 short paragraphs):

There are some domestic wells that may not have been constructed to current standards and/or are screened at or above the Minimum Threshold for their area. It is the intent of the Wyandotte Creek GSA to protect domestic water supplies. The project will:

1. Establish a voluntary registry of domestic wells;
 2. Compilation of domestic well logs, screen depths and location;
 3. Securing financial resources to improve and in some instances deepen domestic wells.
 4. Emergency response to mitigate dry domestic wells that may include supplying bottled drinking water (Human Right to water), supplying potable water for sanitation purposes
- Priority will be given to assessing the security of water supply for any of disadvantaged communities which are dependent on ground water;

Measurable Objectives Expected to Benefit: Lowering Groundwater Levels

Implementation Timing/ Criteria for Implementation: 2022-2025

Estimated Cost: TBD

Potential Funding Sources: State and federal grants, Community Block Development Grant, fees

Required Permitting and Regulatory Process: N/A

Expected Yield (e.g. water contributed to the groundwater system, acre-feet per year): 0

Status of permitting and CEQA/NEPA compliance: N/A

Does this Management Action or Project serve a disadvantaged community? If so, which one(s)? Yes

Additional Information Sources:

Other: