

F. Staff Reports

SOUTH FEATHER WATER & POWER AGENCY

AGENDA

Regular Meeting of the Board of Directors of the South Feather Water & Power Agency Board Room, 2310 Oro-Quincy Highway, Oroville, California Tuesday; May 23, 2023; 2:00 P.M.

Remote participation is available via Zoom by logging into:

https://us02web.zoom.us/j/82867967544

Meeting ID: 828 6796 7544 One tap mobile +16694449171,,82867967544# US

+16699006833,,82867967544# US (San Jose)

For attendees calling by phone use *9 to raise hand

A.	Roll Call	
В.	Approval of Minutes	(Tab 1)
C.	Approval of Checks/Warrants	(Tab 2)
D.	Information Items	
	LAFCO's Upcoming June 1, 2023 Public Hearing Concerning SFWPA Draft Municipal Service Review.	(Tab 3
	CA Water Plan Update 2023 Draft Reservoir Reoperation Resource Management Strategy (RMS) Workshop.	(Tab 4)
E.	Business Items	
	FERC Security and Vulnerability Requesting approval to contract with Gannet Fleming for FERC required Security and Vulnerability Assessments and Security Plan Updates.	(Tab 5)
	HGEU and WTDEU Memorandum of Understandings Approval of updated MOU's.	(Tab 6)
	2023 Annual Water Supply & Demand Assessment Review and approval of the 2023 Water Supply and Demand Assessment report.	(Tab 7)
	Right of Entry Agreement APN# 069-400-078; Solana Drive Requesting approval of "Right of Entry Agreement" with PG&E.	(Tab 8)
_		

G. Public Comment – Public comment for Directors can be submitted anytime via e-mail. However, in order to be read into the record during the meeting it must be submitted to PublicRelations@southfeather.com by 12:00 P.M. Tuesday May 23, 2023. Individuals will be given an opportunity to address the Board regarding matters within the Agency's jurisdiction that are not scheduled on the agenda, although the Board cannot take action on any matter not on the agenda. Comments will be limited to 5 minutes per speaker. An opportunity for comments on agenda items will be provided at the time they are discussed by the Board. Comments will be limited to five minutes per speaker per agenda item.

(Tab 9)

H. Directors' Reports

Directors may make brief announcements or reports for the purpose of providing information to the public or staff, or to schedule a matter for a future meeting. The Board cannot take action on any matter not on the agenda and will refrain from entering into discussion that would constitute action, direction or policy, until the matter is placed on the agenda of a properly publicized and convened Board meeting.

I. Closed Session (Tab 10)

Conference with Legal Counsel – Existing Litigation (Paragraph (1) of subdivision (d) of Government Code section 54956.9

- A. Name of Case: North Yuba Water District v. South Feather Water & Power Agency et al., Sutter County Superior Court Case No. CVCS21-0001857
- B. Name of Case: South Feather Water & Power Agency v. North Yuba Water District et al., Sutter County Superior Court Case No. CVCS21-0002073

J. Open Session

K. Adjournment

The Board of Directors is committed to making its meetings accessible to all citizens. Any persons requiring special accommodation to participate should contact the Agency's secretary at 530-533-2412, preferably at least 48 hours in advance of the meeting.

MINUTES of the REGULAR MEETING of the BOARD of DIRECTORS of SOUTH FEATHER WATER & POWER AGENCY

Tuesday, April 25, 2023, 2:00 P.M., Agency Board Room, 2310 Oro-Quincy Hwy., Oroville, California

DIRECTORS PRESENT (In Person): Rick Wulbern, Ruth Duncan, John Starr, Mark Grover, Brad Hemstalk

DIRECTORS PRESENT (Remote): None

DIRECTORS ABSENT: None

STAFF PRESENT (In Person): Rath Moseley, General Manager; Art Martinez, Manager Information Systems; Dan Leon, Power Division Manager; Cheri Richter, Finance Manager; Dustin Cooper, General Counsel; John Shipman, Water Treatment Superintendent; Jaymie Perrin Operations Support Manager; Kristen McKillop, Regulatory Compliance Manager

STAFF PRESENT (By Zoom): Kyle Newkirk, Civil Engineer

OTHERS PRESENT (Via Zoom): Donna Corson

OTHERS PRESENT (In Person): Roger Bailey, Ron Fink, Marieke Furnee, Kamie Loeser, Charles Sharp

CALL TO ORDER

President Wulbern called the meeting to order at 2:00 p.m. and led the Pledge of Allegiance.

APPROVAL OF MINUTES

M/S: (Grover/Hemstalk) approving the Minutes of the Regular Meeting of March 28, 2023.

Ayes: Starr, Wulbern, Duncan Public Comment: None

APPROVAL OF CHECKS AND WARRANTS

M/S (Wulbern/Starr)

Ayes: Duncan, Grover, Hemstalk

Approving the total General Fund and Joint Facilities operating fund expenditures for the month of March 2023 in the amount of \$2,637,569.86 and authorize the transfer of \$2,000,000.00 from the TCB General Fund to the TCB Accounts Payable and Payroll Fund for the payment of regular operating expenses.

Roger Bailey inquired about Certificates of Participation and Net Present Value.

Director Grover asked for clarification of checks, 64122, FERC; 64138, Slate Geotechnical; 230308, U.S. Bank; and 64203, DWR.

Director Duncan requested details on a credit card purchase for "Roku" Streaming. It was explained that Dish Network was cancelled and replaced with a one-time purchase of Roku to monitor weather and news stations. The Return on Investment was less than one month.

INFORMATION ITEMS

Wyandotte Creek GSA

Kamie Loeser, Butte County Director of Water and Resource Conservation presented an Overview of the long-term funding mechanism as it relates to the Wyandotte Creek Subbasin. Included in the presentation were a map of the subbasin, SF boundaries, sustainability timeline, need for funding, types of funding, and five-year projection of costs.

SFWPA Division 1 Boundary

The General Manager provided a review of historical place of use acreage and Division 1 maps throughout the years since district formation. Discussion took place on Sphere of Influence, Place of Use and Division Boundaries and the meanings of each. Several maps were posted on the board room walls and referenced during the discussions. The primary topic was centered on the east side of Division 1 and the changed published boundary line. Railroad Commission properties were also discussed as a large portion of Division 1 includes Railroad Commission.

FINANCE MANAGER'S REPORT

The Finance Manager communicated the following:

State Controller Governmental Pay Report

The 2022 Government Compensation in California report was completed by Accounting Specialist, Jennifer Lacey and filed with the State Controller's Office. This report lists the minimum and maximum pay rates, regular pay, overtime pay, other pay, employer retirement contributions and health insurance payments for all Agency positions and will be included in the Controller's annual report of local government compensation.

Audit Fieldwork

Auditor requested tasks and schedules are complete and have been provided via a shared file. This next phase will involve a review of the requested items by C.J. Brown & Company, CPA's and subsequent requests for backup documentation that the auditors require. I, and Admin. staff, will work diligently to prepare and submit these requests. At this time, none are scheduled, but the auditors may also request interviews with various Agency staff members.

Enterprise Resource Planning (ERP)

Two of our budget items—2023-58L in General Fund and 2023-68IT9 in JFOF—are to cover the cost of research and the creation of a Request for Proposal (RFP) for possible replacement of our current Finance software...Springbrook. Art Martinez, Manager of Information Systems is our lead in this endeavor, along with Jaymie Perrin, Operations Support Manager, Heather Benedict, Account Technician III, and myself to aid in the research and development of an RFP. Discussions are underway and meetings are set up to review samples of content to help in the creation of an RFP that accurately presents the Agency's needs to potential candidates for a new ERP system.

Debt Service Payment

The principal and interest payment for the 2016 Miners Ranch Water Treatment Plant Improvement Project Certificates of Participation (COP), in the amount of \$1,049,310.72, had a due date of April 1, 2023 and was paid on March 24, 2023. The remaining outstanding principal balance is \$23,105,000.00.

The Budget versus Actual pages were presented with communication about percent of fiscal year completed and how the agency is adhering to the adopted budget.

Director Grover asked why the budget lines increased so much from 2022 to 2023 in department 65 – Campgrounds. The General Manger communicated he would study the data and provide and answer.

Director Duncan asked status of a water rates study.

POWER DIVISION MANAGER'S REPORT

The Power Division Manager communicated the following:

South Fork Div tunnel average flow was 338 CFS. Slate Creek Div tunnel was open for 12 days during the month. Little Grass Valley and Sly Creek Reservoirs combined storage was 125 kAF at month's end. The following reservoirs are currently spilling: LGV Res, SF Div Res, SC Div Res, Forbestown Div Res, and Ponderosa Res.

Agency requested a variance from DSOD, to raise (close) the SIy Creek Reservoir spillway gates before May 2, and capture additional runoff. Variance was granted by DSOD on April 13 and gates were raised.

DWR Bulletin 120 observed conditions as of April 13 for accumulated WY to date precipitation is at 131% of average (North Sierra 8-Station Index), and observed snowpack is at 195% of average for April 1 (North Region).

MAINTENANCE

Powerhouses

- Woodleaf Powerhouse. Status: In service, normal dispatch schedule. Remove Cooling Water Pump no.1 for repair. Forced outages – Cooling water system problems, PG&E transmission line problem.
- Forbestown Powerhouse. Status: In service, normal dispatch schedule. Contractor install new ceiling in control room. Annual maintenance outage completed on March 15, 2023. Forced outage – PG&E transmission line problem.
- Sly Creek Powerhouse. Status: In service, normal dispatch schedule. Annual maintenance outage scheduled for October 2 thru 21, 2023. Forced outage PG&E transmission line problem.
- Kelly Ridge Powerhouse. Status: In service, normal dispatch schedule. Annual maintenance outage scheduled for November 6 thru 18, 2023.

Project Facilities and Assets

- Snow Monitor Sites Check stations and record snow/water levels
- Sly Creek Tunnel Fabricate and install enclosure for penstock and PSV
- SF-14 Perform annual maintenance outage
- SF-25 Perform annual maintenance outage
- Miners Ranch Canal Inspect, clean trash racks
- Miners Ranch Reservoir Toe of dam, repair culverts, clear brush
- Project roadways inspect, remove snow, clean and remove debris
- Remote Stations Replace batteries and service gauging equipment
- Various locations Perform security inspections, install surveillance equipment
- Communication systems Perform service, maintenance, and repairs
- Vehicle fleet Perform service, maintenance, and repairs

REGULATORY COMPLIANCE

April Conveyance Inspections

Chapter 12 of the FERC Engineering Guidelines provides guidance on the inspection, monitoring and evaluation of the safety of water conveyance structures for hydropower projects. While penstocks, canals and tunnels are ancillary to dam structures, they still have failure consequences that should be identified, monitored and mitigated for. As required, all components of the dam structures were inspected and analyzed during the Twelfth Part 12D Safety Inspections and Potential Failure Mode Analysis workshops conducted in 2022. Staff hike the Woodleaf, Forbestown and Kelly penstocks on a quarterly basis to visually inspect the surge tanks, steel pipe and reinforcements girders, concrete saddle and thrust blocks and ensure that there have been no significant changes to slope stability or vegetation. The winter months present opportunity for rock or tree fall damage and material slides. April inspections did not identify any post winter issues of concern with conveyance structures, however stenciling of major thrust blocks to improve future inspection documentation and routine veg maintenance was completed.

The low-level outlet at Miners Ranch Dam supplies the Bangor Canal with raw water for irrigation. Staff inspected the underground section of pipe during the outage for Canal maintenance, and did not identify any issues of concern.

Due to the exceptional amount of water moving through our watershed, inspections of the South Fork and Slate Creek Tunnel intakes will not take place until later this year. Routine inspections of the tunnels are scheduled to coincide with access availability based on system operations.

The Miners Ranch Canal continues to be inspected each week because of the criticality in supplying both the Kelly Ridge Powerhouse and the Miners Ranch Treatment Plant.

PROJECT WORK

Miners Ranch Canal Work

Using our approved budget for this year, the Agency is requesting proposals from engineering companies in order to procure an updated design for the replacement of the Miners Ranch Canal. The most recent assessment and design documents were done in 2013, and no longer fully cover the scope of work that we intend to pursue when replacing sections of the canal. Work tasks in this Request for Proposal include:

- Review of existing design and assessment documents.
- Evaluation of current site conditions.
- Design of replacement canal sections, with consideration of alternative construction methods (i.e. precast).
- Field support and inspections during the 2023 construction.

The goal for this proposal is to receive an updated design prior to our planned canal work during the November 2023 outage, and to use the new design on planned and unplanned canal work in the years ahead.

The RFP for the Miners Ranch Canal Project has been issued to consultants and posted on our website. Next week, a mandatory site visit for any consultants that plan to submit a proposal is being conducted, which gives the consultants an opportunity to see the project, and SFWPA staff a chance to meet the consultants' teams.

Forbestown Powerhouse Acoustical Ceiling Replacement

BRAcoustical has successfully completed their project at Forbestown Powerhouse. An entirely new T-Bar ceiling system and LED lighting has been installed in the operations control room.

GENERAL MANAGER'S REPORT

The General Manager communicated the following:

Domestic Water Treatment Operations

The total Miners Ranch Treatment Plant (MRTP) treated water production for the month of March totaled 71.56 million gallons.

The total Bangor Treatment Plant (BTP) treated water production for the month of March totaled .306 million gallons.

The Red Hawk Ranch Pump Station raw water total flow for March totaled 689,548 gallons.

All bacteriological requirements were good for the MRTP& BTP. Borges & Mahoney's technician was onsite to perform annual chlorine maintenance on March 8th. The system went online in April of 2014 and is still in great shape due to the preventative maintenance performed annually.

Miners Ranch production was 78% of average over the past 5 years. Bangor's production was 114% of average over the past 5 years.

Irrigation Water Operations

As discussed at the March board meeting the start of irrigation season is slightly delayed to continue critical maintenance.

"2023 Irrigation Season"

The 2023 irrigation season has been delayed to support mutual aid efforts with NYWD on the Upper Forbestown Ditch. This section of conveyance is critical to both SFWPA & NYWD to efficiently convey raw water to their irrigation customers and both districts' treatment plant reservoirs, respectively.

In addition, both districts have greatly benefitted from a heavy precipitation year, including a couple very productive late season storms.

With heavy consideration and a focus of future sustainability, the modified start dates of the 2023 irrigation season are as follows:

SFWPA Upper and Lower Forbestown Ditch: 05/08/2023

Bangor Canal and surrounding conveyance: Estimated 04/20/2023 Palermo Canal and surrounding conveyance: Estimated 04/20/2023

SFWPA appreciates your understanding.

Pictures were provided of ditch maintenance performed including shotcrete and headwall construction.

SB 998 statistics were provided on water shutoffs by billing cycle and the outstanding costs associated with delinquent payments.

Palermo Water Consolidation Project

Permits are still in review at County Public Works. In the mean-time individual encroachment permits will be submitted by streets where residents are applying for domestic water service. The first 680' mainline extension will be

on Ludlum Ave.

PG&E Remote Grid, Notice of Default and Easement

A site visit and analysis of remote grid feasibility was conducted on April 4. 2023. Attendees included SFWPA, DWR, PG&E and Box Power Inc. (micro grid solutions). Three physical areas were reviewed for potential locations of a Remote Grid Installation. PG&E and Box Power Inc. will analyze if opportunity exists for next steps of discussion. The group also analyzed the internal operations (power source and loads) to assist with feasibility.

South Feather has provided single line diagrams per the "Notice of Default" communication and are awaiting a response to schedule powerhouse visits. PG&E acknowledged receipt of documentation on February 22, 2023.

A request for easement approval was submitted by PG&E for a location on Solana Drive. SF owns a 5.33-acre parcel in which PG&E would like to construct utility infrastructure in one small area as part of their undergrounding of electrical distribution lines. A field visit is scheduled for April 26th to review specifics for the board to consider an easement agreement.

PUBLIC COMMENT

Public comment for Directors can be submitted anytime via e-mail. However, in order to be read into the record during the meeting it must be submitted to PublicRelations@southfeather.com by 12:00 P.M. Tuesday May 23, 2023.

Marieke Furnee communicated gratitude for work on the ditch and the delay to start irrigation while the shotcrete was being performed. Stated that measuring equipment was being installed to help efforts moving forward. Shared that the NYWD crew does not like using plastic in ditches but was only allowed to use plastic in the past. Looking forward to working together in the future.

Charles Sharp introduced himself as a customer of NYWD. Communicated "nice podium" and articulated a vision of Yuba, South Feather and North Yuba all working together. Stated thanks for stopping the water sell. Rath/Dustin, thinking was brilliant and gutsy. Asked Rath if the ditch can hold 50 CFS.

Donna Corson introduced herself as an irrigation customer for over 40 years. South Feather has been so helpful and gracious. In awe of what has been done and the treatment to NYWD's customers.

Ron Fink provided the Directors with news paper articles relating to AB460 and AB 1337 as well as a Third Appellate District Court Case (C015461) filed December 23,1993 stamped "Not to be Published". Expressed concern about bills taking control of water rights away. There is a liberal movement going on and asked how much involvement do the districts have on this topic.

Other Views

FEDERAL OPTIONS

Day of reckoning for the tapped-out Colorado River

By Dan Walters

When white settlers forayed into what came to be known as the Imperial Valley at the dawn of the 20th century, they found a barren desert in Callfornia's southeastern corner, unpopulated except for a few members of the Kamia clan of the Kumeyses tribe.

asy tribe.

The harsh conditions, however, had a potential unside.

With water, the desert could bloom with erops and the water was potentially svallable from the Colorado River, which flowed to the sas a few dozen miles to the east, on the other side of a massive stretch of Sahara-like sand dunes.

The settlement of the valley was romantically portrayed in "The Winning of Barbara Worth," a bestselling novel by Harold Bell Wright that later became a silent movie.

A canal was dug, routed through Mexico to skirt the sand dunes, and the Imperial Valley, named for the Imperial Land Co., blossomed. It became a 500,000-acre provider of vegetables, alfalfa and other crops watered at very little cost from the Colorado and nurtured by year-round sunshine.

By being the first
Krganization to tap the
Colorado, the Imperial
Irrigation District,
formed in 1911, obtained
the river's most senior
diversion rights. Thus,
when allocations were

tistate compact, the IID claimed nearly threefourths of California's share of 4.4 million acrefeet a year, with the remainder going to municipal users in and around Los Angeles.

There have been minor adjustments in allocations over the years, and IID has sold some of its water to other entities, particularly in San Diego County. However, the district has jealonsly guarded its senior rights, even as the Colorado's flows dwindled and upstream reservoirs such as Lake blead and Lake Powell shriveled.

The day of reckoning, however, may have arrived.

The federal Bureau of Reclamation, citing the Colorado's declining flows and the probability that Mead and Powell cannot be sustained, wants all seven states drawing water from the river to cut back. Years of negotiations have gone nowhere, largely due to IID's stubborn defense of its rights.

This month, the Bureau of Reclamation raised the stakes of the multistate poker game, proposing three options: do nothing and let nature take its course, reduce all diversions by the same percentage, or cut back propositionately by water rights.

rights.
"The prolonged drought afflicting the American West is one of the most significant challenges facing our country today," Deputy Interior Secretary Tommy Be-

other officials gathered in a room overlooking Hoover Dam and a much-diminished Lake Mead. "We're in the third decade of a historic drought that has caused conditions that the people who built this system would not have imagined.

"Everybody understands the significance of the crisis," Beaudreau added. "I think everybody understands that, as fortunate and thankful we are for the precipitation, that nobody's off the hook, and that there needs to continue to be unity in trying to develop solutions."

Federal officials have hinted that if forced to act, they likely would opt for the across-the-board equal percentage reduction in diversions.

It would have the greatest negative effect on California overall and the Imperial Irrigation District specifically, and would clearly undercut the senior rights held by the IID and some other diverters — particularly Native American tribes that gained rights relatively late in the 132-year history of the Colorado's diversions.

Such a move would certainly draw lawsuits from the IID and California water interests, contanding that it violates longestablished rights.

The release of the three options is widely regarded as a spur to get negotiations going again, but whether it works is very much up in the air.

Dan Walters is a

Opinion

MORE LOCAL NEWS & THE MERCURYNEWS.COM

Editorial

California needs to stop wasteful water diversions

California's inability to prevent illegal and wasteful use of its water supply is more annoying than a leaky faucet. And far more costly. When water is illegally di-

When water is illegally diverted, it severely reduces the amount available to urban and agricultural users throughout the state. But the state Water Resources Control Board lacks the tools needed to enforce water rights and protect the limited surely

water rights and protect the limited supply. The process for stopping illegal diversions can take weeks. And when the state does finally step in, the fines it levies are insufficient to act as a deterrent. It's the equivalent of a police officer catching someone speeding and sending, if you don't slow down in the next 20 days, we'll hit you with a fine for the cost of a gallon of gas.

gallon of gas.

Two bills introduced into the Legislature would help solve the problem. Assembly Bill 460, introduced by Rebecca Basser-Kahan, D-Orinda, and Assembly Bill 1337, introduced by Buffy Wicks, D-Oakland, would empower the state Water Resources Control Board to act more promptly to the Dischauster water baser by the property of the Dischauster water by the property of the Dischauster water by the property of the prop

sour to act more promptly to stop illegal water practices. AB 460 gives the board the power to issue fines of up to \$10,000 per day for violations, up from the current \$500 a day, and additional amounts for water that is illegally di-

AB 1337 expands the board's enforcement authority and gives it the shiftly to order a timely curtailment of illegal diversions. The current state code requires a 20-day waiting period or a hearing before any fines are immemented.

code requires a 20-day waiting period or a hearing before any fines are implemented. The problem stems from the state's water-rights system, which dates back to the Gold Rush. California has

more than 40,000 water-rights holders who in most years have claims that total far more than the available supply. Every summer sees those holding rights to water they can't access demanding more. When they can't get enough to irrigate crops or feed livestock, farmers and ranchers too often succumb to the temptation of them.

to illegally divert water.

A blatant example occurred last August in the midst of what was the worst drought in the state, recorded by trees.

last August in the midst of what was the worst drought in the siste's recorded history. The Sacramento Bee reported that Siskiyou County rancher Jim Soala and his neighbors were watching their grazing pastures dry up after being told by the state that their access to Shasta. River water was being curtailed. So Scala and his neighbors flouted state regulators, opening the river's irrigation gates for eight days, causing a two-thirds drop in the river flows near Yreks. The resulting the of \$4,000 on Siskiyou County ranchers was called 'langhable,' with good reason. Is amounted to show! \$50 per rancher.

The bills are not just about

The bills are not just about protecting the environment and the fish and wildlife that require sufficient flows to survive. It's also about protecting downstream rights holders' access to water.

cess to water.

The bills are expected to face heavy opposition from senior water-rights holders, especially the estimated 38% of those who obtained their entistements before 1910 when the state board was formed. They have long maintained they shouldn't be subject to the state's water curtailments.

AB 460 and AB 1337 will be heard Thesday by the Assem-p. heard Thesday by the Assem-p.

AB 460 and AB 1337 will be heard Tuesday by the Assem-p by Wster, Parks and Wildlife Committee. The sooner they become law, the better.



While heavy rains allowed water to flow over the Lake Croville spillway last month, the state needs better enforcement to stop illegal water diversions downstream.

DIRECTORS' REPORTS

Director Starr: No report for the month of April. Director Duncan: No Report for the month of April. Director Wulbern: No report for the month of April. Director Hemstalk: No report for the month of April. Director Grover: No report for the month of April.

RECESS (4:12)

President Wulbern offered opportunity for public comment on closed session items.

CLOSED SESSION (convened at 4:24 p.m.)

Conference with Labor Negotiator (Government Code §54957.6(a)):

Agency-designated representatives: Rath Moseley.

Employee Organizations: IBEW 1245, Hydro Generation Employees Unit and Water Treatment and Distribution Employees Unit.

Conference with Legal Counsel – Existing Litigation

(Paragraph (1) of subdivision (d) of Government Code section 54956.9

- A. Name of Case: North Yuba Water District v. South Feather Water & Power Agency et al., Sutter County Superior Court Case No. CVCS21-0001857
- B. Name of Case: South Feather Water & Power Agency v. North Yuba Water District et al., Sutter County Superior Court Case No. CVCS21-0002073

OPEN SESSION (reconvened at 4:56 p.m.) – President Wulbern announced that legal counsel was given direction during closed session.

ADJOURNMENT (4:57 p.m.)	
Rath T. Moseley, Secretary	Rick Wulbern, President



SOUTH FEATHER WATER & POWER AGENCY

TO: Board of Directors

FROM: Cheri Richter, Finance Manager

DATE: May 18, 2023

RE: Approval of Warrants and Checks

Agenda Item for 5/23/2023 Board of Directors Meeting

April, 2023 expenditures are summarized as follows:

Checks: <u>64234</u> to <u>64404</u> \$ 486,688.90

Electronic Fund Transfers: <u>230401</u> to <u>230408</u> <u>\$ 289,472.54</u>

Payroll Expenses: \$ 503,907.28

TOTAL EXPENDITURES FOR APRIL, 2023 \$ 1,280,068.72

At April 30, 2023, the authorized balance available was \$ 600,788.95.

Action to approve all expenditures:

"I move approval of expenditures for the month of April, 2023 in the amount of \$1,280,068.72 and authorize the transfer of \$900,000.00 from the TCB General Fund to the TCB Accounts Payable and Payroll Fund for the payment of regular operating expenses."

Date	Check #	Vendor Name	Account	<u>Description</u>	<u>Amount</u>
4/5/2023	230401	CalPERS	01-50-50400	April 2023 Employee/Retiree Health Insurance	182,157.97
4/5/2023	230402	CalPERS	01-50-50413	PR 4/7/23 Employer/Employee Contributions/Svc Credits	47,215.40
4/5/2023	230403	CalPERS 457	01-00-22908	PR 4/7/23 Employee 457 Contribution	3,113.95
4/5/2023	230404	Lincoln Financial Group	01-00-22908	PR 4/7/23 Employee 457 Contribution	1,649.69
4/7/2023	64234	Capital One	07-66-66100	Bottled Water, Paper Plates, Coffee, Tea, Soap	196.49
4/7/2023	64235	Comcast Business	07-63-63251	For CAISO Meters 4/3/23-5/2/23	191.83
4/7/2023	64236	Contech Engineered Solutions LLC	07-00-11202/2023-0605	Binwall Type2 Strainer, Corner Vert, Galv. Finish, Connector	96,050.66
4/7/2023	64237	Home Depot Credit Service	01-00-11180/2022-0227	Grout, Anchors, Mop, Shop, Filters, Ratchet	344.97
4/7/2023	64238	Kestrel Power Engineering	01-61-61201	Calculate/Provide Generator Capability Curves	4,500.00
4/7/2023	64239	McMaster Carr Supply Co.	07-00-11140/2022-0994	U-Bolts	14.54
4/7/2023	64240	Napa Auto Parts	07-66-66150	Fuel Cap	10.22
4/7/2023	64241	North Yuba Water District	07-66-66250	Water Service 1/25/23-3/23/23	61.00
4/7/2023	64242	Northern Safety Co. Inc	07-62-62102	Safety Glasses	318.40
4/7/2023	64243	Ray's General Hardware	07-64-64260	Paint, Stencils	53.19
4/7/2023	64244	Tehama Tire Service, Inc	07-66-66150	4 New Tires	1,144.72
4/7/2023	64245	Thomas Hydraulic & Hardware	07-66-66150	Hydraulic Cylinder Seals, Couplers	162.35
4/7/2023	64246	Trimark Associates, Inc	07-63-63201	Remote Intelligence RIG Support Svc For KPH	7,495.00
4/7/2023	64247	Access Information Management	01-50-50201	March 2023 Shred Service	232.19
4/7/2023	64248	Accularm Security Systems	01-50-50201	Fire/Burg/Alarm Monitoring, Email Notifications	197.00
4/7/2023	64249	AT&T	07-68-68251	2/19/23-3/18/23 Equip/Router For Circuit Billing	163.00
4/7/2023	64250	Better Deal Exchange	01-54-54104	Hose Washers, Ball Valve, Fittings, Tie Downs, Trash Bags	104.95
4/7/2023	64251	Capital One	01-53-53260	Coffee, Trash Bags, Towels, Kitchen Supplies, Paper Plates	110.98
4/7/2023	64252	David Dunn	01-54-54501	D2 Water Distribution Certificate Reimbursement	80.00
4/7/2023	64253	Grainger, Inc	01-54-54150	Sidebox/Crossbox Tool Boxes	2,822.47
4/7/2023	64254	Home Depot Credit Service	01-54-54295	Lumber, Exhaust Fan, Light Bulbs, Wrenches, Towels	387.56
4/7/2023	64255	Lake Oroville Area PUD	01-53-53250	January - March 2023 MRTP Sewer Service	141.18
4/7/2023	64256	Robert Major	01-54-54394	Health Benefit Reimbursement	21.45
4/7/2023	64257	Napa Auto Parts	01-56-56150	Silicone, Fuel Pump, Oil Seals, Wiper Blades, Towels	704.29
4/7/2023	64258	Cory Nevers	07-66-66394	Health Benefit Reimbursement	60.00
4/7/2023	64259	Northern Safety Co. Inc	07-62-62102	Reflective Rain Jacket, 10 MPH Speed Sign	164.93
4/7/2023	64260	Orkin Pest Control	01-53-53201	March 2023 Pest Control Service	95.00
4/7/2023	64261	Jaymie Perrin	01-52-52394	Health Benefit Reimbursement	60.00
4/7/2023	64262	Josh Reynolds	07-63-63394	Health Benefit Reimbursement	60.00
4/7/2023	64263	Mariah Rowlinson	01-55-55394	Health Benefit Reimbursement	55.00
4/7/2023	64264	Sharp's Locksmithing	01-55-55113	Master Locks, T-Turn & Labor	278.51
4/7/2023	64265	Thatcher Company	01-53-53102	Chlorine Gas with COA, Sodium Hypochlorite	11,731.29
4/7/2023	64266	Thomas Hydraulic & Hardware	01-56-56150	Seal Kits	87.14
4/7/2023	64267	USA Blue Book	01-54-54104	Pressure Gauges	208.83
4/7/2023	64268	Corning Ford	01-00-11183/2023-0235	2023 Ford Ranger XLT - Miners Ranch Treatment Plant (MRTP)	44,715.44
4/7/2023	64269	ADP	01-50-50201	April 2023 Payroll Billing	1,565.78
4/7/2023	64270	ACWA-JPIA	01-50-50393	Jan-March 2023 Workers Compensation	28,445.55
4/7/2023	64271	AFLAC	01-00-22915	Employee Supplemental-Disability/Life PR 3/10 & 3/24/23	1,357.88
4/7/2023	64272	Empower Annuity Ins Co of America	01-00-22908	PR 4/7/23 Employee 457 Contribution	100.00

Date	Check #	Vendor Name	<u>Account</u>	<u>Description</u>	<u>Amount</u>
4/7/2023	64273	Mission Square Retirement	01-00-22908	PR 4/7/23 Employee 457 Contribution	2,684.70
4/7/2023	64274	Nationwide Retirement	01-00-22908	PR 4/7/23 Employee 457 Contribution	2,272.12
4/7/2023	64275	Reliance Standard Life	01-50-50402	April 2023 Employee Life Insurance	980.02
4/7/2023	64276	Standard Insurance	01-50-50403	April 2023 Employee Disability Insurance	3,122.12
4/14/2023	64277	Aramark Uniforms	07-66-66103	Employee Jackets	874.76
4/14/2023	64278	Better Deal Exchange	07-00-11150/2023-0612	Pipe & Caps, Batteries	155.97
4/14/2023	64279	CA Dept of Tax & Fee Administration	01-53-53250	1st Qt 2023 Electric Energy Surcharge For Water/Power	70.00
4/14/2023	64280	CDW Government, Inc	07-00-11140/2022-0994	Hard Drive	67.72
4/14/2023	64281	Dan's Electrical Supply	07-00-11140/2022-0994	Connectors, Box, Flex Line, Cover, Bushings	393.07
4/14/2023	64282	Durham Pump & Irrigation	07-63-63260	Stainless Steel Spider w/Insert	577.28
4/14/2023	64283	Emerson Process Management	07-63-63408	On-Site Governor Training	20,775.22
4/14/2023	64284	Fastenal Company	07-63-63260	Washers, Bolts, All Thread	138.76
4/14/2023	64285	K-Gas	07-66-66250	Propane For Shops/Office	2,060.21
4/14/2023	64286	Lifting Technologies LLC	07-00-11150/2023-0611	Crane Man Basket, Powder Coat Primer, Freight Charge	12,551.72
4/14/2023	64287	Line-X of Yuba Sutter	07-00-11150/2023-0613	Deposit for A.R.E. 26" DCU MAX Camper Shell	2,466.37
4/14/2023	64288	Kristen McKillop	07-67-67100	Reimbursement for Clerk Recorder Copies/Postage & Boxes	67.84
4/14/2023	64289	McMaster Carr Supply Co.	07-63-63100	Flexible Nozzle, Grease Dispensing Tip, Rope, Fittings	298.64
4/14/2023	64290	Motion Industries Inc	07-63-63260	V-Ring/Adapters Split Garlock Packing	3,425.37
4/14/2023	64291	Napa Auto Parts	07-66-66150	Struts, Ball Joints, Filters, Bushings	834.55
4/14/2023	64292	Oroville Cable & Equipment Co	07-66-66171	Tank Rent, Work Gloves	350.01
4/14/2023	64293	PG & E	07-66-66250	Electric Service for HQ & PH	4,305.95
4/14/2023	64294	Ray's General Hardware	07-63-63100	Tiedowns, Batteries, Flush Valve	100.56
4/14/2023	64295	Tyndale Company Inc	07-63-63103	Employee Fire Resistant Clothes	3,132.73
4/14/2023	64296	AT&T	07-60-60251	April 2023 Circuit Billing	581.18
4/14/2023	64297	AT&T Long Distance	01-50-50251	2/23/23-3/24/23	378.80
4/14/2023	64298	AT&T Long Distance	01-53-53251	3/2/23-3/27/23	
4/14/2023	64299	AT&T Mobility	07-68-68380	iSat Phone Units X2, Router/Cell/Tablet Service	1,568.98
4/14/2023	64300	Better Deal Exchange	01-53-53260	Paint, Brushes, Fittings, Tube, Valves, PVC Check, Stems	223.18
4/14/2023	64301	Bobcat of Chico	01-56-56150	Solenoid	270.60
4/14/2023	64302	Comcast	01-53-53251	April 2023 MRTP Com Svc/Mainline Phone-Circuit Svc	2,441.51
4/14/2023	64303	O'Reilly Auto Parts	01-56-56150	Trailer Hub, Bearing Kits	101.52
4/14/2023	64304	Oro Dam Auto Center	01-56-56150	Door Stop	100.85
4/14/2023	64305	Oroville Cable & Equipment Co	01-56-56150	Hydraulic Hoses, Air Fitting, Hose Clamps	442.31
4/14/2023	64306	Oroville Power Equipment	01-56-56150	Gasket Set	17.97
4/14/2023	64307	PG & E	01-54-54250	2/1/23-3/23/23 Service	7,896.33
4/14/2023	64308	Richardson & Company	07-60-60216	Review Prior Audit Work Papers w/C.J. Brown & Co, CPA's	585.00
4/14/2023	64309	Tractor Supply Credit Plan	01-56-56150	Pump	203.76
4/14/2023	34310	U.S. Bank	01-00-15213	PVC Pipe, Dish Network Bill, Thermal-Harnes, Gasket	562.32
4/14/2023	64311	Vista Net Inc	01-50-50251	April 2023 Utility Tax, Licenses, Anti Virus, Monitoring	3,625.09
4/14/2023	64312	W.G. Civil Engineers Inc	01-00-11204/2022-0219	Palermo Water Consolidation Annexation #1-22 -Plat	460.00
4/18/2023	230405	CalPERS	01-50-50413	PR 4/21/23 Employee/Employer Retirement/Svc Credit	49,684.71
4/18/2023	230406	CalPERS 457 Plan	01-00-22908	PR 4/21/23 Employee 457 Contribution	3,125.96
4/18/2023	230407	Lincoln Financial Group	01-00-22908	PR 4/21/23 Employee 457 Contribution	1,703.86

Date	Check #	Vendor Name	Account	Description	Amount
4/19/2023	64313	ACWA-JPIA	01-50-50400	May 2023 Employee Vision & Dental Insurance	10,098.26
4/19/2023	64314	Empower Annuity Ins Co of America	01-00-22908	PR 4/21/23 Employee 457 Contribution	100.00
4/19/2023	64315	IBEW #1245	01-00-25207	April 2023 Member Dues	6,636.22
4/19/2023	64316	Mission Square Retirement	01-00-22908	PR 4/21/23 Employee 457 Contribution	2,684.70
4/19/2023	64317	Nationwide Retirement	01-00-22908	PR 4/21/23 Employee 457 Contribution	2,210.53
4/21/2023	64318	American Textile & Supply Inc	07-63-63100	Classic White Rags For PH's, Shops & SPH	1,183.20
4/21/2023	64319	AT&T	07-66-66251	Local Calls 4/10/23-5/9/23	4,798.19
4/21/2023	64320	AT&T	07-60-60251	For Circuits 4/10/23-5/9/23	322.40
4/21/2023	64321	Bank of America	07-68-68100	Microsoft Server Licenses, Catalytic Convertor Clamps	2,852.97
4/21/2023	64322	Burlington Safety Lab Inc	07-63-63201	Lineman Rubber Insulated Gloves	122.50
4/21/2023	64323	Capital One	07-63-63100	Bottled Water, Paper Plates	198.13
4/21/2023	64324	Hilti Inc	07-68-68100	SPX-L Handheld Core Bit	315.80
4/21/2023	64325	M J B Welding Supply Company	07-63-63100	Welding Supplies	176.46
4/21/2023	64326	MSC Industrial Supply Company	07-63-63100	Flashlight For Operator	119.66
4/21/2023	64327	Mt. Shasta Spring Water	07-66-66100	Bottled Water	109.92
4/21/2023	64328	Napa Auto Parts	07-66-66150	Fuel, Oil, Air/Hydraulic Filters For Grader	477.64
4/21/2023	64329	Ray's General Hardware	07-63-63100	Storage Totes, Bungees, Paint Tray, Liners, Rollers, Cement	162.32
4/21/2023	64330	Slate Geotechnical Consultants	07-67-67201	FERC Part 12D Consultant Svc For 3/2023	11,427.50
4/21/2023	64331	Advanced Document Concepts	01-50-50380	March 2023 Maintenance Contracts For Printers/Copiers	580.69
4/21/2023	64332	AT&T	01-53-53251	4/10/23-5/9/23 Local Calls Service	574.44
4/21/2023	64333	AT&T	07-68-68251	Firewall 4/5/23-5/4/23	672.10
4/21/2023	64334	Backflow Distributors Inc	01-55-55205	Backflow Blanket For MRTP, Relief Valve Rubber Kit	1,841.41
4/21/2023	64335	Butte Co Air Quality Management	01-52-52501	2023-2024 Permit To Operate	1,456.30
4/21/2023	64336	C.F. Archibald Paving Inc	01-54-54201	252 SF Of 6" AC Restoration In Front Bangor Elementary	4,788.00
4/21/2023	64337	Dan's Electrical Supply	01-54-54104	30 AMP Fuses/Contactor, 27 AMP Relay, Well Splice	
4/21/2023	64338	Dawson Oil Company	01-56-56150	Grease	131.50
4/21/2023	64339	Del-Mar Equipment Rentals	01-00-11202/2023-0234	Concrete, Fuel, Adapter	917.26
4/21/2023	64340	Fruit Growers Laboratory Inc	01-53-53201	Monthly Raw MRTP/BTP Coliform-Quanti Tray	62.00
4/21/2023	64341	Grid Subject Matter Experts	07-60-60201	March 2023 General Consulting	270.00
4/21/2023	64342	Hach Co	01-53-53260	DPD Free Chlorine Reagent Power Pillows, Red Indicator	763.87
4/21/2023	64343	Hemming Morse LLP	07-60-60208	Professional Accounting Services 3/1/23-3/31/23	8,424.00
4/21/2023	64344	Home Depot Credit Service	01-00-11202/2023-0234	Lumber, Rebar, Concrete Mix, Sand Bags, Copper Elbows	827.35
4/21/2023	64345	InfoSend Inc	01-55-55114	March 2023 Cycles 1 - 10 Billing & Fed Ex	9,867.61
4/21/2023	64346	Jimmy P Tools LLC	01-56-56102	Gloves	45.89
4/21/2023	64347	Arthur Martinez	01-58-58408	Reimburse Flight For Springbrook Conference 7/9-7/15/23	537.80
4/21/2023	64348	McMaster Carr Supply Co	01-54-54104	Clamping Shaft Collars For Lake Wyandotte	124.78
4/21/2023	64349	Mendes Supply Company	01-56-56100	Paper Towels, Foam Cups	239.85
4/21/2023	64350	Napa Auto Parts	01-56-56150	Battery, Diesel Exhaust Fluid, Oil, Connectors, Trailer Plugs	316.65
4/21/2023	64351	Office Depot Inc	01-50-50106	Copy Paper, Post-Its, Colored Folders, File Organizers	314.37
4/21/2023	64352	Oro Dam Auto Center	01-56-56150	Passenger Door	700.05
4/21/2023	64353	Recology Butte Colusa Counties	01-56-56250	Garbage Service March 2023	1,237.45
4/21/2023	64354	Tractor Supply Credit Plan	01-54-54104	Submersible Pump For Liner At MRTP	162.36
4/21/2023	64355	Van Ness Feldman LLP	07-60-60208	File Hydropower Industry Amicus Brief W/US Supreme Ct	3,369.43

Date	Check #	Vendor Name	Account	<u>Description</u>	Amount
4/28/2023	64356	Airgas USA LLC	07-63-63100	Bales of 3M Petroleum Sorbent Pads, Shipping & Handling	912.26
4/28/2023	64357	Aramark Uniforms	07-68-68103	Employee Jackets	364.61
4/28/2023	64358	AT&T	07-60-60251	Fiber Optic Connection	1,059.74
4/28/2023	64359	Jola Battershell	07-60-60256	Reimbursement-Food & Supplies For Employee Retirement	77.59
4/28/2023	64360	Better Deal Exchange	07-63-63100	Super Glue	8.36
4/28/2023	64361	BRAcoustical Inc	07-63-63370	Acoustic Ceiling Replacement At FPH	11,495.00
4/28/2023	64362	Butte County	07-00-11204/2023-0610	Land Development Fee For Equipment Building Install	165.00
4/28/2023	64363	California Crane Schools Inc	07-66-66408	1 Hr Crane Practice Before Practical Crane Test	150.00
4/28/2023	64364	Capital One	07-60-60256	Paper Towels, Safety Supplies, Food/Supplies For Luncheon	112.31
4/28/2023	64365	Cox Glass Co	07-66-66150	Replacement Windshield For C#6	640.76
4/28/2023	64366	Garrett Daley	07-60-60256	Reimbursement- Gate Hinges, Food For Luncheon	380.71
4/28/2023	64367	Dan's Electrical Supply	07-63-63100	Terminals, Disconnects	81.33
4/28/2023	64368	Dish Network	07-60-60201	Satellite Service 5/8/23-6/7/23	60.00
4/28/2023	64369	Fastenal Company	07-63-63260	Bolts, Nuts, Washers, Drive Bits	160.82
4/28/2023	64370	General Steel Corporation	07-00-11202/2023-0610	Final Payment For Straight Wall Steel Building	48,895.05
4/28/2023	64371	Home Depot Credit Service	07-63-63100	Plywood	61.60
4/28/2023	64372	M J B Welding Supply Company	01-00-11180/2022-0227	Welding Supplies	300.92
4/28/2023	64373	Mendes Supply Company	07-63-63100	Paper Towels For Dispensers	123.82
4/28/2023	64374	Napa Auto Parts	07-66-66150	Battery Cables For Rock Rake, Blower Motor Resistor	125.81
4/28/2023	64375	Oroville Cable & Equipment Co	07-63-63100	Nitrogen For PH's	129.90
4/28/2023	64376	PG & E	07-63-63501	Generator Connection Agr For 4/2023	7,010.37
4/28/2023	64377	Ray's General Hardware	07-63-63100	Plywood, Pipe Fittings, Primer Paint, Mouse Traps	238.22
4/28/2023	64378	AT&T Mobility	01-50-50251	Tablet/Cell Phone Service 3/19/23-4/18/23	249.03
4/28/2023	64379	Badger Meter	01-00-22300	3/4" Meters	11,059.84
4/28/2023	64380	Better Deal Exchange	01-54-54104	Pipe Cutter, Seal Tape, Kneeling Pad, Tie Wire, Hose Caps	158.99
4/28/2023	64381	Bobcat of Chico	01-56-56150	Fuel Pump, Gaskets, Jet Start Valve, Eye Bolt	297.02
4/28/2023	64382	Bob's Concrete Pumping	01-00-11202/2023-0232	Shot Crete SF/14 Forbestown Ditch	14,363.25
4/28/2023	64383	Capital One	01-56-56100	Paper/Shop Towels, Trash Bags, Cleaning Supplies, Water	493.04
4/28/2023	64384	Core & Main	01-00-22300	Bronze Saddle For PVC, Gate Valve	697.83
4/28/2023	64385	Jeff's Truck Service	01-56-56150	Seal Kits & Sleaves	166.75
4/28/2023	64386	K-Gas Inc	01-56-56160	Propane	41.77
4/28/2023	64387	Minasian Law	07-60-60208	March 2023 Professional Services	11,812.18
4/28/2023	64388	Napa Auto Parts	01-56-56150	Transfer Pump, Air, Oil/Fuel Filters, Grease, Drain Plug	532.77
4/28/2023	64389	Normac	01-53-53260	PVC Fittings, Ball Check Valve Kit	207.88
4/28/2023	64390	Office Depot Inc	01-53-53100	Pens, Copy Paper, Monitor Riser Stand	113.46
4/28/2023	64391	Orkin Pest Control	01-53-53201	Pest Control Service April 2023	95.00
4/28/2023	64392	Oroville Cable & Equipment Co	01-56-56150	Emery Cloths, Hydraulic/Meter Grease Zerks, Adapter	86.99
4/28/2023	64393	Oroville Ford	01-56-56150	Hitch Assembly, Bed Mat Liner	438.00
4/28/2023	64394	City of Oroville	01-00-22907	March 2023 City Utility Tax	4,037.95
4/28/2023	64395	Tehama Tire Service Inc	01-56-56150	2 New Tires -T71, 1 New Tire E132	676.78
4/28/2023	64396	Thomas Hydraulic & Hardware	01-56-56150	Emery Cloths, O-Rings, Drill Bit	52.40
4/28/2023	64397	Verizon Wireless	01-53-53251	Cell Phone Service 3/11/23-4/10/23	138.14
4/28/2023	64398	Nina Bruschi	01-00-22200	Refund UB 21012	38.42

Date	Check #	Vendor Name	Account	<u>Description</u>	Amount
4/28/2023	64399	Estate of Sherri Simpson	01-00-22200	Refund UB 16978	38.17
4/28/2023	64400	Austin or Emily Ford	01-00-22200	Refund UB 17971	21.71
4/28/2023	64401	Ronald or Marcella Monago	01-00-22200	Refund UB 15751	5.00
4/28/2023	64402	Frank Newton	01-00-22200	Refund UB 15642	23.20
4/28/2023	64403	Corran Oliver	01-00-22200	Refund UB 15006	19.42
4/28/2023	64404	Michael or Samantha Porter	01-00-22200	Refund UB 14195	26.00
4/28/2023	230408	CA Dept of Tax & Fee Administration	07-63-63260	Governor Parts, Oil Filters, Sand Blasting Cabinet	821.00
				Total April, 2023 Checks	776,161.44

SOUTH FEATHER WATER AND POWER AGENCY PAYROLL APRIL, 2023

PAYROLL STATE & FED TAXES	\$ 169,711.50
PAYROLL NET	334,195.78
TOTAL APRIL, 2023	\$ 503,907.28

CREDIT CARD DETAIL APRIL, 2023 PAYMENTS

Check #	<u>Date</u>	<u>Description</u>	<u> 1</u>	<u>Amount</u>
64310	4/14/2023	U.S. Bank 3/14/23-4/13/23 Video Conferencing 3/8/23-4/7/23 Dish Network Bill 3/12/23-4/11/23 Satellite Int. Service Thermal-Harnes, Water Pump Gasket PVC Pipe	\$	16.71 60.00 110.00 139.68 235.93
			\$	562.32
64321	4/21/2023	Bank of America		
		Office Chair Lumbar Support	\$	32.16
		LED Fog Lights For Truck T121		117.96
		Avenza Maps Pro Subscription		152.24
		Cabling Pass Through Device		184.40
		Catalytic Convertor Clamps		1,343.52
		Licenses For Microsoft Servers At Sunset		1,988.95
			\$	3,819.23



SOUTH FEATHER WATER & POWER AGENCY

TO: Board of Directors

FROM: Rath Moseley, General Manager

DATE: May 15, 2023

RE: South Feather Draft Municipal Service Review

Agenda Item for 5/23/23 Board of Directors Meeting

The Butte Local Agency Formation Commission (LAFCO) issued a Notice of Public Hearing to be held on Thursday, June 1, 2023 at 9:00 a.m. in the Oroville City Council Chambers to consider adoption of the Municipal Service Review, including South Feather Water and Power Agency.

Th following pages are the Notice of Public Hearing and the proposed South Feather Municipal Service Review. The proposed MSR is an update and replacement of the 2006 document.

What is an MSR?

An MSR is a comprehensive study designed to better inform the Commission, local agencies, and the community about the provision of local services. The study looks at how municipal services are provided and financed by an agency, the costs to residents for those services, and potential service alternatives. One of the most important benefits of an MSR is a review of the long-term sustainability of the range and level of services provided by local governments and other service providers.

BUTTE LOCAL AGENCY FORMATION COMMISSION NOTICE OF PUBLIC HEARING

Notice is hereby given by the Butte Local Agency Formation Commission that a public hearing will be held on Thursday, June 1, 2023, at 9:00 a.m. in the Oroville City Council Chambers, 1735 Montgomery Street, Oroville, California, regarding the following:

ITEM DETERMINED TO BE CATEGORICALLY EXEMPT FROM ENVIRONMENTAL REVIEW

and

NOTICE OF RELEASE OF PUBLIC REVIEW DRAFT MUNICIPAL SERVICE REVIEW OF WATER AND WASTEWATER SERVICES IN THE OROVILLE AREA and PUBLIC HEARING TO CONSIDER ADOPTION OF THIS MUNICIPAL SERVICE REVIEW; BUTTE LAFCO FILE NO. 20-09

Notice is hereby given that the Public Review Draft Municipal Service Review of Water and Wastewater Service Providers (City of Oroville, South Feather Water and Power Agency, Lake Oroville Area Public Utility District, Thermalito Water and Sewer District, California Water Service – Oroville) is available for public review and comment beginning on Thursday, May 11, 2023, at the office of the Butte Local Agency Formation Commission (LAFCo), the Butte County Library - Oroville, and online at www.buttelafco.org. At the June 1, 2023, public hearing, the Commission will review and consider the adoption of this document.

Objections to the regularity or sufficiency of the document or proceedings or the reasons why you are in opposition to the proposal must be in writing. Any objections must be filed with the Executive Officer or Commission prior to the conclusion of the hearing. Written comments on the Public Review Draft Municipal Service Review should be returned to the LAFCo office by May 31, 2023, either by mail (1453 Downer Street, Suite C, Oroville, CA 95965) or via e-mail to Shannon Costa, Butte LAFCo Deputy Executive Officer, at scosta@buttecounty.net.

Information regarding this project is on file and available for public viewing at the office of the Local Agency Formation Commission, 1453 Downer Street, Suite C, Oroville, CA, 95965, or can be obtained by calling (530) 538-7784, Monday through Friday between 9:00 a.m. and 4:00 p.m.

Chapter 6: South Feather Water and Power Agency



(Image courtesy of Google Maps)

This chapter presents a municipal service review for the South Feather Water and Power Agency (SFWPA) with details of the Agency formation, boundary, government structure, population and land use, disadvantaged communities, and the provision of water services and facilities. Based on the information included in this report, written determinations that make statements involving each service factor that the Commission must consider as part of a municipal service review are presented. The determinations are based upon data presented in this Chapter for the South Feather Water and Power Agency and are recommended to the Commission for consideration. The Commission's final Municipal Service Review (MSR) determinations will be part of a Resolution which the Commission formally adopts during a public meeting.

Table of Contents 6.1 AGENCY PROFILE & OVERVIEW 6-3 6.2 AGENCY FORMATION AND BOUNDARY 6-4 6.3 DISTRICT GOVERNANCE AND ACCOUNTABILITY 6-9 6.4 GROWTH & POPULATION FORECASTS 6-18 6.5 DISADVANTAGED UNINCORPORATED COMMUNITIES 6-32 6.6 PUBLIC SERVICES 6-37 6.7 INFRASTRUCTURE AND PUBLIC FACILITIES 6-59 6.8 FINANCIAL ABILITY TO PROVIDE SERVICES 6-69 6.9 JOINT POWER AUTHORITIES 6-87 6.10 COST AVOIDANCE & FACILITIES SHARING 6-87 6.11: BIBLIOGRAPHY 6-91

6.1 Agency Profile & Overview

6.1.1 Agency Profile

Type of Agency:

Irrigation District

Principal Act:

California Water Code, Division 11, §20500 et seg.

Functions/Services:

Raw untreated water for agricultural irrigation;

Water treatment and distribution for municipal purposes

(residential and commercial);

Recreation;

Hydropower.

Main Office:

2310 Oro Quincy Highway, Oroville, CA 95966

Mailing Address:

Same

Phone No.:

(530) 533-4578 (530) 533-9700

Fax No.: Web Site:

https://southfeather.com/

General Manager: Alternate Contact: Rath Moseley Email: rmoseley@southfeather.com

Jaymie Perrin Email: jperrin@southfeather.com

Meeting Schedule: **Meeting Location:**

Fourth Tuesday of every month, starting at 2:00 PM PST 2310 Oro Quincy Highway, Oroville, California 95966.

Date of Formation:

November 1919

Area Served:

33,718 acres (52.68 square miles)

Population:

Existing population ranges from 16,770 to 24,300

Number of water

connections:

Miners Ranch Treatment Plant serves 6,909 connections.

Bangor Treatment Plant serves 22 connections

Annual Total Revenue:

Approximately \$17.4 million in FY2020

Annual Expenditures

\$21 million in FY2020

6.1.2 Agency Overview

The South Feather Water and Power Agency (SFWPA) is a local government agency structured as an Irrigation District consistent with its Principal Act: California Water Code, Division 11, Section 20500 et seq¹. SFWPA provides the following services to its customers located within the Feather River/Lower Honcut Watershed in Butte County:

- Raw untreated water for agricultural irrigation;
- Water treatment and distribution for municipal purposes (residential and commercial);
- Recreation; and
- Hydropower.

6.2 Agency Formation and Boundary

6.2.1 Formation

The South Feather Water and Power Agency (formally known as the Oroville-Wyandotte Irrigation District) was organized on November 17, 1919. The impetus to organize the District began during the California gold rush when miners constructed a ditch to move water from the South Fork of the Feather River to the mining sites at Forbestown, Wyandotte, Honcut, Ophir, and Bangor. Later the mining ditch network was modified and expanded to divert water from tributaries of the Feather River. The old water rights from the South Feather Land and Water Company and the Palermo Land and Water Company were assumed by the Oroville-Wyandotte Irrigation District and, subsequently, the South Feather Water and Power Agency (SFWPA, UWMP 2021g).

6.2.2 District Boundary

The South Feather Water and Power Agency geographic boundary currently encompasses 33,718 acres or 52.68 square miles, as seen in Figure 6-1. The SFWPA is located within the west side of the County of Butte and generally encompasses the areas south of Lake Oroville and east of downtown Oroville. The City of Oroville and California Water Service (Cal Water) are adjacent to the western boundary of SFWPA. Lake Oroville is located to the north of SFWPA. Unincorporated parcels that rely upon groundwater wells, subject to the approval of the Butte County Environmental Health Department, are located to the east and south of SFWPA. The boundary area has an irregular shape and also includes 19 non-contiguous parcels, as well as isolated boundary pockets located east of the District Sphere of Influence. The boundary includes 11,127 assessor parcels (LAFCO GIS, 2020). The District has annexed seven parcels since 2008, adding 26.7 acres into its boundary area, as listed in Table 6-1 below.

¹There are 92 irrigation districts in California. The CA Water Code authorizes irrigation districts to provide the following services: sell and lease water; operate sewage collection and disposal system; deliver water for fire protection; dispose and salvage sewage water; protect against damage from flood or overflow; provide drainage made necessary by the irrigation provided; maintain recreational facilities in connection with any dams, reservoirs, etc.; and operate and sell electrical power.

Table 6-1: Annexations into SFWPA Boundary					
Agency	Year	Acres	Assessor's Parcel Number		
			Bonite Street (Rodriquez)		
SFWPA	2021	n/a	Annexation No. 2-21		
SFWPA	2019	7.1	026-250-008		
SFWPA	2015	6.6	079-270-076		
SFWPA	2015 1.2 026-090-006				
SFWPA					
SFWPA	2009	10.5	027-070-069 and -070		
Data Source:	Data Source: Butte LAFCo, Ms. Costa, August 2021				

In addition to the recent annexations listed above, LAFCO approved the annexation of the unincorporated community of Palermo in September 2022. The Palmero annexation consists of approximately 550 parcels added to the South Feather Water and Power Agency. The annexation facilitates the Palermo Clean Water Consolidation Project, a partnership between the County of Butte and South Feather Water and Power Agency, to provide safe, clean drinking water to the residents of Palermo who have historically depended on private wells for domestic water.

SFWPA has received several newly proposed annexations, as listed below in Table 6-2.

Table 6-2: Pr	oposed Ar	nexations		
Agency	Year	Acres	Assessor's Parcel Number	Name of Project
SFWPA	2021	n/a	033-023-002 and 033-023-003	Resolution No. 21-22-02
SFWPA	2021	n/a	033-022-006	Resolution No. 21-23-02
SEMIDA	2021	2/0	n/o	Wulbern/Starr Resolution No. 21-26b was considered on October 26,
SFWPA	2021	n/a	n/a	2021
Data Source:				
Note: Acreag	e and APN	s were no	t readily available	

California Water Service (a private water company serving the City of Oroville) has extended its service area into a small portion of the northeast corner of the SFWPA service area. It provides domestic water service at that location (LAFCO/Kleinschmidt MSR, 2006).

6.2.3 Sphere of Influence

This section briefly describes the existing Sphere of Influence (SOI) for the South Feather Water and Power Agency. Additional details can be found in Appendix K, SOI Options, in this document. Butte LAFCO adopted the original SOI for the SFWPA in 2006 via Resolution No. 55-M 2005/2006. The Agency's SOI is almost twice the size of its boundary and encompasses 64,125 acres. The SOI includes 11,853 parcels, which is slightly more parcels than within the boundary (11,127), and this indicates that the average parcel size is larger in the SOI. Table 6-3 below, contains additional details regarding the size of the boundary and SOI.

As part of this MSR preparation process, Agency staff indicated that the Sphere of Influence boundary is adequate for projected future needs (SFWPA, 2021a). However, in the 2006/07 MSR, SFWPA noted that their Sphere of Influence boundary should be co-terminus with their "place-of-use" boundary as designated by the State Water Resources Control Board to best accommodate future needs regarding the approved area for distribution of water per existing water rights.

	Boundary Area (All Services)	SOI (All Services)	Total Boundary & SOI
Total Acres	33,718	64,125	97,843
Square Miles	52.68	100.19	152.87
Number of Assessor Parcels	11,127	11,853	22,980

There is a geographic overlap in water service with an adjacent water services provider, the California Water Company, as shown in Figure 6-2 below. The area shown for the SFWPA is the "place of use" per the CA Water Board. Figure 1-2 shows a different perspective of the geographic overlap which consists of 343 parcels (APNs) and 228.5 acres (assessor's acreage).

6.2.4 Extra-Territorial Services

LAFCO's 2006 MSR (by Kleinschmidt) noted that SFWPA served water to six customers outside its boundaries via surplus water agreements that were considered for renewal annually. These six customers received irrigation water (not potable). However, there are no current surplus water agreements for these six customers (personal communication, R. Mosley 7/11/2022). Otherwise, the SFWPA has not provided extra-territorial services outside its District boundary due to its formal policies that require annexation to the District prior to service (SFWPA, 2021a). However, during recent drought conditions, local property owners have had wells go dry. County officials issued a Local Emergency² on July 20, 2021, and are working to secure more resources and assistance for well owners experiencing difficulties. In the Oroville area, the South Feather Water and Power Agency provides three locations with potable (drinking) water available to well owners, as listed in Table 6-4 below.

² 55 private well owners in Butte County have wells that have run dry during the years 2014 to 2021 as they reported to CA DWR at: https://data.cnra.ca.gov/dataset/household-water-supply-shortage-reporting-system-data. Nine of those well owners were located in the Oroville area. There may be more "unreported" wells that have run dry during the drought.

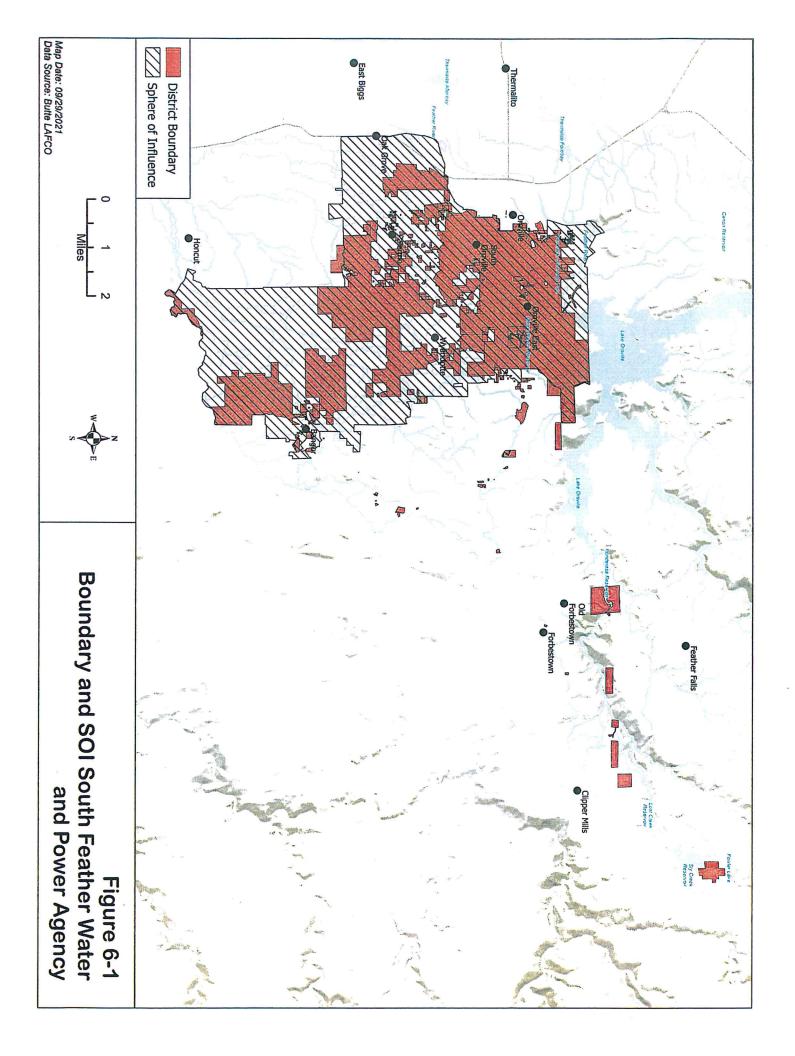
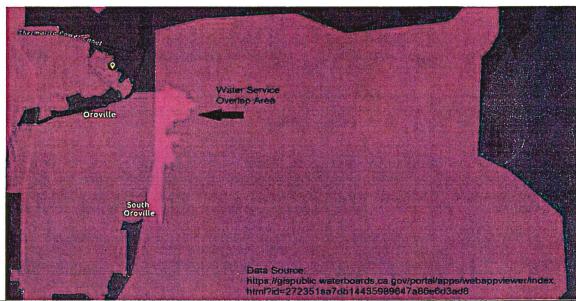


Figure 6-2: Overlapping Service Areas Between SFWPA and Cal Water



A STATE OF THE PARTY OF THE PAR			
Table 6-4: Potable Water Locations for Well Users During Drought			
Address	Water Detail		
7540 Oro Bangor Hwy	This location will accommodate containers up to 5 gallons.		
	Public access is unlimited. No limit on daily use.		
2310 Oro Quincy Hwy.	This location will accommodate containers up to 5 gallons.		
*	Public access is unlimited. No limit on daily use		
234 Kelly Ridge Road.	This location will accommodate containers up to 5 gallons.		
	Public access is unlimited. No limit on daily use.		
Data Source: https://fox40.com/news/local-news/butte-county-residents-whose-wells-have-gone-dry-			
can-get-water-at-several-locations/			

6.2.5 Other Overlapping Service Providers

One small water supplier is located within the SFWPA boundary: the Pleasant Grove Mobile Home Park, as listed in Table 6-5 below.

Table 6- 5: PLEASANT GROVE MHP - Water Service Detail

Table 0-3. I ELAGANI GROVE WITH - WE	ater dervice betail		
Boundary Type	Water Service Area		
Water System Number	CA0400020		
Water System Name	Pleasant Grove Mhp		
County	Butte		
Population	327		
Regulating Agency	LPA34 - Butte County		
State Classification	Community		
Address Line 1	6986 Lincoln Blvd		
City	Oroville		
State	CA		
Zip Code	95965		
Service Connections	88		
Contact Phone Number	530-667-5190		
Data Source: https://gispublic.waterboards.ca.gov/portal/apps/webappvie	ewer/index.html?id=272351aa7db14435989647a86e6d3ad8		

6.3 District Governance and Accountability

This section describes how performance, accountability, transparency, and public engagement relate to the public's trust in local government. LAFCO is required by the CKH Act to make specific determinations regarding a local agency's government structure and accountability.

6.3.1 Government Structure

The SFWPA is a local government agency structured as an Irrigation District consistent with its Principal Act: Irrigation District Law, Division 11, of the Water Code (Section 20500 et seq.) of the State of California. The Agency was originally established in November 1919. Today, the Agency is governed by an elected five-member Board of Directors, which serves as the decision-making authority for SFWPA. The General Manager is appointed by the Board of Directors (SFWPA, 2021). The General Manager appoints department heads.

6.3.2 District Board

The Agency operates under the direction of the elected District Board. SFWPA's territory is organized into five divisions, and one Board Member is elected from each division. Each elected Board Member must be a registered voter, a landowner in the SFWPA, and a resident of the division that he or she represents at the time of their nomination or appointment and through their entire term consistent with California Water Code section 21100. Directors are elected by registered voters who are residents of the District.

Board members serve a four-year term, with two Board Member seats running two years apart from the remaining three seats. A new Board Chair and Vice-Chair are selected by the Board Members each year. Information about the Agency's active committees was not readily available. The current Board of Directors members and the expiration dates of their terms are shown in Table 6-6 below.

Table 6-6: South Feather Water and Power Agency Board of Directors				
Name	Title	Term End	Division	
Rick Wulbern	Board President,	Term expires 12/2024	2	
Ruth Duncan	Board Vice President	Term Expires 12/2024	4	
Brad Hemstalk	Director	Term expires 12/2026	1	
Mark Grover	Director	Term expires 12/2026	3	
John Starr	Director	Term expires 12/2026	5	
Source: Agency/City website at: https://southfeather.com/about/board/				

Board members received an annual stipend of \$7,200 for attendance at regular and special Board meetings and committee meetings during the year 2020 (CA Auditor, 2021).

The District Board holds regular public meetings on the fourth Tuesday of every month, beginning at 2:00 PM PST and continuing until the agenda is completed (SFWPA, 2021). The location for Board meetings is 2310 Oro Quincy Highway, Oroville, California 95966. All meetings of the District Board and other advisory boards are open to the public in accordance with the Brown Act. The agenda for each District Board meeting includes a public comment period for items not on

the agenda. Additionally, the Board meeting minutes reflect that the public is invited to speak on all items included on the agenda. All meeting agendas are publicly posted on the SFWPA website at: https://southfeather.com/. Agendas are also distributed in hard-copy (bound packets) to Board Members (SFWPA, 2021a).

In California, elected members of special district boards are required to comply with three laws regarding accountability and ethics, including: 1) the Political Reform Act; 2); Assembly Bill 1234 (Salinas, 2005), which requires ethics training; and 3) Government Code 53237 et. seq. which mandates sexual harassment prevention training. A description of these three state laws is provided in Chapter 3, Introduction. An assessment regarding compliance with these three ethics and accountability laws by elected board members of each of the subject water or wastewater-related agencies was made as part of this MSR process.

- Political Reform Act: Each district is required to have conflict of interest code/policies. SFWPA has adopted a conflict of interest policy known as Policy #120. Ideally, SFWPA's conflict of interest policies would be made available to the public on their website; however, since the Agency website does not yet provide information on this topic, it is an item that needs improvement. The Political Reform Act requires special district board members to disclose all personal economic interests by filing a "Statement of Economic Interests" with Agency or County staff. SFWPA board members file this statement with the SFWPA Finance Dept. An indication of compliance with this law was assessed by querying the Fair Political Practices Commission (FPPC) Complaint and Case Information Portal at: https://www.fppc.ca.gov/enforcement/complaint-and-case-information-portal.html. Query results for the SFWPA found no complaints or cases, which indicates good compliance with the Political Reform Act.
- Assembly Bill 1234 (Salinas, 2005): Local government officials are required to take ethics training every two years. The consultants' review of the SFWPA website indicates that Board members do not submit required forms and receive updated required trainings as prescribed by the state laws regarding ethics training. Therefore, SFWPA's Board is not currently in compliance with AB 1234. Compliance with this law was assessed for each water or wastewater agency studied in this MSR by asking the Agency Clerk of the Board for the dates and other documentation of training events. SFWPA expects to provide this training to Board members in August 2022 (personal communication, R. Mosley, 7/11/22).
- Government Code 53237 et. seq.: Special district board members must receive the required sexual harassment prevention two-hour training every two years. Compliance with this law was assessed for each of the water and wastewater agencies studied in this MSR by searching for the information on the Agency's website and asking the Agency Clerk of the Board for the dates and other documentation of training events. SFWPA's website does not document whether SFWPA elected Board members have submit required forms or receive trainings as required by the state laws regarding mandated sexual harassment prevention training. SFWPA expects to provide this training to Board members in August 2022 (personal communication, R. Mosley, 7/11/22). It is recommended that the SFWPA website be updated to include this information.

6.3.3 Accountability and Transparency

Brown Act

The Brown Act is described in Chapter 3, Introduction, of this MSR. All meetings of the District Board and committees are open to the public in accordance with the Brown Act. The agenda for each meeting includes a public comment period, and agendas are made available 72 hours before meetings. Any written document that relates to an agenda item is available for public inspection at the same time the document is distributed to the members of the Board of Directors. Written documents are available at the Agency Office and on the Agency website at: https://southfeather.com/. Agendas are also distributed via email upon request.

The State Legislature updated the Brown Act in 2016 as codified in Government Code §54954.2 (Assembly Bill 2257). These new Brown Act requirements prescribe the methods and location by which an agenda must be accessible on an agency's website for all meetings as detailed in the Introduction, Chapter 2[or Chapter 3]. New requirements state that meeting agendas be retrievable, downloadable, searchable, and indexable. As part of this MSR, the website for each water and wastewater agency was evaluated to determine if meeting agendas are made available to the public in a manner compliant with AB2257. SFWPA makes its agenda available on its website, under a tab entitled "Publications" under its "Board Agenda Information" section, at the following URL: https://southfeather.com/publications/agenda/. It is also found directly on its homepage at the bottom. This webpage contains meeting minutes and agendas for the current year. This information is easily found on the homepage and provides the necessary agenda information, with the most current agenda located at the top. Board packets for both regular and special meetings are provided. Therefore, the Agency website agenda distribution does comply with the requirements of the Brown Act 2016 Updates described in AB2257.

On March 4, 2020, Governor Newsom signed Executive Order No. N-29-20, declaring a state of emergency due to the threat of COVID-19 and suspending the general Brown Act requirements for teleconferencing. AB 361 (Chapter 165, Statutes of 2021) allows³ public agencies to continue to meet remotely during a proclaimed state of emergency through January 1, 2024, while mandating that such meetings continue to be publicly accessible.

_

³ AB 361 allows a public agency to hold a remote meeting if a proclaimed state of emergency is in effect and: (1) state or local officials have imposed or recommended measures to promote social distancing; (2) the public agency holds a meeting for the purpose of determining, by majority vote, whether as a result of the emergency, meeting in person would present imminent risks to the health or safety of attendees; or (3) the public agency holds a meeting and has previously determined by majority vote that as a result of the emergency, meeting in person would present imminent risks to the health or safety of attendees. A public agency that holds a meeting using teleconferencing must give notice of the meeting and post agendas in compliance with the Brown Act, allow the public to access the meeting by phone or video, and provide an opportunity for the public to address the legislative body directly during the meeting. In the event that the public's ability to access the meeting or provide public comment is disrupted, the agency cannot take any action on items appearing on the agenda until public access to the meeting is restored. Additionally, depending on how the public agency provides for public comment, AB 361 contains various requirements to ensure public comment periods are not concluded prematurely. Finally, AB 361 requires that local agencies reconsider the need for remote meetings, at least every thirty days, while a state of emergency remains active. In order to continue to utilize remote meetings, the local agency must find, by majority vote, that (1) the state of emergency continues to directly impact the agency's ability to meet safely in person or (2) state or local officials continue to impose/recommend measures to promote social distancing.

In response to these events and consistent with Executive Order N-29-20, N-25-20, and N-35-20 from the Executive Department of the State of California, the Agency implemented Teleconference/Electronic Meeting Protocols effective April 2020, which allow for public participation through video conferencing (Zoom) and by telephone. During the Covid-19 pandemic, SFWPA limited in-person attendance for its Board meetings. All meetings are streamed live via Zoom, a video conferencing platform accessible by the public for free. Instructions for telephone and video conference participation are listed on the meeting agenda. Additionally, public comments for Directors can be submitted anytime via e-mail. However, in order to be read into the record during the meeting, it must be submitted to PublicRelations@southfeather.com prior to the Tuesday before the meeting date. Individuals will be given an opportunity to address the Board regarding matters within the Agency's jurisdiction that are not scheduled on the agenda. However, the Board cannot take action on any matter not on the agenda. Public comments are limited to 5 minutes per speaker. An opportunity for public comment on agenda items is provided at the time they are discussed by the Board.

Under the Brown Act, closed sessions of Board meetings are not encouraged; however, the Act does provide guidance about exceptions when closed sessions can be held under special circumstances. Commonly, LAFCO utilizes the number of closed sessions a Board holds during a year as an indicator of transparency since fewer closed sessions indicate better transparency levels. As an indicator, LAFCo would like to see fewer than 50 percent of a District's meetings list a closed session. The number of closed sessions listed on Board meeting agendas was evaluated. In the year 2020, the SFWPA Board held a total of 13 meetings which included 13 closed sessions (SFWPA Agendas, 2020). This calculates to 100 percent of SFWPA's Board meetings having closed sessions, exceeding LAFCO's indicator, indicating a potential lack of transparency or another management problem. This is an item that needs improvement. The closed sessions primarily dealt with litigation, as described in the following paragraph.

Litigation is expensive for public agencies due to the costs associated with preparing an administrative record, retaining attorneys, and preparing briefs. Avoidance of litigation is an indicator of management's effectiveness in utilizing alternative dispute resolution mechanisms. To assess the status of litigation, the MSR Authors reviewed SFWPA Board Agendas for the year 2020 and counted the number of legal cases. SFWPA was involved in eight litigation cases in the year 2020, including seven active cases and one anticipated case, as listed below in Table 6-7 (Source: SFWPA Agendas, 2020). The SFWPA is currently being sued by the North Yuba Water District, asserting a number of legal issues such as "breach of contract and breach of fiduciary duty." (NYWD, 2021). The recently hired SFWPA staff (Mr. R. Moseley) is working to reduce the number of concurrent litigation cases which involve the Agency.

Table 6-7: Litigation Discussed in 2020 - SFWPA

Existing Litigation

- Existing Litigation- George Foster and Georgia Perry v. South Feather Water and Power Agency, Daniel Love, Nike Hall, Butte County Superior Court Case No. 19CV03069
- Existing Litigation-Sierra Mountain Construction, Inc. v. South Feather Water and Power Agency, Butte County Superior Court Case No. 18CV00896
- Existing Litigation-Final Compensation Calculation of Michael C. Glaze, Respondent, and South Feather Water and Power Agency, Respondent OAH Case No. 2018041142
- Existing Litigation-(Gov. Code Section .54956.9) Glaze v. South Feather Water & Power Agency, Butte County Superior Court Case No. 20CV01283.
- Existing Litigation-(Government Code §54956.9(d)(1)) Bay-Delta proceedings, including the California WaterFix, and the associated environmental documentation.
- Existing Litigation- (Gov. Code §54956.9(d)(1).) Pacific Gas & Electric Co. Bankruptcy Proceedings, Case Nos. 19-3088 and 19-30089.
- Existing Litigation-(Gov. Code §54956.9(d)(1).) Sharp v. North Yuba Water District et al., (Yuba County Superior Court) Case No. CVPT20-00386.

Anticipated Litigation

• Anticipated Litigation- (Government Code §54956.9b) One potential case.

As listed in the above table, in 2020, SFWPA was involved with seven existing lawsuits plus one potential future lawsuit. However, the legal status of the above cases has been resolved as of July 2022, with the exception of the North Yuba Water District (personal communication, R. Mosley, 7/11/2022). Therefore, the number of closed sessions on meeting agendas is expected to decline significantly. It is recommended that the SFWPA Board and management continue to work towards reducing the number of closed sessions listed on Board agendas by reducing the number of concurrent lawsuits the Agency is involved with by utilizing legal and management skills along with other legal options such as settling court cases, mediation, and dispute resolution. It is also recommended that LAFCo study this issue when the next MSR or SOI analysis is written on the SFWPA.

Website

The Special District Transparency Act (SB 929 or California Government Code, §6270.6 and 53087.8) requires that special districts have a functional website that lists contact information and contains financial statements, compensation reports, and other relevant public information. Compliance with the Special District Transparency Act is used by LAFCO as one indicator to determine the accountability and transparency of a District.

The Agency's website is kept updated and is easily navigable, with current and past agenda packets and financial reports available for download. The "Newsroom" tab (webpage) is updated regularly. Contact information, financial statements, consumer confidence reports, and other publications are available for viewing and download on the Agency's website. Additionally, the homepage provides a phone number for emergency services. The Agency also does not seem to have a policy requiring that the SFWPA website be user-friendly and contain accurate and up-to-

date information. Although the SFWPA District website mostly complies with the requirements of the Special District Transparency Act, there is always room for improvement, and it is recommended that the Agency consider adding the following features associated with its website and other public communication:

- Adopt a policy requiring that the SFWPA website be user-friendly and contain accurate and up-to-date information; and
- Create a web page where community members can sign up for a free electronic subscription service that will send automatic email notifications when selected website information is updated.

General Accountability

The SFWPA demonstrated accountability and transparency in its disclosure of information and cooperation with Butte LAFCO. The Agency cooperated with LAFCO's requests for information and participated in an interview with the MSR consultants. Drinking water regulations are described in Appendix D. The Agency generally works towards compliance with these regulations.

Butte County is required by state law to impanel a grand jury. The major functions of a grand jury are divided into criminal indictments and civil investigations, and the civil investigation portion requires the majority of the time. The civil or "watchdog" responsibilities of the grand jury include examining all aspects of local government, including cities and special districts, to ensure the county is being governed honestly and efficiently and public monies are being handled appropriately. If an agency is subject to any grand jury inquiries, this can indicate poor performance or a high number of complaints about an agency. SFWPA was not investigated by the Butte County grand jury in 2020. Its most recent investigation by the Butte County grand jury was in 2011 to ensure SFWPA's continued compliance with the ethics training requirements of AB 1234 (SFWPA, 2011).

6.3.4 Management Efficiencies

The General Manager is appointed by and reports to the Board of Directors. Specifically, the General Manager serves as the Executive Officer and is responsible for all functions of agency staff. Additionally, the General Manager is responsible for ensuring Agency compliance with the Brown Act with support from the Agency's legal counsel. The Agency's Environmental and Safety Compliance Officer ensures compliance with rules and regulations regarding environmental and safety issues. The Agency's Water Division Manager is responsible for rules and regulations regarding water distribution. An important part of management effectiveness includes the Agency adopting an Agency-wide mission and vision statement. Based on the information assessed in this MSR, it appears that the SFWPA achieves its Mission.

SFWPA Mission Statement

The mission of South Feather Water and Power Agency (SFWPA) is both to deliver a dependable supply of safe, quality drinking water to its customers, and a dependable supply of water for agricultural users, in an economical, efficient and publicly responsible manner.

Hydroelectric generation facilities shall be utilized to optimize revenue from power generation, consistent with providing adequate and dependable water supplies to customers.

SFWPA is also committed to providing its employees a safe work environment and encouraging personal growth and attainment of goals.

Listening to and addressing feedback from customer suggestions and complaints is an important administrative function for local governments because it demonstrates concern for the constituents. SFWPA offers customers several ways to communicate suggestions or complaints, including:

- Phone at (530) 533-4578
- Web Site Contact Form: https://southfeather.com/necontact/
- U.S. postal mail to: 2310 Oro Quincy Highway, Oroville, CA 95966
- Directly to the General Manager: Email: rmoseley@southfeather.com

6.3.5 Staffing and Training

SFWPA's staff is organized into four divisions/units: Management, Finance, Water Treatment and Distribution, and Hydropower Generation. The reporting structure and the number of staff positions in each unit are depicted in the organization chart shown in Figure 6-3 below. As of June 2021, SFWPA had a total of 58 regular full-time employees. Seventeen employees worked in the administrative and overhead sector, and 27 worked in the Water Transmission and Distribution Unit (SFWPA, 2021a).

Employees receive a compensation package that could include the following, depending on the specific position: regular pay, overtime, lump sum, other pay, defined benefit, health-dental-vision insurance, and a retirement contribution. The compensation data for the year 2020 for the 58 regular full-time employees and the five non-regular or part-time employees is reported by SFWPA to the California Auditor.

UNITS OF REPRESENTATION

South Feather
Water & Power Agency's
Organizational Structure

Units of Represent A Dissiprion Emotypes

Visid Treatment A Dissiprion Emotypes

Oresit A Succont Employee

Orienta A Succont Employee

Units Tour Represent A Dissiprion Emotypes

Orienta A Succont Employee

Orienta A Succont Employee

Units Treatment A Dissiprion Emotypes

FINANCE DIVISION

Finance D

Figure 6-3: SFWPA Organization Chart

6.3.6 Determinations for Governance and Accountability

Based on the information included in Sections 6.1 through 6.3 above, the following written determinations make statements involving each service factor that the Commission must consider as part of a municipal service review. The determinations listed below in Table 6-8 are based upon the data presented and are recommended to the Commission for consideration. The Commission's final MSR determinations will be part of a Resolution that the Commission formally adopts during a public meeting.

Table 6-8: MSR DETERMINATIONS: ACCOUNTABILITY FOR COMMUNITY SERVICE
NEEDS, INCLUDING GOVERNMENT STRUCTURE AND OPERATIONAL EFFICIENCIES

Number	Indicator	Determination
SFWPA-Acc-1	Number of closed sessions during the year 2020 (ideally fewer than 50%).	100 percent (i.e., 13) of the meetings of the SFWPA Board of Directors included closed sessions during the year 2020. This number exceeds the 50 percent accountability indicator and is, therefore, an item that needs improvement. Therefore, it is recommended that the Board and staff reduce the number of closed sessions held each year by reducing the number of concurrent lawsuits.
SFWPA-Acc-2	Does the agency's Website comply with the 2016 updates to the Brown Act described in Government Code §54954.2 and enacted by Assembly Bill 2257?	Compliance with the 2016 updates to the Brown Act described in Government Code §54954.2 was evaluated in this MSR. The Agency's website agenda distribution does comply with the requirements of the Brown Act 2016 Updates described in AB2257, in that meeting agendas are retrievable, downloadable, searchable, and indexable. SFWPA makes its agenda and minutes available in .pdf format on its website, under a tab entitled "Publications" under its "Board Agenda Information" section, at the following URL: https://southfeather.com/publications/agenda/. Agendas are also found directly on its homepage at the bottom. Board packets for both regular and special meetings are listed.
SFWPA-Acc-3	Compliance with the Special District Transparency Act (SB 929 or California Government Code, §6270.6 and 53087.8) requires special districts to have a functional website that lists contact information and contains financial statements, compensation reports, and other relevant public information.	Compliance with the Special District Transparency Act (Gov. Code, §6270.6 and 53087.8) was evaluated in this MSR. The SFWPA does currently maintain a website that lists contact information for staff and the Board. Financial reports are also available at: https://southfeather.com/publications/financial-reports/ . Compensation reports were not found on the SFWPA website; however, the data is available from the CA Auditor's website. Therefore, the SFWPA mostly complies with the Special District Transparency Act. It is recommended that the SFWPA website be updated to include a link from the home page to the CA Auditor's website for access to compensation data.
SFWPA-Acc-4	Terms of office and next election date are disclosed for District Board members, and committee appointments are online.	Terms of office for each Board member are listed on the Agency's website. The next election date is disclosed for Board members by year, but not by the specific month and day, and this item could be improved by updating the website. In addition, board committee appointments are not online. It is recommended that the website be updated to list Board committee appointments.

SFWPA-Acc-5	Do elected Board members submit required forms and receive required trainings as prescribed by the three state laws regarding accountability and ethics, including: 1) the Political Reform Act; 2) Assembly Bill 1234 (Salinas, 2005), which requires ethics training; and 3) Government Code 53237 et. seq. which mandates sexual harassment prevention training?	Compliance by SFWPA Board members in submitting required forms and receiving required trainings as prescribed by the three state laws regarding accountability and ethics was assessed in this MSR. 1) SFWPA Board members comply with the Political Reform Act by submitting required economic interest forms to the SFWPA Finance Dept. 2) Assembly Bill 1234 (Salinas, 2005) requires ethics training, and compliance with this law is currently in-progress. SFWPA Board members will receive this training in August 2022. It is recommended that the SFWPA website be updated to share certification of training, and 3) Government Code 53237 et. seq. mandates sexual harassment prevention training, and compliance with this law is currently in-progress. SFWPA Board members will receive this training in August 2022. It is recommended that the SFWPA website be updated to share certification of training.
SFWPA-Acc-7	Current litigation and/or grand jury inquiry	The Butte County grand jury has not investigated SFWPA since 2011, which was regarding ensuring SFWPA's continued compliance with the ethics training requirements of AB 1234. SFWPA was involved in eight litigation cases in the year 2020, including seven active cases and one anticipated case. For example, the SFWPA is currently being sued by the North Yuba Water District, asserting a number of legal issues such as "breach of contract and breach of fiduciary duty." Therefore, it is recommended that new SFWPA managerial staff continue their work to reduce the number of concurrent lawsuits.

6.4 Growth & Population Forecasts

The growth and population projections for the affected area is a determination that LAFCO is required to describe, consistent with the MSR Guidelines from the Office of Planning & Research (OPR) as set forth in the CKH Act. This section provides information on the existing population and future growth projections for the South Feather Water and Power Agency. Historical and anticipated population growth is a factor that affects service demand. Appendix A at the end of this MSR/SOI Update provides detailed demographic and socio-economic information for The County of Butte. Economic data, including forecasts for The County of Butte, are provided in Appendix H.

6.4.1 Existing Population

Since census tracts do not directly correspond with Agency boundaries, data is inputted into calculations to provide a close approximation to the existing population for the Agency. Table 6-9 below provides current population estimates for the SFWPA boundary and SOI. A lower population estimate is provided from SFWPA's Urban Water Management Plan (2020), which calculates 16,770 persons residing within the boundary and 21,400 persons within the SOI. A higher estimate was calculated using newer data from the California Department of Finance (DOF) and Butte County Association of Governments (BCAG) Geographic Information Systems (GIS) data estimating 24,300 persons within the boundary and 25,245 persons within the SOI. The provision of both the lower and the higher population estimates is useful for better understanding the possible range of population dynamics, which change periodically depending on local conditions. For example, Butte County's population declined by three percent in 2021 to 202,669 from the 2020 estimate of 208,951. This decline could be due to numerous factors such as age or economics. However, continuing ramifications from the Camp Fire in the Town of Paradise could also be a contributing factor in the decline.

Table 6-9: Existing Perma	nent Population, S	SFWPA, 2020	
Name of District / Type	Population Boundary	# Registered Voters in Boundary	Population in SOI only
SFWPA Lower Estimate	16,770*	13,316**	21,400***
SFWPA Higher Estimate	24,300****	13,316**	25,245

Data Source:

Since census tracts do not spatially align with the Agency's boundaries, it is difficult to calculate an exact level of the population within SFWPA. However, the "low" and the "high" estimates presented in Table 6-9 above give a range. The actual population level is probably somewhere in the middle of this range. As new data from the 2020 census is released, it may be possible to calculate a more precise estimate.

6.4.2 Existing Population in SOI

The SFWPA's SOI population (outside the Agency's boundary) is estimated to range from a low of 21,400 persons to a high of 25,245 persons, as listed in Table 6-9 above.

^{*}SFWPA, UWMP, 2021g, calculated based on 2.45 persons per connection.

^{**}Registered Voter data provided by Butte County Elections Office, Denlay, Keaton, August 9, 2021.

^{****}SFWPA, UWMP, 2021g, based on 2010 U.S. Census data

^{****}Calculated based on 2.13 persons per parcel average in unincorporated Butte County and 2.4 persons per parcel average within the City of Oroville. Calculated using 2020 CA DOF population data and 2021 GIS data.

6.4.3 Projected Population Growth

Projecting the future population of a District is complicated due to varying annexation rates and census tracts that do not match District boundaries. For purposes of this MSR, data from the California Department of Finance (DOF) was used to project population growth, as shown in Table 6-10 below. The DOF provides population projections at the County level, and the growth rate for the County of Butte is utilized to extrapolate population growth rates for the South Feather Water and Power Agency.

Two growth scenarios are shown in Table 6-10 below. The "Low Start" scenario begins with the lower population estimate of 16,770 provided in the SFWPA's UWMP of 2020 and increases by an average annual growth rate (AAGR) of 0.88 percent to reach a projected population of 20,887 by the year 2045 (an increase of 4,117 persons). Although the "Low Start" scenario begins with a smaller population estimate, it has a slightly higher growth rate than the "High Start" scenario. The "High Start" scenario begins with a population of 24,300 in the year 2020 and projects a numeric increase to 29,375 by the year 2045 (an increase of 5,075 persons.

The projected growth rate for the County of Butte anticipates development throughout the entire County. The addition of 4,117 to 5,075 more people to the SFWPA boundary area by 2045 is possible as the area contains under-developed areas that could potentially be annexed to the City of Oroville or made available for more intensive residential development. Areas located near the City of Oroville have a moderate probability of developing over the next twenty years since the City continues to grow and expand.

6.4.4 Existing Land Use

Land use is a factor that affects population growth and, therefore, demand for public services. However, the SFWPA is not a land-use authority. The Agency's boundary area is bordered on the west by the City of Oroville, to the north by Lake Oroville, and to the east by the Thermalito Diversion Canal. Most of the Agency's boundary area is located within unincorporated Butte County and includes the small communities of Palermo, Kelly Ridge, Wyandotte, and Bangor. Land uses in the unincorporated area surrounding the City of Oroville immediately to the east are largely urbanized. However, further east, the topography gains elevation, and rural and forest uses predominate. Within the SFWPA boundary, single-family residences are the predominant land use type. Oro Dam Blvd. and Foothill Blvd contain several businesses and churches. Landuses in areas to the north and south are primarily agricultural, with citrus and olives being some

Table 6-10: Total Estimated and Projected Population (2020 – 2045)	nated and	Projected	Populati	on (2020	– 2045)				
	2020	2025	2030	2035	2040	2045	Percent Increase Numeric Increase 2020 to 2045 2020 to 2045	Numeric Increase 2020 to 2045	AAGR 2020 to 2045
Low Start Scenario									
SFWPA UWMP 2020*	16,770	16,770 17,521 18,306 19,125 19,882 20,887	18,306	19,125	19,882	20,887	24.6	4,117	0.88%
High Start Scenario	24,300	24,300 27,165 27,895 28,525 29,020 29,375	27,895	28,525	29,020	29,375	20.9	5,075	0.76%
Data Sources:				•		· :	1		
*In their 2020 UWMP, the SFWPA utilized long-range population projections from the CA Dept. of Finance dated January 2018 for the period 2018 to 2040. This information was used to establish the control total for BCAG's high forecast scenario for housing at 0.88 percent.	SFWPA ut	tilized long- establish th	range popu	ulation pro	ojections f CAG's higi	rom the C <i>F</i> h forecast s	Dept. of Finance date cenario for housing at	od January 2018 for the 0.88 percent.	period 2018 to
** Population projection for SFWPA calculated as a percentage of The County of Butte future growth as projected by the California Department of	r SFWPA	calculated a	is a percer	ntage of T	he County	of Butte fu	iture growth as project	ed by the California De	partment of
Finance. Demographic Research Unit. January 2021. Table P-1: Total Estimated and Projected Population for California and Counties: July 1, 2010	search Un	it. January	2021. Ta	ble P-1: 1	Total Estin	nated and I	Projected Population for	or California and Count.	ies: July 1, 2010
to July 1, 2060 in 1-year Increments.	ncrements.								
	The state of the s	The second secon	The second secon						

of the most common crops. Approximately 10,000 acres within the Agency's boundaries produce agricultural crops (personal communication, R. Mosley, 7/11/2022). The predominant land uses in the City of Oroville, and its immediate surroundings include single-family residences, mobile home parks, and schools. Please refer to Chapter 3 for additional detail on land-use within the City of Oroville. In addition, there are several other independent local government agencies that operate within or near the SFWPA boundaries, including five schools (Ishi Hills Middle School, Oroville Union High School, Oroville Elementary School, Palermo Elementary School, and Bangor Elementary School), the Butte County Mosquito, and Vector Control District; Lake Oroville Area Public Utility District, Feather River Recreation and Park District, and the City of Oroville (SFWPA, UWMP, 2021g).

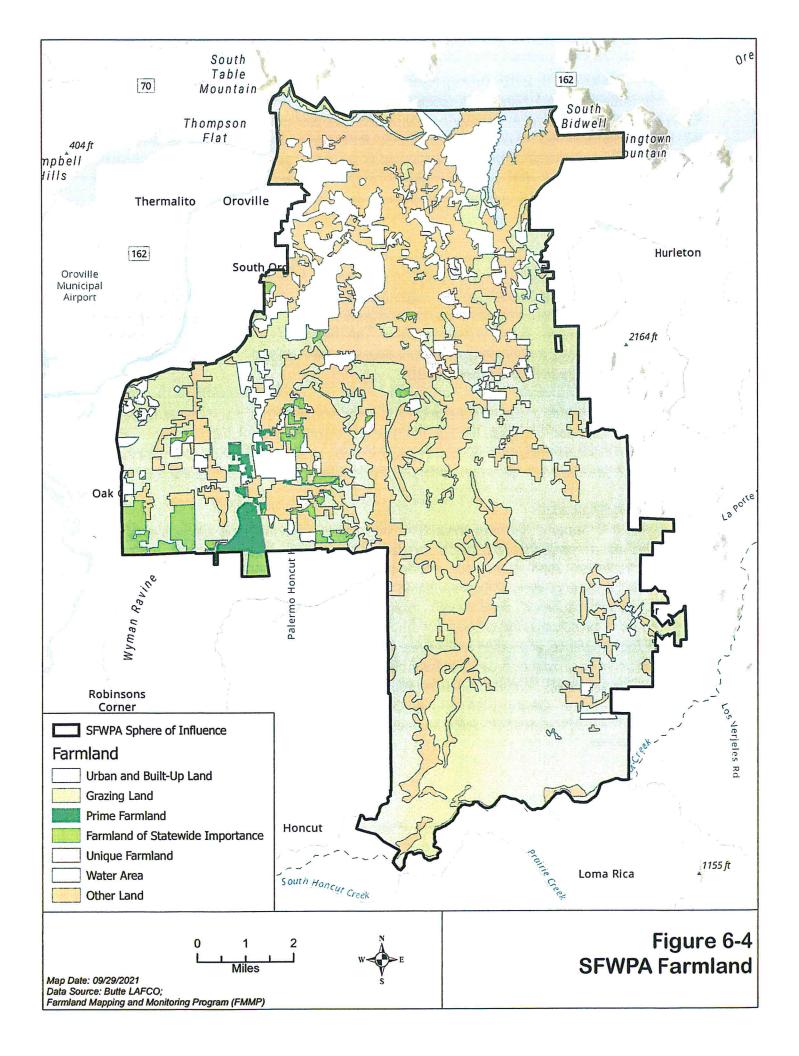
Within the Agency's SOI, there are two tribal reserves, and casinos anchor both reserves. The Tyme Maidu Tribe of Berry-Creek Rancheria holds a 90-acre reserve located off Olive Highway, and it contains the Gold Country Casino. The Concow Maidu Tribe holds the Mooretown Rancheria tribal reserve with lands occupying over 300 acres off Ophir Road, which includes the Feather Falls Casino. Both tribal reserves are within the Agency's Sphere of Influence.

Open Space & Agriculture

Butte LAFCO aims to protect open space and agriculture. For purposes of this MSR analysis, the spatial distribution of agricultural land was derived from the California Department of Conservation. The types of farmlands within the SFWPA boundary and SOI include grazing land, prime farmland, farmland of statewide importance, and unique farmland, as depicted in Figure 6-4 below. SFWPA does provide raw (untreated) irrigation water to approximately 67 customers. The Agency occasionally provides water services to other open space areas (i.e., non-structural) within its boundaries. However, natural areas and parks may be unconnected to the SFWPA system and, therefore, are rainfall or groundwater-dependent. LAFCO has an interest in documenting the conversion of agricultural and open space lands to other land use types, such as residential use. The SFWPA water services do not play a role in these types of land-use conversions.

Butte County General Plan 2030

The Agency's boundaries and Sphere of Influence area are mostly unincorporated and subject to the land-use policies and regulations of Butte County. Most land-use decisions in unincorporated areas are initiated by private property owners and are secured via entitlements and land-use permits from Butte County and other agencies. In addition, the County plans for its future growth through its General Plan, which is a long-term comprehensive framework to guide physical, social, and economic development within the community's planning area. The General Plan contains a land-use map and associated policies that identify the types and intensities of permissible uses in relation to different land-use designations. The Butte County General Plan 2030 was updated and adopted on October 26, 2010 (County Resolution No. 10-152) and



Amended on November 6, 2012 (County Resolution No. 12-124). The Oroville Area Land Use Plan of the Butte County General Plan designates a large portion of the SFWPA boundary and SOI as Agricultural-Residential. This Agricultural-Residential designation allows agricultural uses and single-family dwellings at rural densities. Farms and ranches in this area receive water from various sources, including SFWPA raw irrigation water, rainfall, or groundwater, depending on the specific location. Farms and ranches in the SFWPA boundary and SOI contribute to the agricultural sector's economic prosperity in Butte County by producing a wide variety of farm products.

The County's General Plan Housing Element was subsequently updated on August 26, 2014, through County Resolution No. 14-112. Butte County has opted to update its housing elements every eight years. The 2022 update to the Housing Element will aim to align with their Regional Transportation Plans (which are updated every four years) and the housing plans in the Regional Sustainable Communities. Strategy (See BCAG). The County General Plan and associated Housing Element influence both the type and the rate of growth within the unincorporated areas, such as most of the Agency's boundary and SOI.

Figure 6-5 below provides a map that merges the County's General Plan Land Use Map with the City's General Plan Land Use Map through the use of crosswalks to graphically show the spatial relationships in land use designations. In the adjacent area, outside the Agency boundaries, land is primarily characterized by agriculture and open space with limited rural residential uses.

Oroville General Plan 2030

The Oroville 2030 General Plan was adopted in 2009 and updated in March 2015. The General Plan serves as a comprehensive guide for making decisions about land use, community character, circulation, open space, the environment, and public health and safety. The City General Plan contains guiding principles related to livability, enhanced mobility, a vibrant local economy, natural resources, environment, recreation, community infrastructure, health and safety, and an involved citizenry (COOR, 2015). The General Plan provides the legal foundation for the zoning ordinance and other ordinances. The General Plan recognizes the water and wastewater services provided to City residents by other service providers, including Thermalito Water and Sewer District (TWSD), Lake Oroville Area Public Utility District (LOAPUD), South Feather Water & Power Agency (SFWPA), and California Water Service (Cal Water). The City's General Plan contains numerous policies regarding the provision of water and wastewater municipal services.

6.4.5 Potential Future Development

Future population growth within the local community served by SFWPA is dependent upon zoning and general plan policies and land use designations by the City of Oroville and Butte County. The hilly topography to the east somewhat restricts residential growth in that direction, partially due to the increased cost of installing infrastructure in hilly areas. Because of this topographic constraint, most of the residential growth expected to be serviced by the Agency will likely occur in the areas immediately surrounding the City of Oroville and to the south. An extensive amount of land is designated as low-density residential, as shown in Figure 6-5 below. Butte County is embarking on an update of its current General Plan, which may refine development requirements.

Additionally, new state laws encouraging the construction of accessory dwelling units may promote infill development in some neighborhoods. For purposes of this MSR Analysis, it is assumed that the average annual future growth rate (AAGR) within the Agency boundaries will range from 0.76 percent to 0.88 percent, as listed in Table 6-10 above.

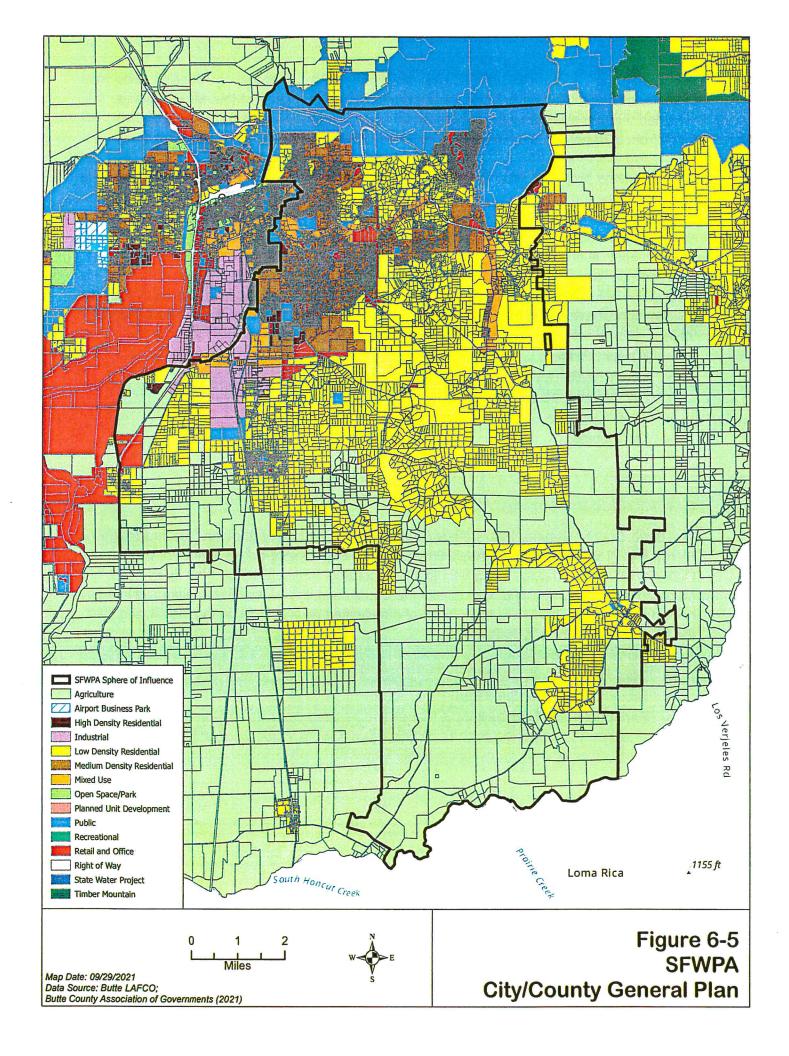
When a private property owner proposes a new development, SFWPA will coordinate with the respective City and County Planning Departments by providing information on the adequacy of its water supply, distribution system, and water rates to meet the area's current and future growth needs. Generally, the Lead Agency (such as the Planning Department for the City/County) will process applications for subdivisions and commercial developments and invite SFWPA to comment on any service-related issues or associated environmental issues. The Agency participates and provides information as requested. (SFWPA, UWMP, 2021g). Several new developments have requested water service from SFWPA over recent years; however, many of these developments have not yet been constructed or approved, including:

- Whisper Ridge;
- Lake Oroville Resort;
- Lake Wyandotte Campus;
- Rio D' Oro, and
- Las Plumas.

6.4.6 Local Hazard Mitigation Plan

The Butte County General Plan's Safety Element [which includes the Local Hazard Mitigation Plan (LHMP)] was adopted by the County Board of Supervisors on November 5, 2019 (Butte OEM, 2019). Butte County, along with five incorporated communities and ten special districts, prepared the 2019 LHMP in order to make the County and its residents less vulnerable to future hazard events. The SFWPA is the subject of a dedicated Appendix (N) in the LHMP, and it lists the following potential local hazards:

- Climate Change;
- Dam Failure;
- Drought and Water Shortage;
- Earthquake and Liquefaction;



- Flood: 100-/500-year;
- Floods: Localized Stormwater;
- Stream Bank Erosion; and
- Wildfire.

It is important to note that the SFWPA has both formal and informal emergency response plans and practices. During past emergencies, the Agency has assisted neighboring districts and other government agencies through mutual aid and other informal practices, as described in the following pages.

Climate Change

Climate change is projected to impact the Northern Central Valley (including Butte County) via the following: temperature increases, reduced precipitation, flooding, reduced agricultural productivity, reduced water supply, wildfire, public health, and heat (Butte Co. OEM, LHMP, 2019). The SFWPA Power Division assets could potentially be at the most risk of climate change impacts, primarily due to future increased wildfires as a result of temperature increase, drying soils, and increased wind. SFWPA power assets are located in thick conifer forests and are generally isolated along the South Fork of the Feather River. Reduced precipitation could lead to reduced water storage which fuels the hydro-power project and could affect local water supply. Both of these could potentially have future economic repercussions for the Agency (Butte Co. OEM, LHMP, 2019).

Dam Failure

During periods of prolonged rainfall and flooding, dam failures can sometimes occur. The primary risk associated with dam failure is high-velocity flooding of properties located downstream of the dam. Additionally, secondary losses could include the loss of the multi-use functions of the facility and associated revenues. SFWPA believes that the requirements set forth with the Federal Energy Regulatory Commission (FERC) and CA DWR Division of Safety of Dams (DSOD) effectively reduce vulnerability to dam failure events. Additionally, SFWPA is well-versed in monitoring, documenting, and maintaining their dam and spillway structures to recognize any conditions of weakness (Butte Co, OEM, 2019). The Lake Oroville dam structure managed by CA DWR also bears risk, as evidenced by the Spillway Emergency in 2017, which caused severe flooding of the Kelly Ridge Power House along with impacting the daily operations at the Miners Ranch Reservoir that feeds the Miners Ranch Treatment Plant. Throughout the event, treatment plant operators monitored the reservoir elevation and treated turbidity issues to ensure that the domestic water service was within water quality requirements (Butte Co, OEM, 2019).

Drought

A lack of rain and snow over an extended period (usually a season or more) can result in drought conditions creating water shortages for some human activities and the environment. A drought's impacts result from the interplay between the natural event (less precipitation than expected) and the demand people place on the water supply. Since SFWPA's water supply is wholly made up of surface water, it is a rain and snow-dependent system. However, SFWPA's reservoirs and other infrastructure create storage and add resiliency to the system. Historically, SFWPA operational infrastructure and water supply have recovered from drought during the intervening wetter years (Butte Co, OEM, 2019). The vulnerability of the SFWPA to drought is Agency-wide.

However, impacts may vary, including a reduction in the water supply available for drinking water, irrigation water, fire suppression, and hydroelectric power generation. Also, drought conditions dry out local vegetation, creating dry fuels and increasing fire danger. As a result, voluntary conservation measures are typically implemented during extended droughts (Butte Co, OEM, 2019).

Earthquake and Liquefaction

The Cleveland Hills fault is the only known active fault in Butte County and is the August 1975 Oroville earthquake site. Due to the proximity of the SFWPA to the Cleveland Hills Fault, the Agency is at risk of an earthquake. These earthquakes can also cause liquefaction within the Agency's service area. Liquefaction is a process whereby soil is temporarily transformed into a fluid formed during intense and prolonged ground shaking. Since earthquakes are regional events, the whole of the Agency, including its water distribution system and its power generation facilities, is at risk of an earthquake (Butte Co. OEM, 2019 and SFWPA UWMP, 2021g).

Flooding

The SFWPA boundary and SOI are traversed by several stream systems, which are at risk to the 1 percent and the 2 percent annual chance floods. The General Plan Safety Element noted that the Oroville area has historically been subject to flooding from various rivers and streams, including the Feather River and its tributaries. Flooding was much more prevalent prior to the construction of the Oroville Dam. The Palermo area is prone to flooding; however, Agency staff do not believe this to be an operational challenge at this point. Storm floodwaters are kept within defined areas by various storm drainage and flood control measures. Localized flooding can cause road closures, pavement deterioration, washouts, landslides/mudslides, debris areas, and downed trees. Heavy rains may produce puddles and ponding around storm drains and low-lying areas; however, these events are short in duration and do not typically cause property damage. Localized flooding can also affect the roads that Agency staff drive to reach Agency facilities. Mudslides in watershed areas scarred by past fires are also a concern. SFWPA staff noted that no Agency facilities are at risk of flooding; however, the slight possibility that SFWPA infrastructure could experience impacts remains (Butte Co. OEM, 2019).

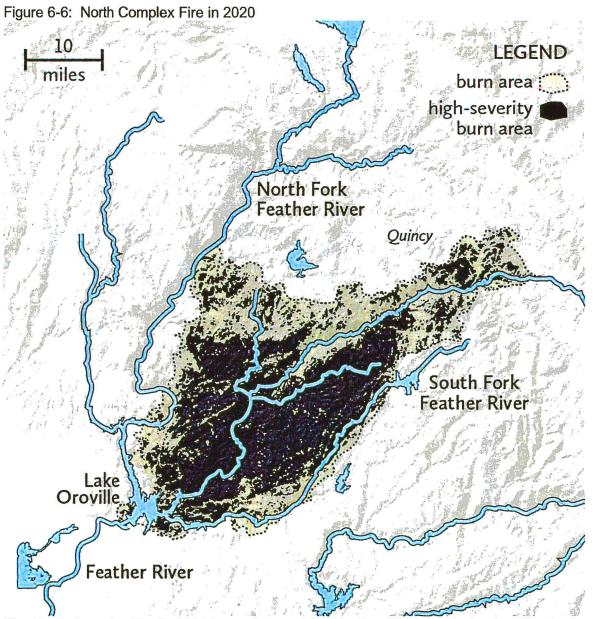
Streambank Erosion

Stream bank erosion occurs on rivers, streams, and other moving waterways, including leveed areas in Butte County. The Oroville Dam and Thermalito Afterbay effectively trap sediment loads. Therefore, the Feather River (the portion located below the dam) has reduced suspended sediment, and this causes the River to become more erosive, transporting mining debris and older alluvium downstream. Erosion is a slow process, taking place over periods of years. However, more significant erosion occurs during periods of high stream flow and during storm and wind events when wave action contributes to the extent and speed of streambank erosion. Erosion has occurred in areas of concern by the SFWPA in recent years. For example, in 2017 and 2019, winter storms exacerbated streambank erosion along the Miners Ranch Canal and the Canal Access Road. (Butte Co, OEM, 2019). Additionally, wildfires can leave local hillsides prone to burn scars. Subsequent heavy winter storms can result in hillside erosion and debris flow issues. SFWPA's canals and water conveyance system are at risk to streambank erosion (Butte Co, OEM, 2019).

Wildfire Risk

The vast distance and topography of Agency asset locations have resulted in severe threats due to wildfire events (Ponderosa, Wall, Bangor, and Lumpkin Fires). CAL FIRE has defined areas of greater wildfire risk through Fire Hazard Severity Zones (FHSZ). The Agency lies in multiple zones, from Non-wildland/Non-Urban to Very High FHSZ. With the exception of the Kelly Powerhouse, the Power Division's hydro assets are located in the very high-hazard zone. Additionally, the hillsides surrounding the Miners Ranch Canal are also highly vulnerable to wildfire risks, which then cause soil erosion issues during the winter months. In the past, damage to SFWPA assets from wildfire has been limited to melted communications equipment during the Ponderosa Fire. Although the Agency was not directly impacted by the Camp Fire, it did engage in Mutual Aid MOU specified assistance with the Paradise Irrigation District by providing equipment and personnel during the initial recovery efforts (Butte Co, OEM, 2019). During the September 2020 North Complex Fire, several residents in the SFWPA boundary area were evacuated (SFWPA, WSCP, 2021d).

Wildfires can have devastating effects on watersheds through loss of vegetation and soil erosion, which may impact the County and Agency by changing runoff patterns, increasing sedimentation, reducing natural and reservoir water storage capacity, and degrading water quality. Fires may result in casualties and can destroy buildings and infrastructure. All Agency assets are either at High or Very High risk from the wildland fire hazard. Agency efforts to reduce the likelihood of a wildland event include daily ditch-tending along with canal infrastructure, contracting fuel reduction work with the Butte County Sheriff Work Program, and environmental companies that offer goat grazing (Butte Co, OEM, 2019).



The North Complex Fire in 2020 burned around the Feather River and Lake Oroville, the largest contributor to the State Water Project. Map provided courtesy of: https://sierranevada.ca.gov/2020-megafires-create-risks-for-californias-water-supply/

6.4.7 Determinations for Growth and Population

Based on the information included in Sections 6.4 above, the following written determinations make statements involving each service factor that the Commission must consider as part of a municipal service review. The determinations listed below in Table 6-11 are based upon the data presented and are recommended to the Commission for consideration. The Commission's final MSR determinations will be part of a Resolution that the Commission formally adopts during a public meeting.

		ON: GROWTH AND POPULATION
	ONS FOR THE AFFEC	
Number	Indicator	Determination
SFWPA-Pop-1	Existing Boundary	SFWPA's 33,718-acre boundary area is located mainly in the unincorporated County of Butte. A small portion of the City of Oroville is within the SFWPA boundary. The boundary area has an irregular shape, and 19 non-contiguous and isolated boundary pockets are located east of the sphere of influence. The boundary includes 11,127 assessor parcels.
SFWPA-Pop-2	Existing Sphere of Influence	The Agency's SOI was last affirmed in the 2011 MSR/SOI for the Agency. The Agency's SOI encompasses 64,125 acres and includes 11,853 parcels. Agency staff believes the Sphere of Influence boundary is adequate for projected future needs. However, in its 2006/07 MSR, SFWPA noted that their Sphere of Influence boundary should be co-terminus with their "place-of-use" boundary as designated by the State Water Resources Control Board to best accommodate future needs regarding the approved area for distribution of water per existing water rights.
SFWPA-Pop-3	Extra-territorial Services	LAFCO's 2006 MSR (by Kleinschmidt) noted that SFWPA served water to six customers outside its boundaries via surplus water agreements that were considered for renewal annually. These six customers received irrigation water (not potable). However, there are no current surplus water agreements for these six customers. Otherwise, the SFWPA has not provided extra-territorial services outside its District boundary.

A STANDARD OF THE RESIDENCE OF THE SECOND	MSR DETERMINATIONS FOR THE AFFEC	ON: GROWTH AND POPULATION
Number	Indicator	Determination
SFWPA-Pop-4	Projected population in years 2020 to 2045.	The addition of 4,117 to 5,075 more people to the SFWPA boundary area by the year 2045 is projected as the area contains under-developed areas that could potentially be annexed to the City and/or made available for more intensive residential development. Areas located near the City of Oroville have a moderate probability of developing over the next twenty years since the City continues to grow and expand. This represents an average annual growth rate of less than one percent per year. This could bring the total population within the Agency's service area to approximately 29,375 persons by the year 2045.
SFWPA-Pop-5	District boundaries contain a sufficient land area to accommodate projected growth.	Currently, the Agency's boundary area supports an average of 0.72 persons per acre, which is considered low population density. The County General Plan suggests that growth may occur within the SFWPA boundary. SFWPA boundaries contain a sufficient land area to accommodate projected growth.
SFWPA-Pop-6	Effect that the District's service provision will have on open space and agricultural lands.	SFWPA's boundary and SOI include grazing land, prime farmland, farmland of statewide importance, and unique farmland. SFWPA provides raw (untreated) irrigation water to approximately 67 customers, thereby supporting agriculture in the community. The Agency occasionally provides water services to other open space areas (i.e., non-structural) within its boundaries. However, natural areas and parks may be unconnected to the SFWPA system and therefore be rainfall or groundwater-dependent. Therefore, water service generally has minimal effect on agricultural land and open space.

6.5 Disadvantaged Unincorporated Communities

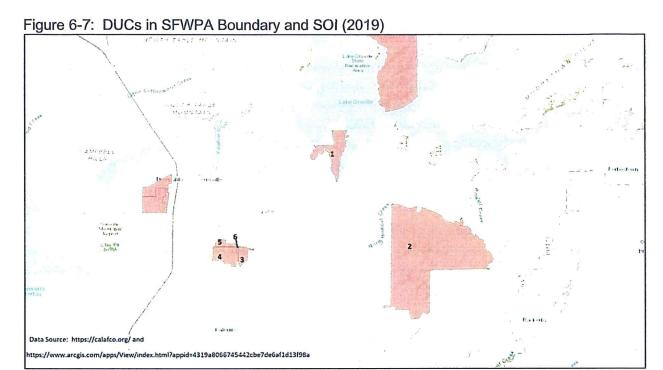
Disadvantage Unincorporated Communities (DUCs) are the topic of a mandated LAFCO MSR determination. DUCs are a census "block" where the annual median household income (MHI) is less than 80 percent of the statewide MHI. California's annual median household income (MHI) in 2019 was \$75,235 (U.S. Census, 2021). Eighty percent of the statewide MHI (2019) equals \$60,188.00, the threshold used to determine which geographic areas qualify for classification as disadvantaged communities. The year 2019 is utilized as the baseline year because it corresponds to the CALAFCO map. Please note that since Oroville is an incorporated City, there are no DUCs within its boundaries.

DUCs are defined as areas with the following features:

Inhabited with ten or more homes adjacent or in close proximity to one another; and

- Either within a city's SOI, islands within a city boundary, or geographically isolated and have existed for more than 50 years; and
- The median household income is 80 percent or less than the statewide median household income.

As shown in Figure 6-7, there are six census "blocks" with median household income below the state threshold within the SFWPA boundary and SOI. These areas are classified as DUC's.



The six census blocks are marked with numbers 1-6 in Figure 6-7 above, and these numbers correspond to those listed in Table 6-12 below. Table 6-12 provides data for the year 2019 because that relates to the data CALFCO utilized to create the above map.

Table	6-12: DUCs in Census Blocks (2	2019)	
# on Map	Census Block #	2019 MHI Threshold	Block MHI (2019)
1	Block Group 2, Census Tract 26.02	\$60,188	\$47,426
2	Block Group 3, Census Tract 24	\$60,188	\$45,850
3	Block Group 4, Census Tract 31	\$60,188	\$47,961
4	Block Group 2, Census Tract 30.02	\$60,188	\$46,964
5	Block Group 3, Census Tract 30.02	\$60,188	\$47,500
6	Block Group 1, Census Tract 30.01	\$60,188	\$29,792

Data Source: 2019 data from CALAFCO Statewide DUC Map using American Community Survey 5-Year Data (2015-19) Updated Mar 2022.

Please note that newer data based on the 2020 U.S. Census is slowly being released. The statewide annual median household income (MHI) in California for 2022 is \$88,930 (ESRI, 2022). Eighty percent of the statewide MHI (2022) equals \$71,144.00. The 2020 U.S. Census also created spatial changes such that the geographic layout of census tracts and census blocks may have significantly expanded or contracted. Based on preliminary information from ESRI, it appears that a much larger area of the Oroville region will soon be classified as DUCs or DACs. GIS layers for newly shaped census tracts and census blocks are not yet readily available in a useful format from ESRI.

Within the SFWPA boundary, water service is provided to the DUCs by the Agency. For example, LAFCO approved the annexation of the unincorporated community of Palermo in September 2022. The Palmero annexation consists of approximately 550 parcels added to the SFWPA. The annexation facilitates the Palermo Clean Water Consolidation Project, a partnership between the County of Butte and South Feather Water and Power Agency, to provide safe, clean drinking water to the residents of Palermo who have historically depended on private wells for domestic water.

Outside the SFWPA boundary, individual privately-owned wells provide groundwater as needed. Currently, the Agency is not involved in any new potential consolidation efforts with existing small water systems that supply water in disadvantaged communities within its service area (personal communication, R. Mosley, 7/11/22).

Wastewater collection services are available from the Lake Oroville Area Public Utility District (LOAPUD) to areas within its service area. The Sewerage Commission – Oroville Area (SC-OR) provides wastewater treatment to LOAPUD customers. Outlying areas rely on septic tanks for wastewater service. Fire protection services are provided by the City of Oroville, only to those parcels located within the City. Most of the parcels within the SFWPA boundary and SOI to the north, west, and east (to some extent) are provided fire protection by the Butte County Fire Department (BCFD)/CALFIRE. Butte County Fire/CALFIRE Department provides services to approximately 1,550 square miles of Butte County and approximately 102,000 unincorporated residents from 42 fire stations. CALFIRE also contracts with the COOR⁴ to provide fire protection services to the community. Additionally, CAL Fire is the lead fire protection agency for wildland fires in the SOI within State Responsibility Areas (SRAs).

All SFWPA boundary and SOI areas receive essential municipal services of water, wastewater, and structural fire protection (or acceptable private alternatives). Therefore, no DUCs within the existing SFWPA boundary or SOI lack essential public services, and no public health or safety issues have been identified.

6. South Feather Water and Power Agency

⁴ In the past, the El Medio Fire Protection District (EMFPD) provided services to the mostly urbanized unincorporated territory immediately south of and adjacent to the City of Oroville. EMFPD closed in December 2020. Since that time, Oroville Fire Department and CAL FIRE have taken over coverage for their respective territory within the bounds of the district.

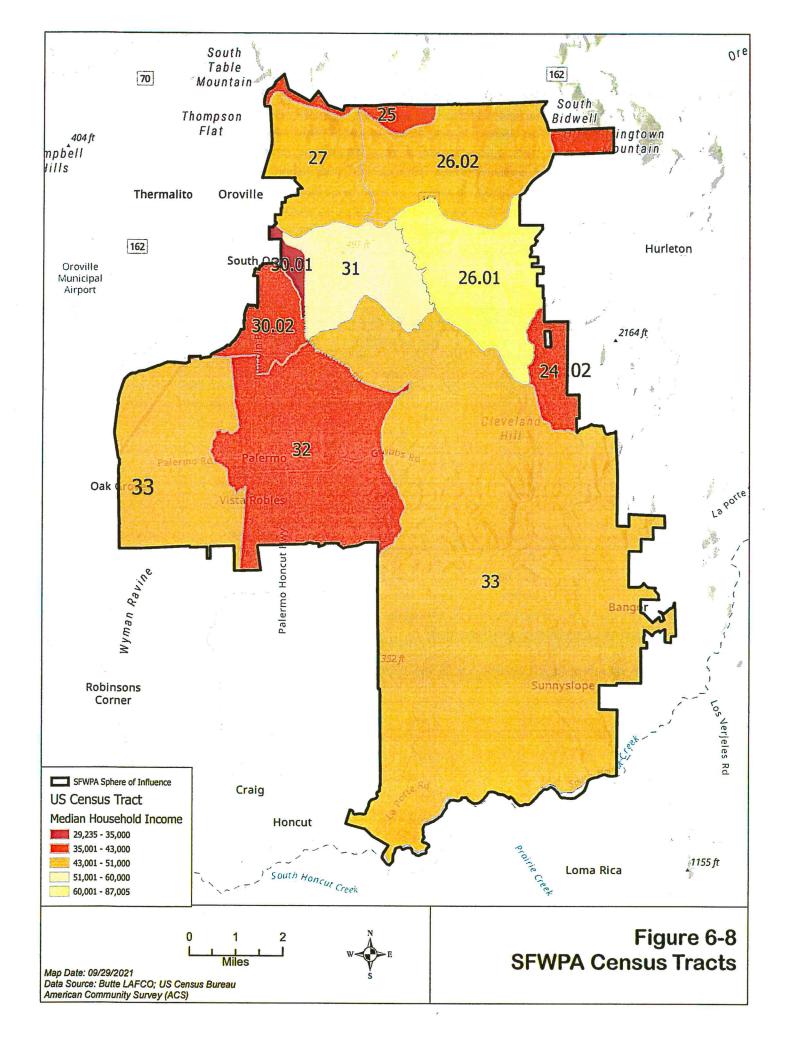
Disadvantaged Tracts for Grant Applications

Grant funds are sometimes available from state and federal sources for water infrastructure projects. Typically, these potential grant funders consider service to disadvantaged areas based on U.S. Census Tracts. Therefore, Census Tracts are described herein, based on data collected from the 2019 American Community Survey 5-Year Estimates. A census tract is a geographic area defined by the United States Census Bureau. The geographic size of census tracts varies widely depending on the population density; a census tract typically has around 4,000 residents but can range from 1,200 to 8,000. There are twelve (12) census tracts within the SFWPA sphere of influence, as shown in Figure 6-8. Eleven of these Census Tracts have MHIs below the \$60,188 threshold, as listed in Table 6-13 below. Census Tract 26.01 has a MHI that exceeds the threshold (\$66,750).

Census Tract	Population (2019)	Square Miles	Median Household Income
24.02	3,555	n/a	\$40,071
25	5,353	54.94	\$37,054
26.01	2,508	7.78	\$66,750
26.02	3,661	9.93	\$48,090
27	5,965	5.14	\$49,029
29	3,310	2.42	\$48,897
30.01	3,375	0.89	\$29,235
30.02	3,587	6.62	\$41,377
31	4,671	4.75	\$52,258
32	4,261	15.31	\$40,318
33	5,246	119.58	\$47,411
37	4,884	48.42	\$32,401

Source: US Census, 2019 American Community Survey 5-Year Estimates and https://tigerweb.geo.census.gov/tigerweb/

The eleven disadvantaged census tracts are provided public services from numerous local and state agencies.



6.5.1 Determinations for Disadvantaged Unincorporated Communities

Based on the information in Section 6.5 above, the following written determinations make statements involving each service factor that the Commission must consider as part of a municipal service review. The determinations listed below in Table 6-14 are based upon the data presented and are recommended to the Commission for consideration. The Commission's final MSR determinations will be part of a Resolution the Commission formally adopts during a public meeting.

Table 6-14:		ION AND CHARACTERISTICS OF ANY
DISADVANT	AGED UNINCORPORATED COMM	UNITIES WITHIN OR CONTIGUOUS TO
THE SPHER	E OF INFLUENCE	
Number	Indicator	Determination
SFWPA- DUC-1	The median household income is identified. The DUC threshold MHI (80 percent of the statewide MHI) is clearly stated. The MHI in the Agency's boundary is described.	There are six census "blocks" with median household income below the state threshold (\$60,188.00) for 2019 within the SFWPA boundary and SOI. These areas are classified as DUC's.
SFWPA- DUC-2	Potential DUCs are considered. The provision of adequate water, wastewater, and structural fire protection services to DUCs is considered.	Due to the identified DUCs receiving essential services of water, wastewater, and structural fire protection, there are not any communities within the existing SFWPA boundary or SOI that lack public services (or a private alternative), and no health or safety issues have been identified.

6.6 Public Services

6.6.1 Service Overview

This Section evaluates the efficiencies of services the South Feather Water and Power Agency provides and the associated infrastructure needs, especially as they relate to current and future users. Infrastructure needs and deficiencies are evaluated in terms of supply, capacity, condition of facilities, and service quality with correlations to operational, capital improvement, and finance plans. In addition, this section addresses the provision of the public services provided directly by the SFWPA to residents within its boundaries as follows:

- Water Supply, Conservation, Treatment, and Distribution;
- Hydro-electric Power Generation; and
- Recreation.

Information was derived from the SFWPA's Urban Water Management Plan (UWMP) 2020, which was written to satisfy the requirements of the California Urban Water Management Planning Act and to inform the public, and local and state agencies of the Agency's water supply availability,

exposure to drought, conservation efforts, and plans for future water supply (SFWPA, UWMP, 2021g). Other information sources, such as GIS data, the State Water Board, and Butte County, were also utilized.

South Feather Water and Power Agency provides the communities of Palermo, Bangor, and eastern Oroville with quality treated drinking water for domestic customers, serving a total of 6,900 households. Additionally, SFWPA provides raw (untreated) water to 500 irrigation customers, who likely utilize it for agricultural purposes (SFWPA, UWMP, 2021g). Additionally, SFWPA provides hydroelectric power and recreation services, as summarized in Table 6-15 below.

Table 6-15: Numb	er of Customers for Key Municipal Services
Service	Number of Customers in 2021
Domestic Water	Miners Ranch Treatment Plant: 6,909 connections ¹
	Bangor Water Treatment Plant: 21 customers (average in 2018) ² .
Raw Water	500 connections
Hydroelectric	One (1) wholesale customer
Recreation	Open to the general public
Data Sources: 1:https://gispublic.vaa7db1443598964	vaterboards.ca.gov/portal/apps/webappviewer/index.html?id=272351 7a86e6d3ad8
2: Butte Co. OEM,	LHMP, 2019

6.6.2 Water Service

6.6.2.1 Existing Water Supply, Conservation, and Treatment.

The SFWPA provides both treated domestic water and untreated irrigation water. The existing water supply is derived from surface water diverted from the upper watershed of the South Fork of the Feather River and the upper portion of the Slate Creek watershed. These watersheds are described in detail in Appendix I. This water is transported through a series of dams, canals, and tunnels.

Watershed

SFWPA's water supplies depend on precipitation that falls into the forested watershed and flows into creeks and the Feather River. This process is intimately connected to the water cycle described in Chapter 2, Introduction, and Appendix I. The upper watershed is ruggedly mountainous and bisected by deep canyons in the eastern third of the watershed. The watershed from which SFWPA's supply originates is owned or managed by several governmental and private entities. The United States Forest Service (USFS) manages the Plumas National Forest and is the single largest land owner within the watershed. Private land owners of the forested watershed include the Sierra Pacific Industries, Chy Corporation, and Sillar Brothers (SFWPA, UWMP, 2021g). This watershed falls within the jurisdictions of four adjacent counties: Plumas County, Butte County, Sierra County, and Yuba County. Almost half (49,580 acres or 49.2%) of the watershed is located within the unincorporated boundaries of Plumas County. Approximately

28,440 acres of the watershed (28.2%) are located within the unincorporated boundaries of Butte County. 19 percent (19,160 acres) of the watershed is located within Sierra County. A small portion of the watershed (3,560 acres or 3.5 percent) is located within Yuba County (SFWA, UWMP, 2021g). SFWPA's South Fork Feather River/Slate Creek watershed covers 100,814 acres or 158 square miles of the Sierra Nevada Mountain Range. Principal tributaries include:

- Lost Creek (a tributary of the South Fork Feather River) is a sub-watershed approximately 19,200 acres (30.0 square miles) in size, which represents 19.0 percent of the total South Fork Feather River/Slate Creek watershed area (SFWA, UWMP, 2021g).
- Upper portion of Slate Creek (a tributary of the North Fork Yuba River) is a sub-watershed, approximately 31,600 acres (49.4 square miles), or 31.4 percent of the combined South Fork Feather River/Slate Creek watershed area.

Treated Domestic Water Services

SFWPA serves treated domestic water to 6,900 households located in the communities of Palermo, Bangor, and eastern Oroville. Surface water from the South Fork Feather River and Slate Creek is transported to Miner's Ranch Reservoir, the system's terminal reservoir. SFWPA maintains two water treatment plants that use a combination of filtration and chlorination to remove/mitigate contaminants. After the treatment process, water is distributed through pipelines to one of the four water storage facilities and then for consumption by SFWPA's customers. A total of 141 miles of pipelines transport the water, as shown in Figure 6-9, along the process from water collection, treatment to consumption (SFWPA, UWMP, 2021g). Miners Ranch Water Treatment Plant is water system No. CA0410006, located at 234 Kelly Ridge Road, Oroville, CA 95965, and serves 6,909 connections. This treatment plant started activities on 03-22-1979. It serves 6,714 residential accounts and 194 commercial accounts (State Water Board, 2021). The Bangor Water Treatment plant is water system No. CA0410012, located at 7454 Oro-Bangor Highway. Oroville, CA, 95965, and serves one commercial account and 21 rural residential accounts (State Water Board, 2021). The number of customers accessing the Bangor Water Treatment Plant can sometimes vary. For example, it served a high of 26 customers in July 2016 (Data Source: Butte Co. OEM, LHMP, 2019).

Irrigation Customers

SFWPA provides raw (untreated) water to over 500 customers for irrigation purposes. Much of this water is utilized for local farms and ranches. Raw water is transported to customers through 110 miles of primarily open earthen canals/ditches organized into four lines, as listed in Table 6-16 below. Most of the demand for this water occurs during the dry months of summer and fall.

Table 6-16: Irrigation V	Vater Customers	
Name of SFWPA	Peak Number of Customers	Average Number of
Water Line		Customers in 2018
Community Line	78 Customers in September 2015	70
Forbestown Ditch	68 Customers in August 2016	36
Bangor Canal	279 Customers in July 2018	252
Palermo Canal	235 Customers in August 2017	157
Source: Butte Co. OEM,	LHMP, 2019	

6.6.2.2 Water Supply Planning

Protecting water quality and maintaining an adequate water supply are critical for the future customers of the SFWPA. Given this importance, the SFWPA and other regional and statewide agencies prepare a range of water resource management plans as described in the following paragraphs.

Urban Water Management Plan. Urban Water Management Plans (UWMPs) are prepared by California's urban water suppliers to support their long-term resource planning and ensure adequate water supplies are available to meet existing and future water demands. The Urban Water Management Planning Act (CWC §10610 – 10656 supplemented by CWC §10608 et seq) specifies the requirements for UWMPs. The SFWPA submitted its 2020 UWMP to the California Department of Water Resources (CA DWR) on July 21, 2021. This UWMP describes SFWPA's existing water facilities, system water use, baselines, water system supplies, contingency plan, and water demand management measures. (SFWPA, UWMP, 2021g).

Northern Sacramento Valley Integrated Regional Water Management Plan. The SFWPA has participated in developing the Northern Sacramento Valley Integrated Regional Water Management Plan (NSV-IRWMP) (SFWPA, 2021a). Six counties (Butte, Colusa, Glenn, Shasta. Sutter, and Tehama) along with associated water districts worked together for many years to lay the foundation for an integrated regional water management plan to address water-related issues such as economic health and vitality; water supply reliability; flood, stormwater, and flood management; water quality improvements; and ecosystem protection and enhancement. The NSV-IRWMP aims to address water-related issues and offer solutions that can provide multiple benefits to the region. The Northern Sacramento Valley IRMWP was originally approved by the California Department of Water Resources on July 24, 2014. The Plan was subsequently updated on March 2, 2020, to comply with new DWR requirements as detailed on their website at: https://nsvwaterplan.org/. It is recommended that SFWPA continue to monitor and participate in future efforts to update the Integrated Regional Water Management Plan and, when appropriate. seek funding opportunities for conjunctive use and water management improvements. The intent of this recommendation is to improve regional water management through enhanced coordination and cooperation among agencies, local entities, and other stakeholders. This coordination and communication will foster the development of consistent local policies and objectives while protecting local uses and the regional environment.

Figure 6-9: SFWPA Distribution of Water Pipes From Local Hazard Mitigation Plan, Annex N

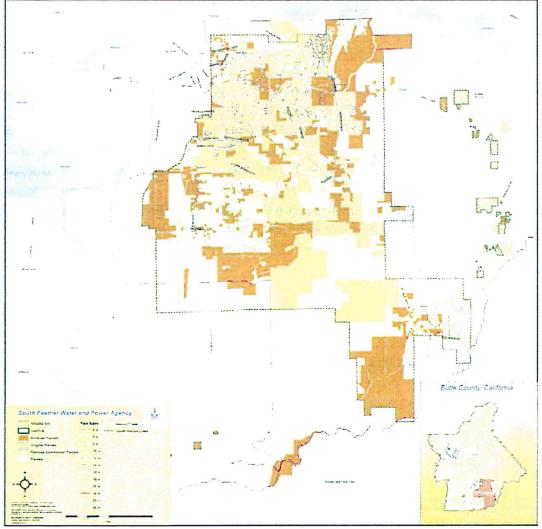


Figure N-1 South Feather Water and Power Agency

Source: SFWP.1

Source (Butte OEM, 2019).

2020 Water Shortage Contingency Plan. SFWPA adopted its 2020 Water Shortage Contingency Plan (WSCP) on June 22, 2021, through Resolution No. 21-06-02 to comply with California Water Code Section 10632, which requires that every urban water supplier prepare and adopt a WSCP as part of its UWMP (SFWPA, WSCP, 2021d). The section below on Water Supply Storage & Treatment describes the WSCP in more detail.

Sustainable Groundwater Management Act. The Sustainable Groundwater Management Act (SGMA) is a state law that authorizes local Groundwater Sustainability Agencies to manage groundwater at the local level through the development and implementation of Groundwater Sustainability Plans. Decisions about groundwater sustainability are made locally through public involvement. The Wyandotte Creek Subbasin is a portion of the larger Sacramento Valley Groundwater Basin covering approximately 59,382 acres. An SFWPA staff member was appointed to the Wyandotte Creek Advisory Committee in October 2020 and is actively participating in the groundwater sustainability plan development. Additional information is available at: wyandottecreekgsa.com. Please note that SFWPA does not utilize groundwater. However, within the SFWPA SOI, some residents may utilize private wells to access groundwater. Therefore, the SFWPA supports collaborative decision-making efforts for local groundwater resources.

Regulatory Compliance

The State Water Resources Control Board – Division of Drinking (SWRCB-DODW) has several regulations (detailed in Appendix H) which the SFWPA routinely complies with as follows:

- SFWPA has an Environmental Laboratory Accreditation Program Certificate No. 1545, which was updated on 7-1-2019 (SFWPA, 2021a). SFWPA's Environmental Laboratory Accreditation inspection was last conducted in 2015.
- SFWPA submits annual reports to the SWRCB-DODW.
- The SWRCB-DODW conducts inspections every 1-3 years, depending on their availability. (SFWPA, 2021a).

Permits: Adopted Decisions and Orders from the State Water Board

The State Water Resources Board has issued several orders related to the South Feather Water and Power Agency, Miners Ranch Water Treatment Plant, as listed below:

- Order No. R5-2018-0055, Rescission of Waste Discharge Requirements R5-2010-0059 and Time Schedule Order R5-2010-0060-01, Adopted on 31 May 2018
- Order No. R5-2010-0060-01, Time Schedule Order as amended by Order R5-2015-0099, Amended on 31 July 2015 - Rescinded by R5-2018-0055
- Order No. R5-2015-0099, Amending Time Schedule Order/NPDES Permit No. CA0083143, Adopted on 31 July 2015
- Order No. R5-2010-0060, Time Schedule Order/NPDES Permit No. CA0083143, Adopted on 27 May 2010 - Amended by R5-2010-0060-01
- Order No. R5-2010-0059, Waste Discharge Requirements/Monitoring & Reporting Program/NPDES Permit No. CA0083143, Adopted on 27 May 2010 - Rescinded by R5-2018-0055

 Order No. R5-2005-0011, Waste Discharge Requirements/Monitoring & Reporting Program/NPDES Permit No. CA0083143, Adopted on 27 January 2005 Data Source:

https://www.waterboards.ca.gov/centralvalley/board_decisions/adopted_orders/

<u>Water Rights</u> In California, there are several different types water rights, consistent with the basic principles of California Water Law. Appendix F provides a basic primer on California Water Law, the relationship between certain water rights, and the ability and procedures for making water transfers. A water district, such as SFWPA, must have a valid water right in order to divert, use, and/or transfer water.

The water rights that SFWPA holds today began in the past with water diverted by the South Feather Land and Water Company and the Palermo Land and Water Company during the gold rush and post-gold rush periods. These historic water rights were developed before 1914, a seminal year in water rights law. The Companies' water rights were assumed by the Oroville-Wyandotte Irrigation District and subsequently by the South Feather Water and Power Agency (SFWPA, UWMP 2021g). Table 6-17 summarizes the water rights and associated storage available to the SFWPA. Four of the permits were issued in the 1920s, and two permits were issued in 1950.

The water sources originate in Butte, Plumas, and Yuba counties. SFWPA's appropriated water rights on the South Fork of the Feather River and its tributaries (291,312 acre-feet) exceed the actual yield of said watershed. Although the yield from the watershed declines in dry years, these water rights do not change.

In summary, the SFWPA has pre-1914 water rights derived from the South Feather Land and Water Company. Its post-1914 water rights are from the Palermo Land and Water Company, including the right to appropriate available water from the South Fork Feather River and its tributaries (Stiffel, 2016). The California Railroad Commission issued an order in 1923 regarding the provision of water to customers previously served by the private water companies (SFLWC and PLWC) and others who applied for water between the years 1923 and 1933 (Stiffel, 2016). It is these so-called "Railroad Commission" parcels that are scattered in the eastern foothills primarily and are islands of service territory.

Table 6-17: SFWPA Water Rights

ANN	M024368 SF15 I		Jan 1 to Dec 31						Pinkard Creek	Lower Fbs Ditch	Irrigation/Stock	Pre-1914	S022068
Alla	MO20258 Lost Ca		Jan 1 to Dec 31						Lost Creek		Irrigation/Stock		S022067
N/A	Res, SF 12		Jan 1 to Dec 31						Lost Creek		Power	17	10941
	Si II	12/28/1050	Jan 1 to Dec 31	100 cfs					SFFR		Power	A014112-11517	10941
Sly	M020260, SC Res,	9/20/1950	Jan 1 to Dec 31	300 cfs		Jan 1 to Jul 1	35,000	Sly, Slate	Slate Creek		Power	A013956 - 11515	10940
LGV, SC, Lost	SF 2 Flow meter model FST020		Jan 1 to Dec 31	100 cfs		Nov 1 to Jul 1	40,000	LGV, Sly, Lost	Lost Creek		Power	A013676 - 11514	10939
	M020257 Little Grass	4/7/1950		200 cfs		Nov 1 to Jul 1	77,300	LGV	SFFR		Power	W013070-11314	10202
Reservoir Spill Info for Storage	Gage ID No.	Priority Date	Time of Use	Diversion Amount	Diversion Point	Time of Use	Storage Amount	Storage Facility	Source Water	Place of Use	Uses	Application #	License #
	SF25		Apr 1 to Oct 15		Fbs Ditch				Total Cicon				
NA	M024371, MRTP,	8/12/1922	***************************************	excess of allowed					lost Crack	Bangor Canal	Irrigation	A002979	12/1
			Jan 1 to Dec 31	185 cfs	LCD				Lost Creek	MRTP	Domestic		1074
. 0171 -00			Apr 1 to Jun 1	6,039 af total	Sly				Lost Creek	Sly, Lost, Pond	Recreation		
Slv Toet	M02056 SE11	3/6/1922		50 cfs	2				Sucker Run	Palermo Canal	Irrigation	A002778	2492
						25,000 af Oct 1 to Jun 1	25,000 af	Sly	Lost Creek	MRTP	Domestic		
1001	Creek Res. SF 12									Lost, Pond	Recreation		
	MOSOSER Lost	12/17/1920				Oct 1 to Jul 1	5,000 af	Lost Creek	Lost Creek	Bangor Canal	Irrigation	A002142	1268
										MRTP	Domestic		
	rsT020		Apr 1 to Jul 1	36	LCD, Fbs Dch, Wdf Pen				SFFR	LGV, Sly, Lost, Pond	Recreation		
LGV. SC. Lost	M020257 Little Grass, SF 2 Flow	2/2/1920	a.	200 cfs	SFDD, Fbs Dch, Wdlf Pen				SFFR	Bangor Canal	Irrigation	A001651	1267
STATE						109,012 af Oct 1 to Jul 1	109,012 af	LGV	SFFR	MRTP	Domestic		
Reservoir Spi Info (Hydrographer)	Gage ID No.* (Hydrographor)	Priority Date	Time of Use	Diversion Amount	Diversion Point	Storage Period	Storage Amount	Storage Facility	Source Water	Pla	Uses (only fill in data for ea use permitted)	Application #	Permit#
				A SOLON STREET, SALES OF STREET, SALES OF								The second secon	

Water Supply, Storage & Treatment

The water source for the SFWPA is surface water⁵, specifically, the South Feather River and the North Fork Yuba River and several associated tributaries, as listed in Table 6-17 above. In the upper part of the watershed, runoff from rain and snow fills the SFWPA's reservoirs. Water supply data is gathered from the gaging stations throughout the watershed, which is audited by the United States Geological Survey (USGS) annually. The data is published in real-time for regulatory agencies and public review. The Agency retains a hydrographer trained and experienced in water measurement (SFWPA, UWMP, 2021g).

Water supply reliability calculations for the Agency's surface water sources are shown in Table 6-18 below. These are the raw water supplies currently available to SFWPA for the given water year scenario types. Based on the Agency's average annual watershed production of 254,015 acrefeet (81,968 to 82,783 Million Gallons (MG)) and its ability to store 165,016 acrefeet (53,779 MG), SFWPA believes that its sources of developed water supply will continue to more than adequately meet the current and the foreseeable demand through 2045 (SFWPA, UWMP, 2021g).

Table 6-18: Basis of Water Year Da	Table 6-18: Basis of Water Year Data (Reliability Assessment)							
Year Type	Base Year	Volume Available (MG)	Percent of Average Supply					
Average Year	1966	81,968	100%					
Single Dry Year	1977	16,516	20%					
Consecutive Dry Years 1st Year	1931	19,896	24%					
Consecutive Dry Years 2nd Year	1932	66,375	81%					
Consecutive Dry Years 3rd Year	1933	32,239	39%					
Consecutive Dry Years 4th Year	1934	36,402	44%					
Consecutive Dry Years 5th Year	1935	77,069	94%					
Data Source: SFWPA, UWMP, 2021g								

During a Single Dry Year type of water year, SFWPA estimates that it will have 16,516 MG of water supply available that year. However, total water demand is projected to be much less, at 3,208 MG for a Single Dry Year (SFWPA UWMP, 2021g). This indicates that SFWPA will have sufficient water supplies during a Single Dry Year, as shown in Figure 6-10 below.

⁵ SFWPA does not utilize groundwater. The Butte County Water & Resource Conservation Department issues groundwater related reports.

Figure 6 -10: Single Dry Year Supply and Demand

18,000
16,000
14,000
12,000
10,000
10,000
2,000
0
2025
2030
2035
2040
2045

Supply totals*

Demand totals*

Source: SFWPA UWMP, 2021g

If the SFWPA has an under-utilized water supply, it has the option to sell water. Historical water transfers originating from SFWPA have been single-year transfers to users south of the Sacramento-San Joaquin Delta; not multi-year transfers that would unduly impact the Delta long-term or create an out-of-the-region dependency on the SFWPA watershed (SFWPA, UWMP, 2021g).

Raw irrigation water and treated water are supplied to South Feather Water and Power Agency customers in Butte County and North Yuba Water District in Yuba County (SFWPA, UWMP, 2021g). The Agency does not purchase water from other agencies (SFWPA, 2021a). Factors that influence the Agency's ability to supply and deliver water to its customers include the functionality of surface water storage, canal conveyance status, and the status of the water treatment plant (SFWPA, 2021a).

Water Demand Details

In Butte County, the average per capita water demand is 252 gallons per capita per day (NSV-IRWMP, 2020). However, in SFWPA, per capita daily demand is estimated to be larger, at 323 gallons (SFWPA, UWMP, 2021g). There are several potential explanations about why daily water demand is higher in SFWPA's area:

- SFWPA provides raw water to agricultural areas, and this is included in its gross water demand;
- SFWPA's UWMP estimated its population at 16,770 persons, which may be a low estimate. However, suppose the larger population estimate listed in Table 6-18 of 24,300 persons is utilized. In that case, average per capita water demand drops to 222 gallons per capita per day, which is lower than that of Butte County as a whole.

The existing water demand to serve all SFWPA customers in the year 2020 is measured as 2,944 million gallons, as shown in Table 6-19 below.

Table 6-19: Retail Demands for Potable and Non-Potable Water						
Use Type	20	2020 Actual				
Drop Down List	Level of Treatment When Delivered	Volume ²				
Single-Family	Drinking Water	1,427				
Multi-Family	Drinking Water	110				
Commercial	Drinking Water	148				
Industrial	Drinking Water	0				
Institutional/Governmental	Drinking Water	51				
Landscape	Drinking Water	1				
Agricultural irrigation	Drinking Water	24				
Agricultural irrigation	Raw Water	958				
Losses	Drinking Water	225				
	TOTAL	2,944				
Recycled water demands are NOT reported in this table. Data Source: SEWPA LIWMPA 2021a All numbers shown are Million						

Data Source: SFWPA, UWMPA, 2021g. All numbers shown are Million Gallons

Table 6-19 above lists water loss at 225 million gallons per year. Water loss occurs due to natural processes in the watershed, such as evapotranspiration from the reservoirs and pipe leakage. The loss volume of 225 million gallons represents a very small percentage of the actual demand, and it is typical for a water system and hydro-electric system in the Sierra Foothill area.

To provide a slightly different perspective on existing water demand, SFWPA's Treatment Plant Superintendent indicates that annual demands throughout the year range between 1.97 million gallons per day (mgd) to 11.52 mgd. The recent maximum daily demand for total production on August 18, 2020, was 11.52 mgd. The peak hour demand occurred on September 9, 2020, at 16.56 mg. The highest production month was in August 2020 at 287.12 mg (SFWPA, 2021a).

Existing water demand calculations also include exit flows for the Agency's drinking/agricultural system, calculated monthly using flows above Kelly Ridge Power House, and power run times (SFWPA, 2021a). Regarding domestic and irrigation water service, the Agency does not anticipate any major operational changes in the near-term future (Butte Co OEM and SFWPA LHMP, 2019).

Surplus Water

If SFWPA has surplus water stored in its reservoirs, it may sometimes choose to sell that water. For example, in the past, SFWPA entered into a Purchase Agreement for Water Transfer with the State Water Project Contractors Authority buyers group to transfer 10,000 acre-feet of water from the Agency's Ponderosa Reservoir to Lake Oroville. From Lake Oroville, the water was distributed to various state water contractors in the Bay Area and/or south of the Delta. Please

note that the SFWPA does have specific policies and guidelines to discern when the transfer of any water would be appropriate.

Future Water Demand

LAFCO is interested in studying projected future water demand to understand whether there is sufficient supply to serve future needs. Several factors contribute to future water demand, including population growth, types of agricultural crops grown and associated demand, evapotranspiration rates, and several other factors. Growth of housing and other types of development will influence future water demand, and therefore the Agency keeps track of "Will Serve Letters" or promises made to supply water. SFWPA has issued will-serve letters to the following residential developments:

- Heritage Estates Senior Apartment Complex located within the City of Oroville;
- River Ranch Estates General Housing (130 units), located in the unincorporated area of Butte County; and
- The Ridge Phase 2 (81 units) located in the unincorporated area of Butte County.
- One-year expiration provisions for fees [?] (SFWPA, 2021a).

After considering all these factors, the SFWPA's UWMP developed a model and predicts that in the year 2045, water demand will reach 3,664 million gallons per year. Table 6-20 below shows demand for potable and raw water in five-year increments out to 2045 by customer type.

Table 6-20: Demands for Potable and Raw Water							
Use Type	Projected Water use Report To the Extent that Records are Available						
Drop Down List	2025	2030	2035	2040	2045		
Single-Family	1,491	1,558	1,627	1,700	1,776		
Multi-Family	115	120	125	131	137		
Commercial	155	162	169	176	184		
Industrial	0	0	0	0	0		
Institutional/Governmental	53	56	58	61	63		
Landscape	1	1	1	1	1		
Agricultural irrigation	25	26	27	29	30		
Agricultural irrigation	1,001	1,046	1,093	1,141	1,193		
Losses	235	246	257	268	280		
Total	3,076	3,215	3,357	3,507	3,664		

Note: Recycled water demands are NOT reported in this table. Units of measure (AF, CCF, MG) must remain consistent throughout the UWMP.

Data Source: SFWPA UWMP, 2021g. Units for all numbers shown are million gallons

The SFWPA's most recent Urban Water Management Plan, 2020, analyzed the reliability of water sources during "average year," "single year," and "multiple-dry years" to plan for "worst-case" water supply situations. Multiple Dry Years are occurring on a more frequent basis. Table 6-21 below calculates projected future demand in the event a drought covering multiple years were to occur.

Table 6-21: - Multiple Dry Year - Supply and Demand

		2025*	2030*	2035*	2040*	2045* (Opt)
First year	Supply totals	19,896	19,896	19,896	19,896	19,896
	Demand totals	2,957	3,077	3,203	3,334	3,468
	Difference	16,939	16,819	16,693	16,562	16,428
Second year	Supply totals	66,375	66,375	66,375	66,375	66,375
	Demand totals	2,957	3,077	3,203	3,334	3,468
	Difference	63,418	63,298	63,172	63,041	62,907
	Supply totals	32,239	32,239	32,239	32,239	32,239
Third year	Demand totals	2,957	3,077	3,203	3,334	3,468
	Difference	29,282	29,162	29,036	28,905	28,771
Fourth year	Supply totals	36,402	36,402	36,402	36,402	36,402
	Demand totals	2,957	3,077	3,203	3,334	3,468
	Difference	33,445	33,325	33,199	33,068	32,934
Fifth year	Supply totals	77,069	77,069	77,069	77,069	77,069
	Demand totals	2,957	3,077	3,203	3,334	3,468
	Difference	74,112	73,992	73,866	73,735	73,601
	Supply totals					
Sixth year (optional)	Demand totals					
	Difference	0	0	0	0	0

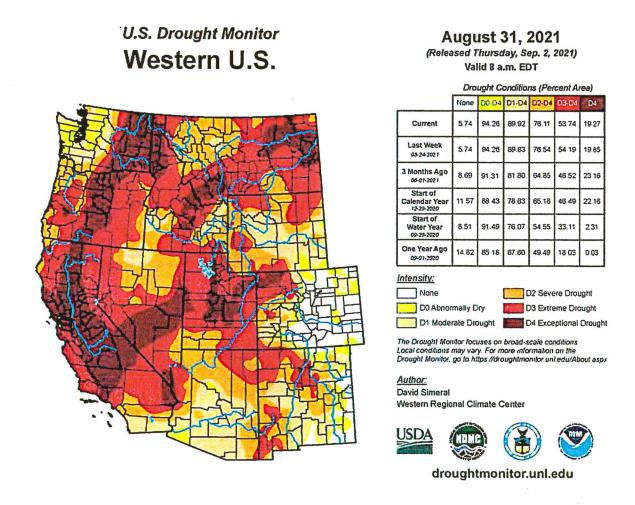
*Units of measure (AF, CCF, MG) must remain consistent throughout the UWMP as reported in Table 2-3.

NOTES: Based on five driest years from historical period of record 1912-2020.

Data Source: SFWPA UWMP, 2021g. Units for all numbers shown are million gallons

Drought Management and Water Conservation

Water is generally considered a renewable resource, replenished by annual winter precipitation. However, during times of drought and extreme drought, water can also be an exhaustible resource. Those times of water scarcity compel us to value water as a precious commodity to be conserved and carefully managed. According to the U.S. Drought Monitor, during the week of August 16, 2021, Butte County (along with roughly 47% of California) fell into the Exceptional Drought category, which is the worst in that ranking system. In addition, the Butte County Drought Task Force reported that July 2021 was the driest month, and the year 2021 is the 8th driest year over the past 127 years of record-keeping for Butte County.



The Agency has made significant reductions in its water use during the past few years through pipeline replacements, leak detection and repair, efficiency improvements in treated water production, customer leak notification, and public response to the statewide drought (SFWPA UWMP, 2021g). To continue its resource management during drought, the Agency submitted its Water Shortage Contingency Plan (WSCP) to CA DWR on July 21, 2021, as required by state law. SFWPA's WSCP describes six stages of water shortage ranging from Level 1, where water supplies are reduced up to ten percent, to Level 6, where water supplies are reduced by 50

percent or more. At each level of water shortage, the WSCP outlines strategies and actions the SFWPA will take to reduce water demand. For example, a Level 1 action is: Expand Public Information Campaign. A Level 6 action is: Prohibit vehicle washing except at facilities using recycled or recirculating water (SFWPA, WSCP, 2021d). Regardless of the severity of the water shortage, communication is a key aspect to encouraging water conservation, and SFWPA utilizes a number of strategies to communicate with customers and land use planning entities for the City of Oroville and County of Butte, as well as community partners, including:

- Supply clear, consistent, and understandable messaging to encourage increased voluntary conservation via billing inserts and on the Agency website.
- Collaborate with City and County partners to develop effective communications regarding current conditions, specifically the Agency's WSCP.
- Regularly communicate with local, state, and other elected officials in the region about the importance of achieving voluntary water conservation and encourage them to publicly promote such efforts (SFWPA, WSCP, 2021d).

A drought does have financial implications for SFWPA. Therefore, SFWPA staff is working to establish a rate structure that would be implemented by the Board of Directors during a declared water shortage emergency. Further analysis is needed to determine the financial impacts on hydropower operations and water distributions during times of emergency (SFWPA, WSCP, 2021d). Compliance and enforcement with water conservation measures are mandated by the California Water Code Sections 376 and 10632, such that a water supplier is required to penalize or charge end users for excessive water use. SFWPA plans to implement this in the future in accordance with a forthcoming Water Shortage Contingency Plan Resolution (SFWPA, WSCP, 2021d).

On average, during the past ten years, SFWPA customers have utilized 308 gallons per customer per day. In the year 2020, SFWPA customers utilized 301 gallons per customer per day. The Agency set a goal to encourage water conservation and invited customers to reduce water use to 240 gallons per customer per day; however, customers did not quite achieve this reduction goal. (SFWPA UWMP, 2021g). However, implementing the Agency's new Water Contingency Plan and other conservation measures will hopefully improve water conservation on a district-wide level.

In summary, "based on the supply and demand assessments conducted by the Agency (See UWMP Chapter 7), SFWPA believes that its sources of developed water supply will continue to more than adequately meet the current and the foreseeable demand through 2045" (SFWPA, Water contingency Plan, 2021c). Additionally, SFWPA's UWMP 2020 states that the surface water supply available to SFWPA is projected to be capable of serving all demands under all hydrologic conditions.

Water Recycling

Under ideal circumstances, using recycled water could potentially reduce future demand for drinking and irrigation water that would otherwise be used for water landscaping. However, the sewage collection systems of the City of Oroville and LOAPUD each terminate at Sewage

Commission – Oroville Region's (SCOR) treatment facility that is west of and not within the SFWPA boundary area. SCOR's treated effluent is discharged to the Feather River below Lake Oroville. Although the SC-OR wastewater treatment plant recycles a small amount of wastewater for utilization on SC-OR's landscaped grounds, it does not currently have an off-site recycled water program, as described in Chapter 5. Therefore, SFWPA does not currently make use of recycled water, nor is there any wastewater recycled for direct reuse within the Agency's boundary area (SFWPA UWMP, 2021g). Implementing a recycled water program within the SFWPA boundary area would need to involve longer-term measures and require regional participation by other agencies (SFWPA UWMP, 2021g).

6.6.2.3 Water Supply Conservation and Treatment Service to the SOI

SFWPA's existing SOI is quite large and comprises 64,125 acres. There are several possible scenarios under which a parcel within the SFWPA might request annexation into the SFWPA boundary to receive water service. Two hypothetical examples are listed below:

- Many parcels with the SFWPA rely on privately owned wells to provide groundwater. It is
 possible that during a prolonged drought that, a privately owned well could run dry. In this
 hypothetical situation, the property owner might consider asking for annexation into the
 SFWPA boundary to receive water service.
- New development could also spark requests for annexation into the SFWPA boundary to receive water service. For example, as parcels within the SOI are developed and potentially annexed into the City of Oroville in the future, SFWPA may have the capacity to provide water service to these areas.

Although additional annexations of land to the SFWPA have the potential to increase water demand, the SFWPA does not anticipate any additional annexations of parcels that are not included within the City of Oroville's General Plan over the next several years. Any new annexations would be determined on a case-by-case basis with a full review of anticipated water demand, conservation measures, and updated inventories of supplies. All new development in the SFWPA must provide for its fair shares of pipes, pipelines, and reservoirs. Additionally, before considering any other future annexation proposals, environmental review, approval from LAFCO, and other planning permits may be needed.

6.6.3 Water Quality

This section focuses on one aspect of water quality, namely the quality of drinking water. The quality of water discharged into natural streams, rivers, and lakes is described in relation to the SC-OR wastewater treatment plant in Chapter x.

When drinking a glass of water, it is important for customers to understand whether this water is safe for consumption and free from pollution to protect their health and safety and promote overall wellness. SFWPA's water quality monitoring program includes taking samples of raw and treated water throughout the year from many locations in the Agency's service area. SFWPA's annual Consumer Confidence Report (CCR) demonstrates a consistent delivery of high-quality drinking

water. To further consider SFWPA water quality in additional detail, four online databases were queried, including the California Drinking Water Watch; the Environmental Working Group; the California Integrated Water Quality System Project; and the Human Right to Water Tool.

California Drinking Water Watch

- SFWP Strawberry Campground (Water System No. CA0400138)
 - No violations
- SFWP Miners Ranch (Water System No. CA00410006)
 - No violations
- SFWP Bangor (Water System No. CA0410012)
 - No violations
- SFWP Sly Creek Campground (Water System No. CA0400137)
 - No violations

No violations were found in the SFWPA's water systems listed on the Safe Drinking Water Information website (California Drinking Water Watch, 2021).

Environmental Working Group (EWG): South Feather Water and Power Agency – Miners Ranch The Environmental Working Group (EWG) is a private non-profit organization that collects water quality data. EWG has no regulatory authority. EWG does not issue legal standards. EWG does have scientists who provide health guidelines in relation to water quality. Nine total contaminants are found in the SFWPA's Miners Ranch water system, with seven exceeding EWG Health Guidelines. All seven that exceed these guidelines are carcinogens and are listed below. The data available from the EWG website is from 2012 to 2017, showing a need for updated and accurate measurements for recent years.

- 1. Bormodicloromethane (1.46 parts per billion (ppb))
 - o Potential Effect: Cancer
 - 24 times EWG's Health Guideline (0.06 ppb)
 - No legal limit
- 2. Chloroform (19.8 ppb)
 - Potential Effect: Cancer
 - 49times EWG's Health Guideline (0.4 ppb)
 - No legal limit
- 3. Chromium (hexavalent) (0.125 ppb)
 - o Potential Effect: Cancer
 - 6.2times EWG's Health Guideline (0.02 ppb)
 - o No legal limit
- 4. Dichloroacetic Acid (10.4 ppb)
 - o Potential Effect: Cancer
 - o 52 times EWG's Health Guideline
 - No legal limit
- 5. Haloacetic acids (HAA5) (23.6 ppb)
 - Potential Effect: Cancer
 - o 236times EWG's Health Guideline (0.1 ppb)
 - o Legal limit: 60 ppb

- 6. Total trihalomethanes (TTHMS) (21.2 ppb)
 - o Potential Effect: Cancer
 - o 141times EWG's Health Guideline (0.15 ppb)
 - Legal limit: 80 ppb
- 7. Trichloroacetic acid (13.2 ppb)
 - o Potential Effect: Cancer
 - o 132times EWG's Health Guideline (0.1 ppb)
 - No legal limit
 - o (Data Source: EWG, 2021)

The data from EWG shows that the drinking water quality of the Miners Ranch System meets all legal requirements. However, improvements in some constituents may be needed to meet the more stringent (not mandatory) health guidelines; and continued water quality monitoring, as required by State Law, is justified.

<u>California Integrated Water Quality System (CIWQS): South Feather Water and Power Agency – Miners Ranch</u>

The CIWQS database is available online at: http://www.waterboards.ca.gov/ciwqs/. This database query showed no current active violations at the SFWPA Miners Ranch Water Treatment Plant. But the Agency does have an enforcement action as recent as March 2016. The enforcement type was Oral Communication, and its enforcement ID is 405322. (CIWQS, 2021)

Human Right to Water Data Tool

The State of California Office of Environmental Health Hazard Assessment has assessed various water quality parameters for community water systems throughout the state and posted the information to the online database called the "Human Right to Water Data Tool." The database analysis utilizes a scoring system to assess and rate various water quality parameters. The scores have a possible range: 0-4, with zero being the best and four (4) being the worst. This database was queried, and the results for the SFWP-Miners Ranch (PWSID: CA0410006) are described below.

The SFWP-MINERS RANCH system serves 24,846 people. Miner's Ranch received a Water Accessibility Composite Score of two-and-one-half (2.50) and a Physical Vulnerability to Water Outages Score of two-and-one-half (2.50), which is "moderate" for both variables. This indicator assesses how vulnerable a water system is to a supply outage (or shortage). The physical vulnerability score considers that this water system does not purchase water and has only one source (OEHHA, 2021). The Water Quality Composite Score: 0.12, which is a very low score indicating very good water quality. The database indicates this system had no contaminants at possible high potential exposure. The Compliance with Primary Drinking Water Standards Score was zero (0), and this low (i.e., very good) score was given because this system had no contaminants. The Data Availability Score was three (3), which is medium-high, indicating that some improvement in data sharing or communication may be needed (OEHHA, 2021).

In summary, SFWPA sources its surface water from a watershed that historically provided a high-quality raw water supply (SFWPA, Water Contingency Plan, 2021c). These watersheds include South Fork Feather River, Lost Creek (a tributary of the South Fork Feather River), and Slate Creek (a tributary of the Nork Fork Yuba River). SFWPA easily meets all the current legal requirements for water quality. However, as indicated by the EWG data, several water quality constituents are not covered by legal requirements or for which legal requirements are more lenient than other health guidelines (not obligatory). Additionally, local hazards, such as wildfires, pose a potential future threat to the watershed and the associated water quality derived therefrom. This indicates that continued water quality monitoring will be an ongoing effort by the SFWPA.

Lead Service Pipe Study

Section 116885 of the California Health and Safety Code (H&S Code, Lead Service Lines in Public Water Systems – Senate Bill 1398) requires all public water systems to compile an inventory of known partial or total lead user service lines in use in its distribution system. The deadline to compile the inventory was July 1, 2018. SFWPA completed the required inventory each year for the years 2017, 2018, and 2019. Each year it was found that "No lead/no unknown materials user service lines" (SWRCB, DDW, 2021).

6.6.4 Storm Water Drainage

In unincorporated Butte County, stormwater generally flows overland into storm drains along roadway corridors and moves downhill (via gravity) to local creeks and streams. As new residential developments are built, they typically construct a stormwater detention basin designed to avoid increases in off-site peak flow and ensure that stormwater complies with State Water Resources Control Board standards before metered discharge into the Feather River or its tributaries. The Central Valley Regional Water Quality Control Board (CVRWQCB) requires a National Pollutant Discharge Elimination System (NPDES) Permit for storm water discharges and other substances to surface waters. The SFWPA does not have responsibility for storm water. However, new technologies are being developed that could allow storm water harvesting such that water can be stored in lagoons and put through biofiltration systems to create a means of augmenting water supply for irrigation, etc., or to replenish a groundwater basin. The SFWPA may wish to informally monitor the storm water situation to ensure clean water is discharged and to keep apprised of new technological developments.

6.6.5 Electric Power Services

6.6.5.1 Existing Hydro-electric Services

SFWPA generates both hydroelectric power and solar-powered electricity through a photovoltaic array. Hydroelectric power is generated from the South Feather Power Project (SFPP, FERC No. 2088), a water supply/hydropower project located within Plumas, Yuba, and Butte counties in the Sierra Nevada Mountain Range in Northern California, which is owned and operated by SFWPA. SFPP is located within the Middle Fork Feather River watershed; the South Fork Feather River watershed, including Lost Creek, a tributary to the South Fork; and Slate Creek, a tributary to the North Yuba River watershed. The SFPP facilities occupy approximately 1,977 acres of federal

lands administered by the Plumas National Forest and 10.57 acres of federal lands administered by the United States Bureau of Land Management. The Project can store approximately 172,000 acre-feet (AF) of water (gross storage) and annually generates an average of about 514.1 gigawatt-hours of power (SWRCB, 2017).

The South Feather Power Project was completed in 1963 at the cost of \$62 million and was financed through the sale of revenue bonds secured by the projected revenues from power generation. Those bonds were defeased (a bond that has its outstanding debt collateralized by cash equivalents or risk-free securities) in 2009. The Project reservoirs include Little Grass Valley Reservoir, Sly Creek Reservoir, Lost Creek Reservoir, Ponderosa Reservoir, and Miners Ranch Reservoir, with a total storage of 164,577 acre-feet (AF) (SFWPA, UWMP, 2021g). Traditionally, the electricity generated by the hydroelectric facilities was sold wholesale to Pacific Gas & Electric (SFWPA, 2021a). However, the Agency's contract to sell wholesale power to PG&E expired on December 18, 2021 (SFWPA, 2021a). Today, the Agency sells power to the Northern California Power Agency (personal communication, R. Mosley, 7/11/22).

Operation of the reservoirs to meet competing demands is a key skill of SFWPA staff. Typically, the Little Grass Valley and Sly Creek Reservoirs get filled with runoff from snow melt and rainfall by the end of spring. The Reservoirs are gradually drawn down during the summer to provide consumptive water supply, power generation, and instream aquatic habitat. Additionally, a water supply is retained in the Reservoirs for recreational purposes. The end-of-the-year storage (December 31) in Little Grass Valley is typically 45,000 – 50,000 AF, and the storage in Sly Creek Reservoir is 10,000 – 15,000 AF, for a combined end-of-year storage total of about 60,000 AF. (Minasian et al., 2015).

FERC Relicensing Status

The hydropower project operates under a license from the Federal Energy Regulatory Commission (FERC License No. 2088). FERC issued the original Project license on July 21, 1952, to the Oroville-Wyandotte Irrigation District. This license expired on March 31, 2009. SFWPA has utilized FERC's Traditional Licensing Process since 2003. SFWPA filed an application for a new license on March 7, 2007 (SFWPA, 2021a). FERC issued its Final Environmental Impact Statement in June 2009 and subsequently requested Endangered Species Act (ESA) consultation with the National Oceanic and Atmospheric Administration, National Marine Fisheries Service (NOAA Fisheries) regarding salmon living in the River. NOAA Fisheries issued an ESA Letter of Concurrence in 2016. The State Water Resources Control Board⁶ issued its Section 401 Water Quality Certification for the Project in 2018. As of July 2022, the new FERC license is under review by the official entity and is awaiting approval (personal communication, R. Moseley, 7/11/22).

Additional information regarding hydro relicensing status is available at this website: https://www.waterboards.ca.gov/waterrights/water_issues/programs/water_quality_cert/southfeather_ferc2088.html

Kelly Ridge Powerhouse Settlement Agreement

Since the construction of the Oroville Dam by DWR, the point of discharge for the Kelly Ridge Powerhouse has become the Thermalito Diversion Pool, a feature of the State Water Project, located downstream of Oroville Dam and upstream of the Feather River Fish Hatchery. SFWPA's water discharges into the Thermalito Diversion Pool have the potential to increase the water temperature in the Feather River and affect the ability of DWR to meet specific Feather River water temperature objectives stipulated in the March 2006 Settlement Agreement for the Licensing of the Oroville Facilities Project. To address this issue, SFWPA, DWR, and State Water Contractors, Inc. executed the Kelly Ridge Powerhouse Settlement Agreement on October 23, 2012. The Settlement Agreement includes several stipulations related to the communications and operation of SFWPA facilities (SWRCB, 2017).

Future Challenges

The hydroelectric power facilities could potentially face future operational and regulatory⁷ challenges. For example, communities in California are occasionally opting for a Community Choice Aggregation program. SFWPA staff believe that a Community Choice Aggregation program could potentially have a negative economic impact due to the value of hydro energy on the open market, depending on future conditions (SFWPA, 2021a). Wildfires also pose a unique risk to hydroelectric facilities. For example, PG&E plans to shut energy provision down during times of high wildfire risk. This could potentially affect the SFWPA's hydro power program through financial impact due to lost hydro production. However, PG&E shutdowns are not expected to impact public water service because generator backups are in place to deliver water (SFWPA, 2021a). Long-term or extreme drought conditions also create challenging conditions for hydropower production across the Western United States. To cope with the most recent drought, the SFWPA re-balanced pre-curtailment diversions to storage in a manner that allows for the continued operation of all of its powerhouses. Another regulatory issue is dam safety. The California Water Code entrusts dam safety regulatory power to DWR, Division of Safety of Dams (DSOD). DSOD inspections of all nine Agency dams occurred on October 2019-2021. The Agency does not have plans to expand the power plant within the near-term future (Butte Co OEM and SFWPA LHMP, 2019).

6.6.5.2 Solar Power

The Miners Ranch Treatment Plant 566-kW Solar Energy System was installed in 2005 to defray utility costs to operate the treatment facility. The system produces solar-powered electricity through a photovoltaic array. Power performance capabilities are monitored in real-time, and monthly analysis is conducted. For the Calendar Year 2020, approximately 86 percent of power demand for the treatment plant operation was provided by on-site solar (SFWPA, UWMP, 2021g).

Please note that the hydro-electric facilities are regulated by FERC. SFWPA does not interact with the California Public Utilities Commission.

6.6.6 Recreation Service

As part of the FERC license on the hydroelectric facilities, the South Feather Water and Power Agency has some responsibilities for recreation in the upper watershed landscape. Specifically, SFWPA operates the following:

- Little Grass Valley Reservoir;
- Sly Creek Boat Launch;
- Sly Creek Campground;
- Sly Creek Road; and
- Strawberry Campground.

Little Grass Valley Reservoir

The Little Grass Valley Reservoir is a lake that is operated for the SFWPA hydroelectric power generation. Little Grass Valley Reservoir is a 1,616 surface-acre lake, sitting at a 5,040-foot elevation. The USFS manages the recreational facilities around the lake. The facilities include a public hiking trail around the lake, three boat ramps, swimming at two day-use beaches, and camping at five developed campgrounds. The U.S. Forest Service currently manages the Little Grass Valley campgrounds. The five campgrounds are handled on a first come first serve basis, including the RV Camp, Little Beaver, Black Rock, Peninsula Tent, and Wyandotte campgrounds. The five campgrounds offer over 300 campsites and three paved launch ramps. The Little Grass Valley Reservoir Recreation Facility includes an amphitheater and fishing trail access for disabled persons. Fishing, swimming, picnicking, and hiking are popular recreational activities (SWRCB, 2017).

Sly Creek Campground, Boat Launch, and Road

This facility is situated on Sly Creek Reservoir, a 562 surface-acre lake, at a 3,500-foot elevation and surrounded by a forested watershed. The Sly Creek Campground consists of 23 campsites, operating on a first come first serve basis. The SFWPA operates and maintains the campground under close coordination with the Feather River Ranger District since the campground is located in the Plumas National Forest. As of April 2, 2021, this recreation site remains closed due to a Forest Closure Order in response to dangerous conditions related to recent wildfires. The campground will be closed until March 10, 2023. Site amenities include an accessible boat ramp, tent camping, trailer camping, picnic tables, toilets, drinking water, and parking. Fees are \$20 per site per night. The regular open season is [10/7/19 - 5/22/20].? This campground does experience periods of heavy usage. Restrictions on usage include a 14-day maximum stay, and Off-Highway Vehicle (OHV) use is prohibited in the campground area. Water service includes potable water availability. Restroom service consists of Vault toilets. South Feather Water & Power operates the campground with Special Use Permit from the USFS.

Strawberry Campground

The Strawberry Campground contains 17 camping spaces, which are offered on a first come first serve basis. The SFWPA operates and maintains the campground under close coordination with the Feather River Ranger District since the campground is located in the Plumas National Forest. This campground is closed for the winter season and typically re-opens for the summer season. Reservations are not accepted at this facility. Area amenities include tent camping, trailer

camping, picnic tables, toilets, drinking water, and parking. Fees charged to campers are \$20 per site. The busiest season is summer. Use Restrictions include a 14-day maximum stay. OHV use is prohibited in the campground area. Potable water is available. Restrooms consist of vault toilets. South Feather Water & Power operates the campground by Special Use Permit from the USFS.

6.7 Infrastructure and Public Facilities

Infrastructure development and maintenance is an important part of the service that the SFWPA provides. SFWPA has infrastructure and facilities associated with its drinking water, raw agricultural water, hydroelectric, solar electric, and recreational programs. The Agency's facilities include several canals, ditches, reservoirs, water treatment plants, and various offices and warehouses. (LAFCO/Kleinschmidt, 2006). A summary of the critical infrastructure and public facilities managed by the SFWPA is provided in Table 6-22 below.

Table 6-22: Critical Facilities, Infrastructure, and Other Agency Assets - SFWPA

Name of Asset	Facility Type	Replacement Value	Hazard Information
Name of Asset	acinty Type	3.4	
Power Generation and Distribution	Buildings & Equipment	\$110,964,090	Fire, Flood, Drought, Landslide, Dam Failure
Water Treatment & Distribution	System Components	1 313 31h //h	Earthquake, Dam Failure
Communications	Buildings & Components	\$4,189,310	Fire
Water Transmission	System Components	444/85/	Fire, Flood, Earthquake
Water Storage Infrastructure	Various infrastructure	\$3,831,012	Fire, Flood, Earthquake, Dam Failure
District Business & Compliance	Buildings & Historic Files	\$9,731,468	Fire
Total		\$142,369,958	
Source: Butte County OE	M and SFWPA, LHMP, 201	9	

Land

SFWPA owns 56 parcels covering 1,471 acres (SFWPA, 2021a). Additionally, SFWPA has easements and permits allowing it to occupy land in the Plumas National Forest.

Administrative Facilities

The Agency's offices are located in the City of Oroville on Oro Quincy Highway and provide room for staff and administrative functions. These facilities house a laboratory for water quality testing.

The SWRCB accredits this laboratory through Certificate No. 1545, dated June 2020. SFWPA also maintains several general maintenance facilities.

6.7.1 Water Facilities

Water Conveyance Facilities

The SFWPA's 2004 report entitled "Water System Conveyance Evaluation" provides details and analysis of the Agency's water conveyance system and facilities. SFWPA maintains over 112 miles of irrigation canals, ditches, and pipelines that originally were intended for mining purposes. Historically, ditches may have lost as much as 90 percent of the water in the system before reaching a paying customer. However, the Agency has taken a programmatic approach to improve the irrigation distribution system and implement prioritized canal lining projects over the past decade. Many sections of the canals have been lined with gunite to remedy more severe leakage problems (LAFCO/Kleinschmidt, 2006). Since the mid-1990s, the agency has been implementing its Capital Improvement Plan to replace aging water conveyance infrastructure.

Miners Ranch Canal

The Miners Ranch Canal is the water conveyance facility connecting the penstock to the Kelly Ridge Hydroelectric Power House. The Miners Ranch Canal also connects to the raw water storage area at the Miners Ranch Treatment Plant for treatment and distribution to municipal water customers. The Miners Ranch Canal is seven miles long and is constructed into the hillside, where concrete panels interlock at the floor and up the other side to create a flume-like structure. The Canal's concreate panels are 20 feet long, and thickness varies from 8 inches at the bottom to 4 inches at the top. The original construction was done over 100 years ago, and the structure is emptied once a year for preventative maintenance. Flow gauges located along the canal can send a notification to staff when water or environmental conditions change that may necessitate changes to the Canal's operation. In addition, an access road is used to monitor and make repairs when necessary to the Canal. This road is constructed on an easement provided by California DWR as a result of the Lake Oroville water project (Butte Co., OEM, LHMP, 2019).

Raw Water Conveyance

Three linear ditches/canals move raw water to agricultural customers for irrigation purposes, including the Forbestown Ditch, the Bangor Canal, and the Palermo Canal.

Tunnel

SFWPA maintains a tunnel through the Gibsonville Ridge to move water from the upper portion of Slate Creek (a tributary of the North Fork Yuba River) to SFWPA facilities in the South Fork Feather River watershed (SFWPA, UWMPA, 2021g).

Water Storage

SFWPA retains an extensive reservoir system that stores both raw untreated water upstream and treated water. In the upper watershed, SFWPA's hydroelectric facilities utilize dams that create reservoirs that store a raw water supply. The five raw water reservoirs located in the upper

watershed include the Little Grass Valley Reservoir, Sly Creek Reservoir, Lost Creek Reservoir, Ponderosa Reservoir, and Miners Ranch Reservoir; with a combined storage of 164,577 acrefeet (AF) as listed in Table 6-23 below (SFWPA, UWMP, 2021g).

Table 6-23: Storage Reservoirs									
Reservoir and Year Constructed	Feet Storage		Type of Dam	Current Storage (Acre Feet)					
Little Grass Valley, 1962	89,804	202	Earth	88,000					
Sly Creek, 1962	64,338	289	Earth	60,600					
Lost Creek, 1924	5,780	112	Concrete	4,000					
Ponderosa, 1962	4,750	160	Earth	3,540					
Miners Ranch, 1962	896	57	Earth	680					
Data Source: Stiffel, 2016									

Treated water is stored in four water tanks with a combined capacity of 5.2 MG (million gallons) LAFCO/Kleinschmidt, 2006). In 2015, a 2-million-gallon concrete Clearwell tank was built to increase treated water storage capacity near the Miners WTP.

6.7.2 Water Treatment Facilities

Two water treatment plants (Miners and Bangor) are part of SFWPA's physical water system. SFWPA's primary water treatment plant is located at the Miners Ranch Reservoir. The Miners Ranch Treatment Plant is designated as Water System No. CA00410006. Originally completed in 1981, with significant upgrades completed in 2018, the treatment plant has the capacity to treat 21 million gallons per day (MGD) (SFWPA, UWMP, 2021g). These upgrades also included replacing one raw water pump, installing a new jet diffusion pump mixing station, installing new absorption clarifiers, and expanding filter capacity. Miners Ranch Water Treatment Plant currently serves 6,909 water connections, and this includes 6,714 residential accounts and 194 commercial accounts (State Water Board, 2021). Miners Ranch Water Treatment Plant is located at 234 Kelly Ridge Road, Oroville, CA 95965. (Refer to Figures 6-10 and 6-11, and Table 6-24 for details.) The water treatment process utilizes a combination of filtration and chlorination to remove/mitigate contaminants. Following the treatment process, water is distributed through SFWPA's pipelines to one of its four storage facilities and from there to consumption by SFWPA's customers. Miners Ranch has a peak design capacity of 21 MGD. The plant's current maximum demand equals 55% of the peak design capacity, and the average demand is approximately 35% (SFWPA, 2021a). Since maximum demand is significantly less than peak design capacity, it indicates there is sufficient capacity remaining in the system to accommodate projected future growth. The recently completed improvements to the Miners Ranch Treatment Plant increased capacity by an additional 50% and are sized to accommodate projected increases in water demand through the year 2046 (Stiffel, 2016).

The State Water Resources Control Board conducts regular inspections of the Miners Ranch Treatment Plant and issues an Inspection Report. On July 29, 2020, James Reade of SWRCB

inspected the South Feather Water and Power Agency's Miners Ranch water system. The water system was found to be well-maintained and operated. No deficiencies were noted during the inspection process (SWRCB, 2020).

The Agency has compiled an Emergency Response Plan (ERP) for the Miners Ranch Treatment Plant in conformance with America's Water Infrastructure Act of 2018, Section 2013(b). SFWPA obtained approval and adoption by the Board of Directors and submitted the plan to the Environmental Protection Agency as required. The current ERP is an internal document containing critical infrastructure information. The Board of Directors has approved the ERP contents through the Policy and Contracts Committee, and the Agency has self-certified the contents with the Environmental Protection Agency.

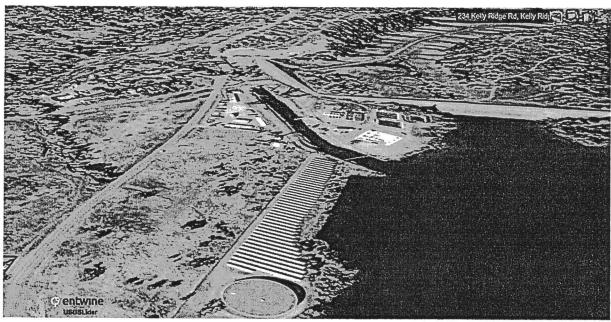


Figure 6-11: SFWPA Facilities

Table 6-24: Miners	Ranch Water Treatment Plant Details					
Name: Miners Ranch Water Treatment Plant						
Address:	234 Kelly Ridge Road, Oroville, CA 95966					
FIPS_Code:	06007					
PGM_SYS_ID:	CA0083143					
Registry_ID:	110000518869					
Data Source:	https://ofmpub.epa.gov/frs_public2/fii_query_detail.disp_program_facility?p_ registry_id=110000518869					

The Agency has operated the Bangor Water Treatment Plant since 1989. The Bangor Water Treatment Plant⁸ is designated as Water System No. CA0410012. Its Waste Discharger

6. South Feather Water and Power Agency

⁸ Additional information on the Bangor Water Treatment Plant can be found here:

Identification (WDID) number is 5A040119001. The Bangor Water Treatment Plant served an average of 21 customer accounts during the year 2018 and served a total population of approximately 73 persons. The Bangor Water Treatment plant is located at 7454 Oro-Bangor Hwy. Oroville, CA 95965. The water treatment process utilizes a combination of filtration and chlorination to remove/mitigate contaminants. Following the treatment process, water is distributed for consumption by SFWPA's customers. The Bangor Water Treatment Plant is currently operating at approximately 85 percent capacity (Stiffel, 2016).

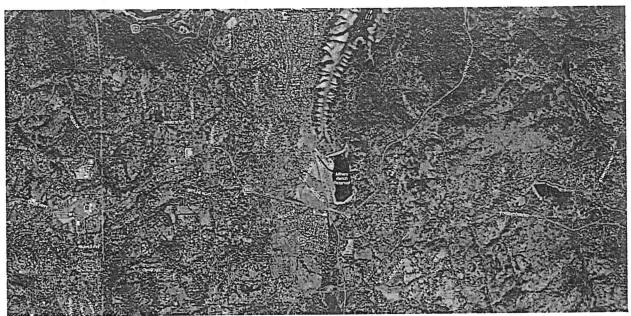


Figure 6-12: Aerial Image of Miners Ranch Reservoir

Infrastructure Inefficiency

The SFWPA Miners Ranch Water Treatment Plant is one of three water treatment plants that currently serve the Oroville region. Each of the three water treatment plants (SFWPA, TWSD, and Cal Water) require individualized treatment, operations, maintenance, capital improvements, and regulatory oversight. Given that Oroville (and its environs) is a small to medium city (in relation to population size), having three water treatment plants isn't the most efficient approach. If, in the future, an opportunity to reduce the number of treatment plants were to arise, it is possible that the improved efficiency could be beneficial to the community. LAFCO's 2018 Oroville Region Water Service Study recommended that the three entities openly and honestly consider the potential for treatment plant consolidation in the future. It should be noted, however, that the actual potential for this will be limited due to the very different ownership models of the entities. The Authors of this MSR concur with this recommendation of LAFCO's 2018 Oroville Region Water Service Study.

Maintenance

The Agency regularly undertakes dredging projects to remove sediment and debris from specific locations throughout the entire water conveyance infrastructure. Years of sediment and debris build-up at varying spots throughout the entire project have resulted in impaired water flow (Butte Co. OEM, LHMP, 2019). For example, if sediment were allowed to fill up the Miners Ranch Reservoir, it would reduce water storage capacity, and this capacity is necessary to ensure the treatment plant receives an adequate supply.

Another example of infrastructure improvement is the Lost Creek Dam Crest Modification Project in Strawberry Valley, CA. The construction work included increasing the dam spillway openings, raising the crest outside the spill section, reinforcing the downstream face, protecting the plunge pool area to prevent scouring of the foundation material, and replacing the dam crossing road. The rehabilitated dam is estimated to withstand potential floods and earthquakes for another century. Work began in the spring of 2017 and was completed in the fall of 2018 through a contract awarded to Granite Construction Incorporated (NYSE:GVA) for \$20 million.

6.7.2.3 Water Facilities to the SOI

The SOI is currently unincorporated and located within the jurisdiction of Butte County. Parcels located in the SOI do not receive municipal (treated) water, and therefore municipal water facilities are not located in the SOI. However, should a parcel (or parcels) be annexed to the SFWPA's service area, the extension of SFWPA water service to these parcels could be under consideration to provide drinking water (or other raw water supply) and associated facilities.

6.7.3: Hydro-Electric Facilities

The South Feather Hydro-Electric Project consists of four hydroelectric components:

- 1. Sly Creek;
- 2. Woodleaf;
- 3. Forbestown; and
- 4. Kelly Ridge.

Collectively, the Project consists of five dams and five reservoirs (Little Grass Valley, Sly Creek, Lost Creek, Forbestown, and Ponderosa), four powerhouses (Sly Creek, Woodleaf, Forbestown, and Kelly Ridge), three diversion dams (South Fork, Forbestown, and Kelly Ridge), six conduit tunnels, and associated equipment and transmission facilities (SWRCB, 2017). An open conduit includes elevated flume and siphon sections (SFWPA, WSCP, 2021e). [Please note that SFWPA also owns two additional dams (Lake Wyandotte and Miner's Ranch), however, these two dams are not part of the power facilities]. Little Grass Valley Dam is located at about 5,050 feet above sea level, and this is the highest elevation facility. The canals and conduits total approximately 21 miles in length. There are three hydroelectric power plants (Sly Creek, Woodleaf, and Forbestown) and 21 miles of road (SFWPA, UWMP, 2021g). Kelley Ridge Powerhouse, the lowest elevation facility, is located about 225 feet above sea level. Water captured in the reservoirs and utilized by the hydroelectric facilities but not consumed by the customers of these two organizations is released to the State Water Project's Feather River facilities (FERC No.

2100) at either Lake Oroville or Thermalito Diversion Dam (SFWPA, WSCP, 2021e). Compliance with the Federal Energy Regulatory Commission (FERC) and California Division of Safety of Dams (DSOD) requirements is an ongoing endeavor for SFWPA. Annual inspections and safety practices are conducted to ensure the safety and stability of the dams.

The SFWPA's South Feather Hydroelectric Project is FERC Project No. 2088, located on the South Fork Feather River (SFFR) and Lost and Slate Creeks in Butte, Yuba, and Plumas Counties, California. The 127.2-megawatt (MW) Project includes four hydroelectric developments with associated infrastructure and facilities (SWRCB, 2017).

Sly Creek

The Little Grass Valley Dam on SFFR forms the Little Grass Valley Reservoir. South Fork Dam on SFFR has South Fork Tunnel that diverts water from SFFR into Sly Creek Reservoir. Slate Creek Dam on Slate Creek (North Yuba River) has Slate Creek Tunnel that diverts water into Sly Creek Reservoir. Sly Creek Dam on Lost Creek forms Sly Creek Reservoir, which has Sly Creek Penstock that delivers water into Sly Creek Powerhouse/Switchyard (13.2 MW). Both Reservoirs have recreation facilities.

Woodleaf

Lost Creek Dam on Lost Creek forms Lost Creek Reservoir. Woodleaf Tunnel delivers water from Lost Creek Reservoir into Woodleaf Penstock, which delivers water into Woodleaf Powerhouse/Switchyard (60 MW).

Forbestown

Forbestown Dam on SFFR forms Forbestown Impoundment. Forbestown Tunnel diverts water from Forbestown Impoundment into Forbestown Penstock and into Forbestown Powerhouse/Switchyard (41 MW).

Kelly Ridge

Ponderosa Dam on SFFR forms Ponderosa Reservoir (spills into SFFR Arm of Lake Oroville of P-2100 Project). Ponderosa Tunnel diverts water from Ponderosa Reservoir into Miners Ranch Canal. Miners Ranch Canal has siphons across McCabe and Powell Creeks of Lake Oroville, delivers water from Ponderosa Tunnel into Miners Ranch Tunnel, and delivers water into Miners Ranch Reservoir. Miners Ranch Dam on Miners Ranch Canal forms Miners Ranch Reservoir. The Kelly Ridge Tunnel diverts water from Miners Ranch Reservoir into Kelly Ridge Penstock and on into Kelly Ridge Powerhouse/Switchyard. This 13 MW powerhouse discharges just downstream of Oroville Dam (i.e., near the Thermalito Diversion Pool).

6.7.4: Park and Recreation Facilities

SFWPA manages several reservoirs in the upper watershed and associated recreational facilities as described above in Section 6.7.3. Some of the facilities are managed by the US Forest Service. SFWPA manages other recreational facilities under a permit from the US Forest Service. Due to the geographic isolation of the recreation facilities, the only readily available cost avoidance or facility-sharing opportunities open to the Agency is a partnership with the US Forest Service. This

partnership has been ongoing for the past few decades and is expected to continue into the future successfully.

6.7.5. Infrastructure Needs and Deficiencies

The American Society of Civil Engineers, Region 9 has several recommended remedies for California's aging drinking water infrastructure as outlined in Appendix K and as summarized below:

- Address Aging Infrastructure Needs.
- Continue To Make Conservation A California Way Of Life.
- Increase Regional Self Reliance And Integrated Water Management Across All Levels Of Government.
- Achieve The Co-Equal Goals For The Delta.
- Manage And Prepare For Dry Periods.

Infrastructure needs and deficiencies are a common feature of large facilities, such as a water district. To address its specific needs, ideally, a water district would prepare a capital improvement plan. SFWPA has a 5-year strategic plan which includes a capital improvement plan. The strategic plan and CIP were presented at the May 2022 SFWPA board meeting (personal communication, R. Moseley, 7/11/22).

The SFWPA does have an Equipment Maintenance Summary for the Miners Ranch Water Treatment Plant in an Excel format. This Equipment Maintenance Summary lists the tasks associated with regular maintenance of the Treatment Plant features, including the Decanter, Sludge Collection, Vertical Turbine Pumps, Vertical Inline Pumps, Polymer Dilution System, Clarifier, Tank Mixer, Progressive Cavity Pump, Metering Pump, Blower, , Troughs, Gas Scrubber, Conveyor, Manual Plug Valve, PRV, Manual Butterfly Valve, Check Valve, ARV, EMO Butterfly Valve, EMO Plug Valve, Retrofit Actuator, Electric Actuator, MCC, and Instrumentation.

Hydroelectric facilities, such as powerhouses, need continual maintenance. Therefore, SFWPA staff periodically updates the Board of Directors about maintenance activities on the hydroelectric facilities.

Infrastructure needs or deficiencies (i.e., pipelines, hydrants, tanks, reservoirs, etc.) are described by SFWPA staff as aging pipeline infrastructure and the need for additional fire hydrants (SFWPA, 2021a). SFWPA's pipelines are likely constructed from a range of materials such as metal, cement, or similar materials. Plastic pipelines are commonly used by water districts in California to transport water to customers, as described in the footnote⁹ below. Data about any use of plastic pipelines by SFWPA was not readily available for this MSR.

⁹ Plastic pipes are often less expensive to install than metal alternatives, which hold up against high heat but are vulnerable to corrosion. A new study has shown that pipelines constructed of plastic, including high-density polyethylene (HDPE), crosslinked polyethylene (PEX), polyvinyl chloride (PVC) and chlorinated polyvinylchloride (CPVC) experience problems during and after fires and associated high heat exposure. Specifically, fire and heat-damaged plastics can directly leach dozens of toxic chemicals, including carcinogens such as benzene, into local water systems. The Town of Paradise experienced this

6.7.5.1 Determinations for Infrastructure and Public Facilities

Based on the information included in Section 6.7 above, the following written determinations make statements involving each service factor that the Commission must consider as part of a municipal service review. The determinations listed below in Table 6-25 are based upon the data presented and are recommended to the Commission for consideration. The Commission's final MSR determinations will be part of a Resolution the Commission formally adopts during a public meeting.

FACILITIES		RESENT AND PLANNED CAPACITY OF PUBLIC LIC SERVICES INCLUDING INFRASTRUCTURE
		Determination
Number SFWPA-PUB-1	Indicator Has the Agency been diligent in developing plans to accommodate the infrastructure and service needs of current and future constituents? Regularly reviews and updates its service plans to help ensure that infrastructure needs and deficiencies are addressed in a timely manner.	SFWPA has a 5-year strategic plan which includes a capital improvement plan. The strategic plan and CIP were presented at the May 2022 SFWPA board meeting. Implementation of these plans in the future will help ensure that infrastructure needs and deficiencies are addressed in a timely manner.
SFWPA-PUB-2	Does the District provide sufficient services to meet current and future demands with: 1) water supply in relation to water demand, 2) hydro-electric supply in relation to demand, and 3) recreation services?	SFWPA provides sufficient services to meet current and future demand as follows: 1) Based on the water supply and water demand assessments conducted by the Agency, SFWPA believes that its sources of developed water supply will continue to more than adequately meet the current and foreseeable demand through 2045. 2) SFWPA generates electricity using hydroelectric and solar electric facilities. The hydro-electric power is sold wholesale to the Northern California Power Agency. Although a prolonged drought can decrease power production, the infrastructure functions as designed, and power sales usually contribute significant funding to the SFWPA.

issue after the 2018 Camp Fire. A community can stop water contamination from spreading if damaged pipes can be quickly isolated. Without isolation, the contaminated water may move to other parts of the water system, across town or within a building, causing further contamination. Water districts can install network isolation valves and backflow prevention devices, to prevent contaminated water moving from a damaged building into the utility pipe network (Isaacson et. al., 2021).

-	,	(continued) 3) SFWPA provides recreational services, including camping, hiking, boating, and fishing, along its reservoirs located in the upper watershed.
SFWPA-PUB-3	Does the District have a reliable, sustainable source of water? Can the District and its partners develop additional local and regional water sources through wastewater reclamation, stormwater capture, and/or environmentally sustainable desalination projects?	SFWPA's water supply is derived from surface water diverted from the upper watershed of the South Fork of the Feather River and the upper portion of the Slate Creek watershed. SFWPA prepared an Urban Water Management Plan in 2021 and a 2020 Water Shortage Contingency Plan. Based on the data described in these plans and based on historic weather patterns, SFWPA believes the local watershed is a reliable, sustainable source of water. SFWPA has not identified a need to study the future potential for developing additional local and regional water sources (such as wastewater reclamation, stormwater capture, and/or environmentally sustainable desalination projects). However, if a need for additional sources arises in the future, these and other options could be studied.
SFWPA-PUB-4	Is there duplicate infrastructure by other agencies nearby?	Several nearby agencies offer drinking water services similar to that of the SFWPA (such as TWSD and the private California Water Company). The North Yuba Water District provides raw water to agricultural customers in Yuba County. However, within the SFWPA's boundary area, the SFWPA is the only water service provider (with the small exception of a geographic overlap with the service area of the private California Water Company).
		If, in the future, an opportunity to reduce the number of treatment plants were to arise, it is possible that the improved efficiency could be beneficial to the community. LAFCO's 2018 Oroville Region Water Service Study recommended that the three entities openly and honestly consider the potential for treatment plant consolidation, in the future. It should be noted however, that the actual potential for this will be limited due to the very different ownership models of the entities. The Authors of this MSR concur with this recommendation of LAFCO's 2018 Oroville Region Water Service Study.

SFWPA-PUB-5	The Agency has preventative maintenance measures and has planned for the replacement of aging infrastructure.	The Agency has conducted preventative maintenance on its infrastructure. Additionally, to guide future preventative maintenance, SFWPA has a 5-year strategic plan which includes a capital improvement plan. The strategic plan and CIP were presented at the May 2022 SFWPA board meeting.
		Additionally, the Agency's General Fund Financial Projections show that it plans to spend \$750,000 per year through the year 2026 on Capitol Expenses. The Agency's Joint Facilities Operating Fund Projections show that it plans to spend \$3,00,000 annually through the year 2026 on Capitol Expenses. SFWPA staff have identified infrastructure needs and deficiencies as aging pipeline infrastructure and the need for additional fire hydrants.
SFWPA-PUB-6	Evaluation of agency's capacity to assist with or assume services provided by other agencies.	The SFWPA has demonstrated capacity to assist with or assume services provided by other agencies. For example, the SFWPA has a solid financial basis due to the revenue generated by the hydroelectric facilities. However, this power revenue is not guaranteed every year since drought decreases generation capacity. SFWPA has retained staff engineers and other professionals necessary to serve leadership roles, and these skilled staff persons have the ability to assist with or assume services provided by other agencies. Additionally, SFWPA has close collaborative relationships with nearby independent government agencies, as demonstrated through its collaboration with the U.S. Forest Service. SFWPA successfully communicates with nearby local agencies such as the City of Oroville, Butte County, and TWSD. SFWPA's leadership capacity has recently improved by resolving outstanding litigation and developing clear capital improvement plans.

6.8 Financial Ability To Provide Services

6.8.1 Introduction to Financial Metrics

LAFCO is required by the CKH Act to make a determination regarding the financial ability of the South Feather Water and Power Agency to provide public services. This Section provides an overview of financial health and provides a context for LAFCO's financial determinations. The audited Comprehensive Annual Financial Reports (CAFR) from the District for the fiscal years 2018, 2019, and 2020 are the primary source of information. Based on recent recommendations from the Little Hoover Commission, this determination on the financial ability to provide services

is based upon several key financial performance indicators that LAFCO's throughout the State consider in MSRs.

In California, special districts are classified as enterprise or non-enterprise districts based on their source of revenue:

- Enterprise Districts: The funding of district operations is via fees for public service. Under this model, the customers that utilize goods or services such as drinking water, raw water, sewage disposal, or electricity pay a fee. Rates are set by a governing board, and there is a nexus (direct connection) between the costs of providing services and the rates customers pay. Sometimes an enterprise district may also receive property taxes and other revenues, which comprise a portion of its budget.
- Non-enterprise Districts: Districts that receive property taxes are typically classified as non-enterprise districts. Services that indirectly benefit the entire community, such as police or fire protection, community improvements, recreation and library services, reclamation and flood improvements, and cemetery districts, are often funded through property taxes.

SFWPA primarily functions as an enterprise district, charging fees for water supply, water treatment, and distribution services. However, there are some unique circumstances in that SFWPA does collect property taxes, and the revenue from hydroelectric power generation is utilized to subsidize the price of water for retail customers. Together, the property taxes and the hydro revenue mean that water customers do not pay the full cost of water delivery.

The District's annual financial statements describe two designated funds: the General Fund; and the Joint Facilities Operating Fund.

In April 1995, the Agency approved the formation of the Oroville-Wyandotte Irrigation District Financing Corporation (the Corporation). This Corporation is a nonprofit public benefit corporation organized under the Nonprofit Public Benefit Corporation Law (commencing at Section 5110 of the California Corporations Code). This type of relationship is commonly referred to as a blended component unit. The purpose of this Corporation is to provide assistance to the SFWPA in the financing, acquiring, constructing, rehabilitating, or financing various public facilities; and land and equipment for the use, benefit, and enjoyment of the public. Although the Agency and Corporation are legally separate entities, the Agency exercises oversight responsibility over the Corporation. The Corporation is reported as if it were part of the primary government because it shares a common Board of Directors with the Agency, and its sole purpose is to provide financing to the Agency under the debt issuance documents of the Agency. Therefore, debt issued by the Corporation is reflected as the debt of the Agency in these financial statements. The Corporation has no other transactions and does not issue separate financial statements (SFWPA, 2018). As of December 31, 2020, the outstanding principal balance due on the 2016 Certificates of Participation associated with the Miners Ranch Treatment Plant Solar Photovoltaic Project and Office Remodel/Addition Project was \$25,010,000, with a final maturity of April 1, 2046. The Financing Corporation has no other debt at this time.

6.8.2 Financial Policies & Transparency

The District prepares an annual budget and a schedule of fees, typically approved by the Board of Directors at their December public meeting. The Agency's budget includes both the water and hydroelectric operations and finances. The fiscal year (FY) runs concurrently with the calendar year, beginning on January 1 and ending on December 31. The current and past budgets going back to 2014 are available on the District's website at https://southfeather.com/publications/financial-reports/.

Every year the District publishes an audited Annual Financial Statement (AFS). The California Government Code requires an annual independent audit of the District's financial records by a certified public accountant who serves as an independent auditor. The current Audited Financial Statement and past financial statements to 2004 are also available to the public via the District's website. There are four types of audit opinions: unqualified, qualified, adverse, and disclaimer. An unqualified opinion is a 'clean' opinion, meaning the entity passed its audit. A qualified opinion means the entity passed the audit with notable exceptions. A disclaimer or adverse opinion essentially means the entity flunked its audit. The independent audit on FY 2020 was performed by Richardson & Company (SFWPA, 2021h). The auditors issued an "unqualified" opinion as stated: "In our opinion, the financial statements . . . present fairly, in all material respects, the financial position of the Agency, as of December 31, 2020, and 2019 and the changes in financial position and cash flows thereof for the years then ended in conformity with accounting principles generally accepted in the United States of America. . . "(SFWPA, 2021h).

A District's financial policies function as business rules that ensure an agency's transactions are recorded consistently and correctly. Therefore, it is vital for a District's financial policies to be made available to the public. SFWPA's financial policies are described in the AFS for 2019, and several financial policies are listed below:

- Basis of Presentation: The Agency's resources are allocated to and accounted for in these basic financial statements as an enterprise fund type of the proprietary fund group.
- Basis of Accounting: The accounting and financial reporting treatment applied to a fund is determined by its measurement focus. The enterprise fund type is accounted for on a flow of economic resources measurement focus. With this measurement focus, all assets, deferred outflows, liabilities, and deferred inflows associated with the fund's operation are included in the statement of net position.
- Under the accrual basis of accounting, revenues are recognized when earned, and expenses are recorded when the liability is incurred or the economic asset is used.
- Cash and Cash Equivalents: For the purposes of the Statement of Cash Flows, the Agency's cash and cash equivalents include restricted and unrestricted cash on hand, bank deposits, and short-term investments with original maturities of three months or less from the date of acquisition, including investments in the California Local Agency Investment Fund (LAIF).
- The Agency has adopted a formal investment policy as required by Section 53600et seq., of the California Government Code. The Agency Treasurer is responsible for selecting depositories and investing idle funds according to the adopted investment policy.

- Capital Assets: Capital assets, which include property, plant, equipment, and infrastructure assets, are reported on the Statement of Net Position.
- Long-Term Liabilities: Long-term liabilities and other long-term obligations are reported on the Statement of Net Position. Initial issue bond premiums and discounts are deferred and amortized over the life of the bonds using the straight-line method.
- Interfund Transactions: Transactions between combining units of the Agency are recorded as inter-fund transfers on the Combining Schedule of Revenues, Expenses, and Changes in Net Position. The unpaid balances at year-end, as a result of such transactions, are shown as due to and due from other funds. These amounts are eliminated for reporting in the enterprise fund financial statements. (Data Source: SFWPA AFS, 2020).

In addition to the accounting policies listed in its AFS, the SFWPA also has an adopted set of Rules and Regulations, most recently updated in August 2021. The Rules and Regulations list rules related to charges and fees, and several are summarized below:

- Annexation Processing Fee: In addition to fees levied by the County Clerk, LAFCo, State Board of Equalization, and any other public agency having jurisdiction over the annexation approval process, SFWPA shall require payment by the applicant of a Processing Fee prior to engaging its annexation-processing consultant.
- Financial Responsibility for Cost of Extending Mains: It is the policy of the Agency to allow reasonable extensions of its facilities for a growing community, provided that such extensions do not place an unfair burden on property owners already receiving service. All costs associated with the extension of Agency facilities, together with the installation of private service lines from said facilities, shall be the responsibility of the owner(s) of the parcel(s) to be served or the developer of a project to be served.
- Inspection of Construction Fee: The Agency's engineer or their agent(s) shall inspect the
 construction of the project's domestic water system to assure that the works are installed
 in accordance with the approved plans and specifications. Said inspection shall be funded
 by a Plan Check Fee and Inspection Fee paid by the developer. Construction of the water
 system shall not commence until said fee is paid.
- Payment of Bills: Bills are due and payable on the date they are mailed and are delinquent ten (10) days thereafter. A delinquency penalty charge as determined by the Board of Directors and as shown in the schedule of Fees and Charges.
 Data Source: SFWPA, 2021i

The Agency has a published policy for reserve funds, and the requirements are documented in the 2005 Agreement between SFWPA and NYWD (personal communication, R. Moseley, 7/11/22).

Data Transparency

Financial data transparency promotes accountability and provides information to citizens about what their local government is doing. Transparency allows residents to stay informed and learn about local government revenue, spending, and debt. The Finance Director makes regular reports

to the Board of Directors regarding fund balance etc., and this information is available to the public via the public meeting agenda packet.

Transparency with salary data is also an important attribute for special districts in California. The South Feather Water and Power Agency provides competitive compensation and a benefits package to full-time, regular employees, as shown in Figure 6-13 below. The employee wage scale is available on the SFWPA website. Additionally, the South Feather Water and Power Agency forwards reports to the California State Controller for Government Compensation in California per Government Code Section 53891 and to the State Auditor. SFWPA has a total of 68 employees and paid Total Wages of \$6,555,602 and Total Retirement & Health Contribution of \$2,643,163 in the year 2020 (CA Auditor, 2021). SFWPA compensation data is reported to the California Auditor and is shown in Figure 6-13 below.

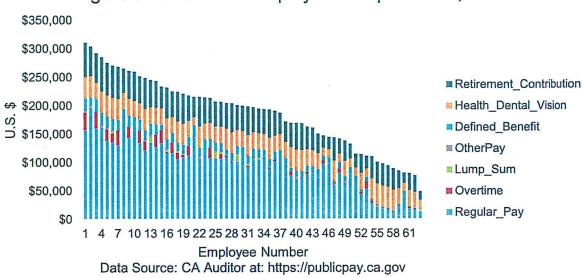


Figure 6-13: SFWPA Employee Compensation, 2020

The determinations for SFWPA's financial policies and fiscal transparency are listed in Table 6-33.

6.8.3 Revenues, Expenditures, and Net Position

Revenues

SFWPA has two basic types of revenue:

- Make the consisting primarily of charges for services; and
- Non-operating revenues and expenses related to financing and investing-type activities. The District has multiple sources of revenue, including sales to customers, interdepartmental sales, standby fees, other investment income, and gain on disposition of assets. In 2020

SFWPA's total revenue¹⁰ was \$17.4 million, and most (69 percent) of this revenue resulted from the sale of electricity from the hydropower plants, as shown in Figure 6-14 below.

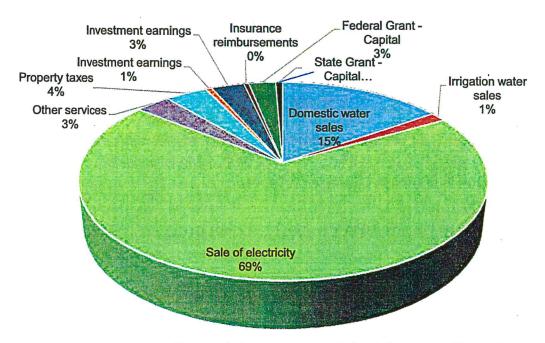


Figure 6-14: Sources of Total Revenue FY20 (SFWPA)

Operating revenues consist of domestic and irrigation water sales, generation of hydroelectric power, water transfer sales, customer services, and installations. Operating revenues were \$15,466,177 in 2020 and \$24,949,202 in 2019. In 2018, operating revenue was \$18,088,788. Non-operating revenues come from property taxes, investment earnings, insurance refunds, and any gains or losses on the sale or disposal of an asset. Non-operating revenues account for \$1,297,666 (or 7%), \$2,128,205 (or 8%), and \$5,100,548 (or 20%) of total revenue in 2020, 2019, and 2018 respectively. Total revenue is the sum of operating and non-operating revenue, and it declined by \$9,877,830 (or 36%) between 2020 and 2019. This decline was due to less electricity sales because of the drought in 2020 (as compared with water availability in prior years). Total revenue increased by \$1,260,527 (or 5%) between 2019 and 2018 due to unusual hydropower generation pricing in February and March, and wetter than average winter storms in 2019 (SFWPA, AFS, 2021h). With a total revenue of \$17,391,542 in 2020 and a boundary area of 33,718 acres, the revenue generated per acre of boundary land is \$516.

Property tax revenue totaled \$681,269 in 2020. Since there are 69,500 water connections in SFWPA, the tax revenue per water connection ratio can be calculated as 9.8, meaning that each water connection paid an average of \$9.80 in property tax for the year 2020.

¹⁰ The 2021 annual financial statement will be presented at the July 26, 2022 SFWPA board meeting.

Expenses

In FY 2020, total expenses (including both operating and non-operating) were \$21 million. The largest expense was water plant operations and maintenance at \$6.9 million (33%), and the second-largest expense was depreciation at \$3.88 million (18%), as detailed in Figures 6-15 and 6-16 below.

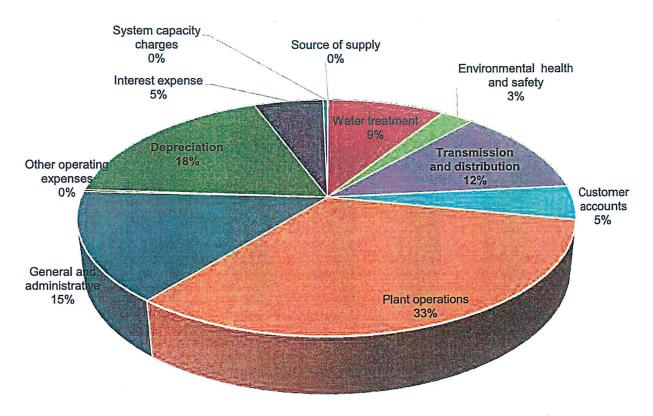


Figure 6-15: Total Expenses FY20 (SFWPA)

Source: SFWPA, AFS, 2021h

SFWPA's per capita expenditures amounted to \$1,265 per permanent resident in 2020. Other significant expenses in 2020 include the following:

- The Agency's capital contributions increased by \$435,734 to the 2020 amount of \$627,699, which includes grants for the Miners Ranch Canal road repairs offset by a decrease in system capacity charges levied (SFWPA AFS, 2021h).
- Construction-in-Progress decreased by \$311,060 from last year to \$113,317. The projects in progress on December 31, 2020, included the water distribution system remote monitoring program, Community Line, Foothill Blvd/Oro Bangor Hwy-Grange domestic water project, the Oro Bangor Hwy/Red Hawk Ranch irrigation water project, replacement of the Kelly Ridge Powerhouse septic system and the California Independent System Operator (CAISO) meter installation project (SFWPA AFS, 2021h).

 Relicensing costs accumulated through 2012 in the amount of \$5,716,306 were amortized over the life of the license, beginning when the FERC license is issued. Costs incurred after 2012 have been expensed (SFWPA AFS, 2021h).

Total Revenues were compared to Total Expenses for a five-year time period, as shown in Figure 6-16 below. Both revenues and expenses vary year-to-year. Total revenues exceeded total expenses during four years of the five-year study period. The decline in revenue in FY2020 was due to the drought, resulting in a decline in hydroelectricity production.

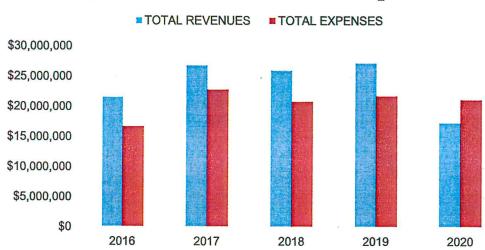


Figure 6-16 Revenues and Expenses

Net Position

The Statement of Net Position provided in Table 6-26 (next page) includes all of the District's assets, deferred outflows of resources, liabilities, and deferred inflows of resources, which provide information about the nature, and amounts, of investments in assets and obligations to District creditors. They also provide the basis for computing rates of return, evaluating the capital structure of the District, and assessing financial flexibility of the District. As shown in more detail in Table 6-26 below, the South Feather Water and Power Agency December 31, 2020, the net position of \$92,594,339 was a decrease of \$3,827,965 (3.97%) when compared with the December 31, 2019, net position of \$96,422,304 (SFWPA AFS, 2021h. The Agency's net position relates to operating revenues which decreased by \$9,483,025 (or 38.0 %) from the prior year. Drought conditions caused revenue from hydropower generation to be significantly less than historically received. The Agency's 2020 operating expenses decreased slightly by \$491,102 (or 2.39%) from 2019 (SFWPA AFS, 2021h).

\$98,000,000
\$94,000,000
\$92,000,000
\$990,000,000
\$88,000,000
\$884,000,000
\$82,000,000
\$82,000,000
\$80,000,000
\$FY2017 FY2018 FY2019 FY2020

Figure 6-17: Net Position, Annual Variation

Source: SFWPA Audited Annual Financial Statement for FY2020 (2021h)

The Net Position of the three-year time period of December 31, 2020, December 31, 2019, and December 31, 2018, is studied in more detail in Table 6-26 below.

	2020	2019	2018
REVENUES			
Operating Revenues			
Domestic Water Sales	\$2,674,305	\$2,138,729	\$2,151,414
Irrigation Water Sales	\$263,727	\$218,507	\$222,699
Sales of Electricity	\$11,962,972	\$21,848,149	\$14,811,825
Other Services	\$565,173	<u>\$743,817</u>	\$902,850
Total Operating Revenue	\$15,466,177	\$24,949,202	\$18,088,788
Non-Operating Revenues:			
Property Taxes	\$681,269	\$663,748	\$585,383
Investment Earnings	\$535,945	\$859,928	\$422,595
Insurance Refund	\$80,452	\$601,929	\$2,612,050
Gain or Loss on Sale of Fixed Assets		\$2,600	\$(619,010)
Miscellaneous Non-Operating Revenue			\$2,099,530
Total Non-Operating Revenue	\$1,297,666	\$2,128,205	\$5,100,548
Capital Contributions	\$627,699	<u>\$191,965</u>	\$2,819,509
TOTAL REVENUES	\$17,391,542	\$27,269,372	\$26,008,845
EXPENSES			
Operating	\$20,084,321	\$20,575,423	\$19,816,365
Non-Operating	\$1,135,186	\$1,243,331	\$1,080,524
TOTAL EXPENSES	\$21,219,507	\$21,818,754	\$20,896,889

CHANGE IN NET POSITION	\$(3,827,965)	\$5,450,618	\$5,111,956
NET POSITION AT BEGINNING OF YEAR	<u>\$96,422,304</u>	<u>\$90,971,686</u>	\$85,859,730
NET POSITION END OF YEAR	\$92,594,339	\$96,422,304	\$90,971,686

LAFCo's determinations for SFWPA's revenues, expenditures, and net position are listed in Table 6-33.

6.8.4 Capital Improvement Plan

As part of its annual budgeting process, the Agency briefly describes the proposed capital improvement projects to be funded and their estimated budget. This is based on the Agency's rolling three-year capital improvement plan reviewed each budget cycle (SFWPA, 2021a). Specifically, the 2021 Proposed Capital Budget includes the Irwin, Experanza, Williams pipeline project; replacement of 12 vehicles; several powerhouse upgrades, repairs and parts replacements; waterways dredging; SCADA upgrade; and communication upgrades to accommodate CAISO meter communications. Capital Budget appropriations account for materials, and outside service costs only. Labor charges are assigned to the operating departments allowing for more effective administrative control of these personnel costs (SFWPA Budget 2020c).

The Agency has prepared ten-year General Fund Financial Projections for the time period from 2017 to 2026. This projection estimates that \$967,000 will be directed to capital improvements in 2021. During the years 2022 to 2026, it is estimated that \$750,000 per year will be budgeted for capital improvements.

6.8.5: Reserves

In California, many independent special districts have accumulated reserves. There are no standards guiding the size and use of reserve funds. Reserve funds are useful for SFWPA because their contribution towards capital improvement projects reduces the potential need to accumulate a high debt load. The District's investment policy and the California Government Code allow the District to invest, provided the issuers' credit ratings are acceptable to the District and approved percentages and maturities are not exceeded. SFWPA has a contingent reserve, and operating reserve accounts for potential liabilities (SFWPA, 2021a). The 2021 Adopted Budget estimates a reserve balance of \$20,063,853. A reserve set aside for retiree benefits was \$1,617,546 from the Facility Operating Fund and \$1,977,001 from the General Fund (SFWPA, 2020c). Within the Joint Operating Facility Fund, there is a special reserve to comply with the North Yuba Water District agreement, with a 15% working capital reserve of \$1,125,850 and \$18,000,000 contingency reserve as required (SFWPA, 2020c).

Reserves are typically held in investment funds. SFWPA utilizes eight investment types: cash, deposits with financial institutions, money market funds, Local Agency Investment Fund (LAIF), certificates of deposit, US treasury note, US government agency securities, and the Investment Trust of California. For example, in 2020, \$19.2 million was held in LAIF. The Agency is a voluntary participant in the California Local Agency Investment Fund (LAIF) that the California Government Code regulates under the oversight of the Treasurer of the State of California. LAIF is stated at amortized cost, which approximates fair value. The LAIF is a special fund of the California State Treasury through which local governments may pool investments. The State Treasurer manages LAIF. The amount invested in LAIF was 3.28% and 2.79% on December 31, 2020, and 2019 in structured notes and asset-backed instruments (SFWPA, AFS, 2021h).

Table 6-27: Agency Cash On Hand and Investments

NOTE B - CASH AND INVESTMENTS

Cash and investments were classified in the financial statements as shown below at December 31:

	2020	2019
Cash and cash equivalents	\$ 22,495,182	\$ 23,332,937 574
Restricted cash and cash equivalents Investments	576 8,300,223	8,587,288
Total cash and investments	\$ 30,795,981	\$ 31,920,799
Cash and investments were comprised of the following at December	er 31:	
	2020	2019
Cash on hand	\$ 950	\$ 950
Deposits with financial institutions Total cash	1,823,060	1,170,713

223,568 Money market mutual funds 13,260 19,232,796 20,558,987 Local Agency Investment Fund (LAIF) 6,982,758 7,195,825 Certificates of deposit 248.599 251,681 U.S. Treasury note 1,065,784 1,142,864 U.S. government agency securities 1,425,692 1,379,293 Investment Trust of California (CalTRUST) 28,971.971 30,749,136 Total investments \$ 31,920,799 Total cash and investments \$ 30,795,981

(Data source for Table 6-27, above is SFWPA, AFS, 2021h)

As shown in Table 6-27 above, of December 31, 2020, and 2019, the carrying amount of the Agency's bank deposits totaled \$1,823,060 and \$1,170,713, and the bank balances totaled \$1,901,292 and \$1,272,095, respectively. The differences between the carrying amounts and the bank balances are due to the normal deposits in transit and outstanding checks. On December 31, 2020, and 2019, the uninsured balances were \$1,401,292 and \$841,274, respectively, which were collateralized by securities held by the pledging financial institution, but not in the name of the Agency. Negotiable certificates of deposit, which are all below the federal depository insurance limit, are excluded from the amounts above. U.S. Treasury and U.S. Government Agency securities in the amount of \$1,31 7,465 and \$1,391,463 as of December 31, 2020, and 2019, respectively, were held.

6.8.6 Outstanding Debts and Liabilities

For local government agencies, liabilities typically include current liabilities such as accounts payable, salaries payable, bond interest payable, and long-term liabilities such as serial bonds payable, installments payable, and contracts payable. For the SFWPA, current assets exceeded current liabilities by \$22,613,748. Liabilities for both pension and Other Post-Employment Benefits (OPEB) are accounted for in full compliance with current governmental accounting standards (SFWPA, AFS, 2021h). In FY 2020, the total of the Agency's long-term liabilities was almost \$54 million (due after one year from FY 2020), as shown in Table 6-28, an increase of \$885,696 over the previous year due to the annual calculation of the liabilities associated with pension and other post-employment benefits (SFWPA AFS, 2021h).

Table 6-28: Long-Term Liabilities

	January I, 2020	Additions	Reductions	December 31, 2020	Duc Within One Year	Due After One Year
2016 Certificates of Participation Installment Purchase Agreement	\$ 25,610,000 7,226,452		S (600,000) (1,476,612)	\$ 25,010,000 5,749,840	\$ 615,000 1,547,584	\$ 24,395,000 4,202,256
Total Unamortized premiums	32,836,452 453,582		(2,076,612) (16,903)	30,759,840 436,679	2,162,584	28,597,256 436,679
Total Debt and Loans	33,290,034		(2,093,515)	31,196,519	2,162,584	29,033,935
Compensated absences Net pension liability Net OPEB liability	1,200,748 5,238,532 15,826,053	\$ 622,496 701,997 2,874,078	(646,639) (506,488)	1,176,605 5,940,529 18,193,643	396,893	779,712 5,940,529 18,193,643
Total Long-Term Liabilities	\$ 55,555,367	\$ 4,198,571	\$ (3,246,642)	\$ 56,507.296	\$ 2,559,477	\$ 53,947,819

The South Feather Water and Power Agency Financing Corporation can issue debt on behalf of the District, such as the 2016 Certificates of Participation. Specifically, payments for both the 2016 Miners Ranch Water Treatment Plant Improvement Project Certificates of Participation (COP) and the 2019 Installment Payment Agreement (IPA) had a due date of April 1, 2020, and were paid the last week of March. The remaining outstanding balances are \$25,010,000 for the COPs and \$6,496,810 for the IPA.

The debt service coverage ratios for FY2020 and FY2019 are presented in Table 6-29 below. In 2020 the debt coverage ratio was 0.17, and this is less than the required ratio of 1.25. The ratio decline is likely due to the reduced hydroelectric revenue resulting from the drought in 2020.

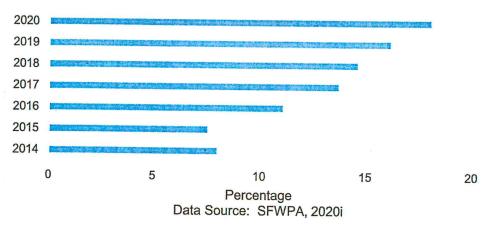
	2020	2019
ACTUAL DEBT SERVICE PAYMENTS (CASH BASIS)		
2016 Certificates of Participation - principal	\$600,000	\$580,000
2016 Certificates of Participation - interest	\$844,675	\$862,075
Installment Purchase Agreement - principal	\$1,476,612	\$773,548
Installment Purchase Agreement - interest	\$325,928	\$127,722
TOTAL ACTUAL DEBT SERVICE PAYMENTS	\$3,247,215	\$2,343,345
Debt Coverage Ratio - Actual	0.17	4.36
Required Ratio	1.25	1.25
DEBT SERVICE COVERAGE RATIO WITH FULL YEAR PURCHASE AGREEMENT PAYMEN	R OF INSTAL TS	LMENT
Net revenues	\$564,155	\$10,225,671
Total 2016 Certificates of Participation debt service payments	\$1,444 ,675	\$1,442,075
Installment Purchase Agreement - principal (represent 2020 payments) *	\$1,476,612	\$1,547,585
Installment Purchase Agreement - interest (represent 2020 payments) *	\$325,928	\$254,955
Total	\$ 247,215	\$3,244,615
Debt Coverage Ratio - Including Full Year of Installment Purchase Agreement Payments	0.17	3.15
	1.25	1.25
Required Ratio		

<u>Bond Ratings</u>: The Standard & Poor's publishes credit ratings, and they periodically review SFWPA in relation to its obligations with the 2016 Miners Ranch Treatment Plant Improvement Project Certificates of Participation. Their review concluded with no change in the "A" rating/stable outlook.

Pension Payments: On behalf of its full-time employees, SFWPA contributes the pension payments to the California Public Employees Retirement System (CalPERS), a multiple-employer public employee defined benefit pension plan. CalPERS provides retirement, disability, and death benefits to plan members and beneficiaries. CalPERS acts as a common investment and administrative agent for participating public entities within the State, including SFWPA. Copies of CalPERS' annual financial report may be obtained from its website and its executive office at 400 Q Street, Sacramento, California 95811. The pension contribution requirements of plan members and SFWPA are established and may be amended by the SFWPA Board of Directors. SFWPA also provides continued health insurance coverage for retired Agency employees, officials, and dependents who meet CalPERS eligibility requirements and have been employed by the Agency for a minimum of ten years (Stiffel, 2016). Please note that SFWPA has designated \$3,660,895 in its Retiree Benefits Fund for the OPEB. However, since these funds are not held in an irrevocable trust specifically for retiree health benefits, these amounts are not considered to be plan assets. They do not offset the total OPEB liability.

Figure 6-18, below, depicts the relationship between pension contributions as a percentage of covered-employee payroll. GASB 68 revised and established new financial reporting for pensions effective for 2015. This percentage is calculated using the following formula: contributions in relation to the actuarially determined contribution divided by covered payroll.





The percentage of pension contribution is increasing each year, and the higher percentage reflects that a greater percentage of funds are dedicated to pension contributions in comparison to covered-employee payroll. SFWPA's pension contribution to payroll ratio remains less than (i.e., better than) the percentage paid by other similar water districts, such as the El Dorado Irrigation District, which was 30.8 percent in 2019. Ideally, LAFCO will continue to monitor net pension liability and the pension contribution to payroll ratio to consider long-term fiscal trends as a more extensive time series of data becomes available. Details about SFWPA's pension liabilities are provided in Table 6-30 below.

Table 6-30: Net Pension Liability

SCHEDULE OF THE PROPORTIONATE SHARE OF THE NET PENSION LIABILITY Last Ten Years

	Year Ended December 31:													
	_	2020	_	2019	_	2018	_	2017	_	2016	_	2015	_	2014
Proportion of the net pension liability		0.140835%		0.130820%		0.121640%		0.120450%		0.111181%		0.101384%		0.110077%
Proportionate share of the net pension liability	S	5,940,529	S	5,238,532	S	4,584,129	S	4,748,058	S	3,862,276	S	2,781,438	S	2,720,542
Covered payroll - measurement period	S	5,949,907	S	5,867,873	S	5,952,396	S	5,627,825	S	5,570,519	S	5,746,942	S	5,118,332
Proportionate share of the net pension liability														
as a percentage of covered payroll		99.84%		89.27%		77,01%		84.37%		69.33%		48.40%		53.15%
Plan fiduciary net position as a percentage								2						
of the total pension liability		81.64%		82,26%		83.29%		81.13%		74.06%		78.40%		79.82%

Notes to Schedule:

Change in Benefit Terms: None.

Changes in assumptions: In 2017, the accounting discount rate was reduced from 7.65% to 7.15%

SCHEDULE OF CONTRIBUTIONS TO THE PENSION PLAN - MISCELLANEOUS PLAN Last 10 Years

	2020	2019	2018	2017	2016	2015	2014
Contractually required contribution employer calendar year Contributions in relation to the contractually	S 1,064,159	S 970,912	\$ 861,704	S 801,403	\$ 596,806	S 729,747	\$ 431,342
required contributions	(1,064,159)	(970,912)	(861,704)	(801,403)	(596,806)	(729,747)	(431,342)
Contribution deficiency (excess)	S -	S -	s .	S -	S -	S -	\$ -
Covered - employee payroll - calendar year	\$ 5,896,357	S 6,012,159	\$ 5,897,229	\$ 5,843,236	\$ 5,374,903	S 5,527,640	\$ 5,382,338
Contributions as a percentage of covered - employee payroll	18.05%	16.15%	14.61%	13.72%	11.10%	7.57%	8.01%
Date contributions were computed:							
July 1 to December 31	June 30, 2018	June 30, 2017	June 30, 2016	June 30, 2015	June 30, 2014	June 30, 2013	June 30, 2012
January 1 to June 30	June 30, 2017	June 30, 2016	June 30, 2015	June 30, 2014	June 30, 2013	June 30, 2012	June 30, 2011
Valuation date:	June 30, 2019	June 30, 2018	June 30, 2017	June 30, 2016	June 30, 2015	June 30, 2014	June 30, 2013
Measurement date:	June 30, 2020	June 30, 2019	June 30, 2018	June 30, 2017	June 30, 2016	June 30, 2015	June 30, 2014
Methods and assumptions used to determine contribution rates:							
Actuarial method			Entry	age normal cost r	nethod		
Amortization method				rcentage of payro			
Remaining amortization period			500 to 0,000 to 0,000 to 0,000	Not stated			
Asset valuation method			5-3	ear smoothed ma	rket		
Inflation	2.625%	2.75%	2.75%	2.75%	2.75%	2.75%	2.75%
Salary increases	Varies by entry age and service						
Investment rate of return	7.25%	7.375%	7.50%	7.50%	7.50%	7.50%	7.50%
Retirement age				50-67 years			

Note: The 2017 contributions in the table above were revised in 2018 to represent accrual basis contributions.

Omitted years: GASB Statement No. 68 was implemented during the year ended December 31, 2014. No information was available prior to this date. Future years will be added prospectively as they become available.

CalPers recognizes that the scale and multi-faceted nature of climate change presents a systemic risk to retirement portfolios across the board. The risks include:

- disruption to portfolio companies' supply chains and operations,
- heightened volatility to financial markets,
- reduced economic growth,
- · fixed assets (e.g., real estate), and
- impacts to the financial success of existing business models and portfolio companies CalPers has implemented its Sustainable Investments Program in an attempt to mitigate these systemic risks (CalPers, n.d.)

6.8.8 Rates

The rates charged by the three water service providers (SFWPA, TWSD, and Cal Water) in the Oroville Area were recently studied in a 2018 report entitled "Oroville Region Water Service Study "prepared by Northstar Engineering for Butte LAFCO (Northstar, 2018).

SFWPA charges fees for water supply, water treatment, distribution service, and capital improvement costs. Typically, during its December meeting, the Board of Directors approves a schedule of fees, rates, and charges for the fiscal year commencing January 1 of the following year. The District Board adopts and publishes its water rate schedule as part of its Rules and Regulations Governing Water Service document (SFWPA, 2021i). Monthly rates charged to customers for potable water have three components, including 1) monthly service charge, 2) rates of use charge, and 3) meter charge, as listed in Table 6-31 below.

Table 6-31: Potable Water Rates, 2021

o : o			
Service Charge (per mo	onth)		\$19 ⁷⁴
Multi-Family Residenti	al Units Service Charge		\$7.90 ⁷⁵
(per occupied unit p	er month)	*	
Rates-of-Use (in addition	on to Service Charge) ⁷⁶ :		
First 100 Units (10,0	000 cubic feet)	S0.	42/unit
After First 100 Unit		31/unit	
Non-Beneficial Use		S1.8	5/unit ⁷⁷
Oversized Meter Char	ge (in addition to Service Char	ge; not applicable to mobile home parks, ar	partment
Oversized Meter Char complexes, duplexe	s, multiple commercial units, etc.	ge; not applicable to mobile home parks, ap 78):	partment
Oversized Meter Char complexes, duplexe	s, multiple commercial units, etc. Meter Size	ge; not applicable to mobile home parks, ap 78): Monthly Charge	partment
Oversized Meter Char complexes, duplexe	s, multiple commercial units, etc. Meter Size 1"	ge; not applicable to mobile home parks, ap Monthly Charge S6.00	partment
Oversized Meter Char complexes, duplexe	s, multiple commercial units, etc. Meter Size 1"	ge; not applicable to mobile home parks, ap Monthly Charge	partment
Oversized Meter Char complexes, duplexe	s, multiple commercial units, etc. Meter Size 1"	ge; not applicable to mobile home parks, ap Monthly Charge	oartment
Oversized Meter Char complexes, duplexe	Meter Size 1"	ge; not applicable to mobile home parks, ap Monthly Charge	partment
Oversized Meter Char complexes, duplexe	Meter Size 1"	ge; not applicable to mobile home parks, ap Monthly Charge	partment

(Data Source: SFWPA, 2021i)

Charges are also collected for non-potable water, which is raw water often used for agricultural irrigation. Non-Potable Water Charges include a monthly service fee of \$21.50 and a rate-of-use charge, as listed in Table 6-32 below.

Table 6-32: Non-Potable Water Charge

Non-Potable Water-	
Service Charge (per month)	
Rates-of-Use (in addition to Service Charge):	
Miners Inch Accounts	
Metered (unit = 100 cubic feet)	8.67e ^{S1}
Flat Rate Accounts (per month)	
(All non-potable rates-of-use equate to \$39.00 per acre-foot.)	

(Data Source: SFWPA, 2021i)

In addition to monthly service fees, the Agency also has standard charges for one-time, non-routine items such as a new service charge at \$40.84, account transfer charge at \$20.85, development plan check charge at 3 percent of the engineer's estimate, and several other similar charges. SFWPA's Rules and Regulations indicate that fees can increase on an annual basis in accordance with the Engineering News Record's National Construction Cost Index.

Based on the information included in Section 6.8 above, the following written determinations make statements involving each service factor that the Commission must consider as part of a municipal service review. The determinations listed below in Table 6-33 are based upon the data presented and are recommended to the Commission for consideration. The Commission's final MSR determinations will be part of a Resolution that the Commission formally adopts during a public meeting.

TABLE 6- 33	TABLE 6-33: MSR DETERMINATIONS FINANCIAL ABILITY TO PROVIDE SERVICES		
	Indicator	Determination	
SFWPA-FIN-1	Summary financial information presented in a standard format and simple language.	Financial information is clearly articulated in the Annual Audited Financial Statement and budgets, which are prepared on an annual basis with a fiscal year that begins January 1 st . The SFWPA annual budget and financial statement are available to the public through the District website.	
SFWPA-FIN-2	District has a published policy for reserve funds, including the size and purpose of reserves and how they are invested.	SFWPA's policy for reserve funds is formally described in the 2005 agreement between SFWPA and the NYWD.	
SFWPA-FIN-3	Other financing policies are clearly articulated.	SFWPA's Annual Financial Statement contains a list of its accounting policies. Additionally, the District's Rules and Regulations describe a list of fees and financial responsibilities. The District Rules and Regulations document is readily available on the SFWPA's website.	
SFWPA-FIN-4	Compensation reports and financial transaction reports that are required to be submitted to the	The Schedule of Employee Pay Ranges are approved annually by the Board of Directors and available on the SFWPA website. Required reports	

	State Controller's Office are posted on the district website.	are sent to the California State Controller for Government Compensation.
SFWPA-FIN-5	Revenues exceed expenditures in 50% of studied fiscal years	Total revenues were greater than the total expenditures in four of the five study years.
SFWPA-FIN-6	Increases or decreases in net position	Changes to the Net Position are shown to be highly variable. Although the general trend of the Net Position is to increase year over the year, 2020 saw a decline in the Net Position due to reduced sale of hydroelectric power due to the drought.
SFWPA-FIN-7	Tax Revenues/Connection Ratio	Each water connection paid an average of \$9.80 in property tax for the year 2020. This ratio is based on property tax revenue of \$681,269 in 2020 and 69,500 water connections in SFWPA.
SFWPA-Fin-8	Rates were adopted by the Board of Directors	The SFWPA Board of Directors adopts and publishes its water rate schedule as part of its Rules and Regulations Governing Water Service document.
SFWPA-Fin-9	Rates are consistent with requirements of the State Water Resources Control Board, and the process for adopting rates are consistent with Proposition 218	Monthly rates charged to customers for potable water have three components, including: 1) monthly service charge, 2) rates of use charge, and 3) meter charge. SFWPA's Rules and Regulations indicate that fees can increase on an annual basis in accordance with the Engineering News Record's National Construction Cost Index.
SFWPA-Fin-10	Rates are readily available to constituents	Rates are displayed in the Rules and Regulations document on the District's website under the "publications" tab at: https://southfeather.com/publications/

6.8.9 Risk Management

Managing risks helps special districts reduce unforeseen costs associated with risks. Insurance policies assist special districts in managing risks. The Agency obtains insurance through the Association of California Water Agencies' Joint Powers Insurance Authority (ACWA/JPIA) as follows:

- Property insurance up to \$150 million, with up to \$10,000 deductible per occurrence;
- Flood insurance applies to vehicles and mobile equipment only and has a \$5 million program aggregate;
- Auto Insurance and General Liability Insurance up to \$58,000,000 per occurrence with a \$25,000 retrospective allocation point; and
- Worker's Compensation Insurance meets the statutory employer's liability limit of \$2 million excess per accident and per disease (Stifel, 2016).

ACWA/JPIA is self-insured up to a certain point per occurrence and then maintains reinsurance coverage through a larger insurance company.

6.8.11: Financial Challenges

Water districts sometimes face challenges that could affect their budget or financial ability to provide services. For example, SFWPA staff indicated that new changes to regulations from Federal and State agencies such as FERC, DSOD, SWRCB occur on an annual basis, and expenses associated with regulatory changes could potentially have a negative effect on each year's fiscal budget (SFWPA, 2021a).

The finances of the SFWPA are affected by its 2005 Agreement with North Yuba Water District (NYWD), which was adopted to help both agencies settle disputes about the utilization of water in the South Fork Feather River and the North Fork Yuba River. Litigation filed by NYWD against SFWPA claiming breach of contract and money owed could also impact the Agency's budget (SFWPA, 2021a).

The MSR consultants have noted that trends indicate that SFWPA may face issues in the future associated with aging water pipes, roadways, and other infrastructure. Additionally, other costs associated with being a water and hydroelectric utility may also increase in the future. Some costs may be beyond the direct control of the Agency. Therefore, the Board of Directors may wish to study various cost and funding options as future needs arise. For example, a proposition 218-notice process could facilitate adding capital infrastructure surcharges to the annual billings.

6.9 Joint Power Authorities

Effective January 1, 2017, Government Code §6503.6 and §6503.8 require LAFCo to be a repository for all Joint Powers Authority Agreements (JPA) within a county related to municipal service provisions. SFWPA participates in one JPA, as listed in the following paragraph.

The Agency is a member of the Association of California Water Agencies (ACWA) Joint Powers Insurance Authority (JPIA), which provides SFWPA's property, liability, auto, worker's compensation, and employee crime insurance policies. This is a pooled insurance coverage plan (SFWPA, 2021a). SFWPA staff regularly interface and have meetings with JPIA on general updates and items of specific interest to SFWPA (SFWPA, 2021a).

6.10 Cost Avoidance & Facilities Sharing

Cost Avoidance

This section highlights cost avoidance practices given necessary service requirements and expectations. Ideally, proposed methods to reduce costs would not adversely affect service levels. In general, water systems have a fixed cost associated with infrastructure, operations, and maintenance and have a variable cost related to demand. Given these constraints, SFWPA pursues an array of cost avoidance techniques that each contributes incrementally towards keeping costs at a reasonable level, as listed below.

- Cooperates with other municipal water purveyors and fire departments in Butte County and the City of Oroville to plan for the implementation of new fire safety regulations (SFWPA, UWMP, 2021g);
- Carefully utilizes its budgeting processes to serve as one means to avoid unnecessary costs;
- Participates in one Joint Powers Authority (ACWA JPIA), a pooled insurance program;
- · Utilization of a three-party bid process; and
- Utilization of an electronic payment system.
 (Data Source: SFWPA, 2021a).

Additionally, agreements with Yuba County Water District were originally intended as cost avoidance measures. "SFWPA closely coordinates with the North Yuba Water District (NYWD) regarding water supplies and their management (NYWD shares water storage facilities with SFWPA, as well as one of SFWPA's distribution facilities)." (SFWPA, UWMP, 2021g). It is anticipated that as the recent lawsuit from NYWD gets resolved, the cost management of this agreement will improve.

SFWPA successfully reduced overhead in 2020 through a functional reorganization of its staff (SFWPA, 2021a). The new organizational structure is shown on the org chart in Figure 6-3

SFWPA communicates directly with the Butte County Office of Emergency Management (OEM) during disasters or large-scale incidents and non-emergency (regular) periods to work on disaster planning, community preparedness, mitigation, and training. Additionally, SFWPA participated in the 2019 update of the Butte County Local Hazard Mitigation Plan.

Facilities Sharing

SFWPA has successfully shared recreation facilities with the Plumas National Forest, as detailed in the Recreation Service Section 6.6.6. SFWPA and the Plumas National Forest have worked together for many years, and this partnership enables SFWPA to implement the requirements of its FERC license. Additionally, several SFWPA hydroelectric facilities are located within the Plumas National Forest. This facility sharing results in cost savings for both agencies and provides a needed public service for both local families and tourists. Outdoor recreation is an important economic sector for the Oroville Region.

Another example of facilities sharing is the contractual agreement on hydro operations and water conveyance with North Yuba Water District (SFWPA, 2021a).

LAFCO Reorganization

It is sometimes beneficial for an agency to pursue structural or jurisdictional reorganizations to save money and avoid future overhead costs. SFWPA staff has indicated that there are no functional or structural reorganizations that the Agency is evaluating to benefit recipients of services or improve the provision of water collection services at this time.

Goals and Challenges

SFWPA's primary goals are to continue fulfilling its Mission Statement and implementing its new Urban Water Management Plan, new Strategic Plan, and similar plans.

Similar to most water districts in California, SFWPA will likely face several challenges in future years. Solving challenges is tricky because the needs of each water district are unique, and solutions are not one-size-fits-all. However, considering trends and issues yields some potential future challenges that water districts may face, as listed below:

- Responding to future events or opportunities;
- Implementing innovative technology to improve the performance of water systems. For example, SFWPA may find practices to optimize its existing renewable energy program. New technologies like pumped hydro may become cheaper and more versatile in the future. As another example, in California recycled wastewater and captured stormwater are gaining in popularity;
- Regulatory constraints and associated cost concerns are a potential future challenge.
 Specifically, in regards to the new FERC license for SFWPA, new conditions of approval or mitigation may be challenging to achieve or may become a financial challenge (SFWPA, 2021a);
- Infrastructure resiliency and emergency preparedness are important. For example, communities in California are considering the need to make their water utility systems more resilient, especially during natural disasters and changes in weather patterns; and
- Using alternative financing techniques such as grant applications or revenue bond issuance to finance construction and infrastructure replacement.

Mutual Aid

SFWPA has four Mutual Aid agreements with the following agencies: NYWD, Lake Madrone CSD, Berry Creek CSD, and Paradise Irrigation District (SFWPA, 2021a). These mutual aid agreements allow for SFWPA to perform emergency work (labor, equipment, parts) at "cost" to the receiving entity at the time of emergency need. The agreements are periodically reviewed (personal communication, R. Moseley, 7/11/22). Typically, these types of maintain mutual aid agreements with neighboring purveyors, along with contingency water supply resources, can help an Agency address potential future emergency conditions which could result in lost water supply. This is the reason why LAFCo supports mutual aid agreements.

6.10.1 Determinations for Shared Facilities

Based on the information included in Section 6.10 above, the following written determinations make statements involving each service factor which the Commission must consider as part of a municipal service review. The determinations listed below in Table 6-34 are based upon the data presented and are recommended to the Commission for consideration. The Commission's final MSR determinations will be part of a Resolution that the Commission formally adopts during a public meeting.

Table 6-34: FACILITIES	MSR DETERMINATION: STATUS OF, AND OPPORTUNITIES FOR, SHARED			
Number	Indicator	Determination		
SFWPA-SHA-1	The Agency collaborates with multiple other agencies for the delivery of services within its boundary.	SFWPA collaborates with multiple other agencies for the delivery of services within its boundary. For example, SFWPA closely coordinates with the Plumas National Forest to provide recreation facilities.		
SFWPA-SHA-2	Agreements for mutual aid or any other appropriate agreement (i.e., Tax Sharing Agreement) are periodically reviewed to ensure fiscal neutrality.	SFWPA has Four Mutual Aid agreements with the following agencies: NYWD, Lake Madrone CSD, Berry Creek CSD, and Paradise Irrigation District. The Agreements for mutual aid periodically reviewed to ensure fiscal neutrality.		
SFWPA-SHA-3	Other practices and opportunities that may help to reduce or eliminate unnecessary costs are examined by the District periodically. Ideally, there is a balance between cost efficiency and risk reduction strategies.	In the recent past, SFWPA has implemented an array of cost avoidance techniques that each contributes incrementally towards keeping costs at a reasonable level, including cooperation with other municipal water purveyors and fire departments in Butte County to implement new fire safety regulations, utilizing its budgeting processes to avoid unnecessary costs, three-party bid process, and electronic payment system. No other costefficiency or risk-reduction strategies have been identified.		

6.11: BIBLIOGRAPHY

- American Society of Civil Engineers, Region 9. May 2019. Report Card for California's Infrastructure 19. 132 pages. Retrieved on September 21, 2021, from: https://infrastructurereportcard.org/state-item/california/>.
- Butte County Association of Governments (BCAG). August 14, 2020. Post-Camp Fire Regional Population and Transportation Study. 150-pages. Retrieved June 29, 2021, from: http://www.bcag.org/documents/Camp%20Fire/Post-Camp-Fire-Study-Appendix-A.pdf>.
- Butte County Association of Governments (BCAG). January 21, 2021. Post-Camp Fire Regional Population and Transportation Study, Appendix A, Memorandum, Table 3: Population Forecast 2018 2045, Post-Camp Fire Study 2018 2045 Forecast. Technical contributions by Fehr & Peers. 150-pages. https://postcampfirestudy.com/>.
- Butte County Association of Governments (BCAG). April 14, 2021. Post-Camp Fire Regional Population and Transportation Study. 9-pages. Retrieved June 29, 2021, from: http://www.bcag.org/documents/Camp%20Fire/Post-Camp-Fire-Study-Final-Report.pdf
- Butte County. (July 2021b). Climate Change Vulnerability Assessment. 68-pages. Retrieved September 3, 2021 from:
 .
- Butte County Office of Emergency Management (OEM). (November 5, 2019). Butte County Local Hazard Mitigation Plan. Contributions from Foster Morrison. Retrieved on September 3, 2021, from: http://www.buttecounty.net/oem/mitigationplans>.
- Butte County. (July 2021b). Climate Change Vulnerability Assessment. 68-pages. Retrieved September 3, 2021 from:
 .
- Butte County Office of Emergency Management (OEM). (November 5, 2019). Butte County Local Hazard Mitigation Plan. Contributions from Foster Morrison. Retrieved on September 3, 2021, from: http://www.buttecounty.net/oem/mitigationplans>.
- Butte Local Agency Formation Commission (LAFCO). June 1, 2006. Domestic Water and Wastewater Service Providers, Final Municipal Service Review. 492-pages. Retrieved on July 30, 2021, from: https://www.buttelafco.org/domestic-water-wastewater>.
- Butte Local Agency Formation Commission (LAFCO). April 2007. South Feather Water & Power Agency. Municipal Service Review: Agency Characteristics.
- California Auditor. 2020. Government Compensation Website, On-line Database. Retrieved on October 8, 2021, from:

 https://publicpay.ca.gov/Reports/SpecialDistricts/SpecialDistrict.aspx?entityid=3197&year=2020.

- California Department Of Finance Demographic Research Unit. May 1, 2021. Table E-1, Population Estimates For Cities, Counties, and the State January 1, 2020, and 2021. Sacramento, California. Retrieved on September 18, 2020, from: http://www.dof.ca.gov/Forecasting/Demographics/Estimates/E-1/.
- California Department of Finance Demographic Research Unit. May 2020. E-4 Population Estimates for Cities, Counties, and the State, 2011-2020, with 2010 Census Benchmark. Sacramento, California. Retrieved on September 18, 2021, from: http://www.dof.ca.gov/Forecasting/Demographics/Estimates/e-4/2010-20/.
- California Department of Finance. July 2021. Demographic Research Unit. Report P-2A: Total Population Projections, California Counties, 2010-2060 (Baseline 2019 Population Projections; Vintage 2020 Release). Sacramento, California. Retrieved on August 23, 2021, from https://www.dof.ca.gov/Forecasting/Demographics/projection.
- California Drinking Water Watch. Drinking Water Division. South Feather Water and Power Agency Water Systems Report. Available online at: http://sdwis.waterboards.ca.gov/PDWW/index.jsp. Accessed July 13 2021.
- California State of, Governor's Office of Planning and Research (OPR). August 2003. Local Agency Formation Commission Municipal Service Review Guidelines Final. 107-pages.
- California Integrated Water Quality System (CIWQS). South Feather Water and Power Agency At-A-Glace Report. Available online at: http://ciwqs.waterboards.ca.gov/ciwqs/readOnly/CiwqsReportServlet?reportName=facilityAtAGlance?inCommand=reset. Accessed 14 July 2021.
- California, State of, Office of Environmental Health Hazard Assessment (OEHHA). Jan 28, 2021. Final Human Right to Water Framework and Data Tool (CalHRTW 1.0), including interactive web tool and report. Retrieved on Sept. 1, 2021, from https://oehha.ca.gov/water/report/human-right-water-california.
- California, State Water Resources Control Board (SWRCB). November 2017. Water Quality Certification for the South Feather Water And Power Agency South Feather Power Project Federal Energy Regulatory Commission Project No. 2088. Authored by Ms. Meiling Colombano, Sacramento, CA. 48-pages. Retrieved on November 6, 2021, from: https://www.waterboards.ca.gov/waterrights/water_issues/programs/water_quality_cert/docs/ferc2088/sf%20dwqc%20ext%20comment%20period.pdf.
- California, State of, Water Board. 2021. On-line Database entitled "CA Drinking Water Watch Water System Details." Retrieved on October 27, 2021, from: https://gispublic.waterboards.ca.gov/portal/apps/webappviewer/index.html?id=272351aa7db14435989647a86e6d3ad8.
- California Public Retirement System (CalPers). (n.d.) Webpage entitled "Climate Change". Retrieved online in September 2022 from https://www.calpers.ca.gov/page/investments/sustainable-investments-program/climate-change.



SOUTH FEATHER WATER & POWER AGENCY

TO: Board of Directors

FROM: Rath Moseley, General Manager

DATE: May 15, 2023

RE: California Water Plan Update 2023

Agenda Item for 5/23/23 Board of Directors Meeting

The purpose of this item is to share information from a Reservoir Reoperation workshop held on May 3,m 2023.

Workshop topics included:

- a. Purpose of RMS (Resource Management Strategy)
- b. Forecast Informed Reservoir Reoperations approach
- c. Benefits of FIRO
- d. Challenges

Reservoir Re-operation

Resource Management Strategy California Water Plan Update 2023

If feasible, please limit to 20 pagès. Lead Author: Jim Wieking Contributing Authors: [Names]

Note: The headings in bold below are standard headings to be used in all RMSes. The notes below those headings are not necessarily subheadings but instead are guidance for subtopics or "talking points."

Introduction

The 2018 California Water Plan described system reoperation as a resource management strategy that for "water resources means changing existing operation and management procedures for a water resources system consisting of supply and conveyance facilities and end user demands with the goal of increasing desired benefits from the system." That RMS noted that reoperation of existing facilities usually serves one or more of three basic purposes:

- 1. Addresses a specific problem(s) and/or need(s).
- 2. Improves efficiencies.
- 3. Adapts facilities to anticipated future changes (changes in water demands, legal and regulatory constraints, and key physical variables such as climate).

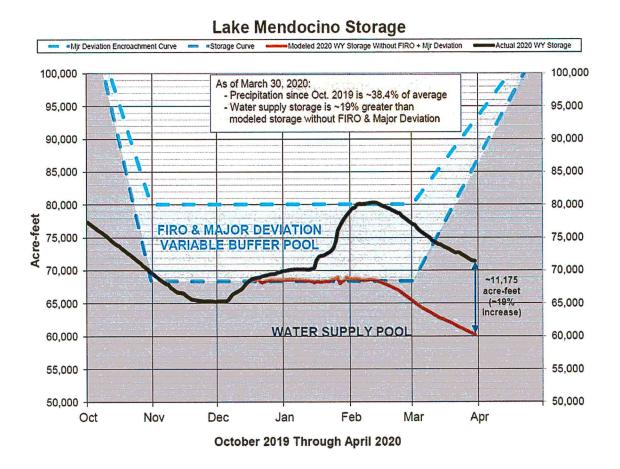
The 2018 strategy documents findings of DWR's System Reoperation Study (SRS) program that explored and assessed reoperation concepts associated with one local, large reservoir and several large federal and state reservoirs. One of the reoperation elements described in the SRS was reoperation of multi-purpose reservoirs to facilitate improved performance in one or more of those purposes. This Reservoir Reoperation RMS focuses on this kind of reoperation specifically, describing several programs that facilitate consideration of reservoir reoperation and demonstrate mechanisms to advance and implement reoperation concepts in California.

California's Water Supply Strategy (August 2022) makes a State commitment to, "work with the U.S. Army Corps of Engineers leadership to accelerate the pace at which the manuals guiding reservoir operations are updated to reflect a changed climate." This commitment reflects a general acknowledgement that we are continuing to improve forecasting, data, and management of our water resources as we plan for a changing climate future.

Forecast Informed Reservoir Operations

One promising reoperation pathway is Forecast Informed Reservoir Operations (FIRO), a reservoir-operations strategy that better informs decisions to retain or release water by integrating additional flexibility in operation policies and rules with enhanced monitoring and improved weather and water forecasts (American Meteorological Society; 2020). FIRO represents a relatively low cost alternative to improving water management, because at most locations it only seeks to modify the regulations for reservoir management and does not require the construction of any hard infrastructure. Under USACE leadership, FIRO is progressing as a Research and Operations collaboration effort, and has been successfully applied at Lake Mendocino in the Russian River Basin, showing nearly 20% more water storage with FIRO operations in Water Year 2020 alone. The graphic below shows operations with and without FIRO, indicating the potential scale of benefits, which will differ based upon the reservoir and weather.

Figure 1



There may be opportunities to implement FIRO-like concepts at reservoirs that are not USACE-related facilities, but for discussion purposes here, focus is on the USACE FIRO efforts. The number of FIRO projects with USACE is being expanded in the Russian River Basin (Lake Sonoma), in the Santa Ana River Basin (Prado Dam and Seven Oaks Dam), and the Yuba-Feather River Basin (New Bullards Bar Dam and Oroville Dam). New Bullards Bar and Oroville are combined in one study and update because their Water Control Manuals have shared responsibility to coordinate reservoir releases to meet specific flood flow targets on the Feather River. Each of these FIRO projects are engaging experts and stakeholders in civil engineering, hydrology, meteorology, biology, economics and climate from federal, state and local agencies. Scripps Institution of Oceanography's Center for Western Weather and Water Extremes is an essential partner in these efforts, advancing understanding of extreme weather events, including atmospheric rivers, and developing tools and science to enable multipurpose reservoir operators to use the best available science to inform their actions, including forecasts. The US Army Corps of Engineers is assessing FIRO suitability at other appropriate sites throughout the U.S. The keys to FIRO success reside in (1) a local champion, (2) intentional collaboration, (3) research and operations partnership and (4) a shared vision for implementation. Ultimately, in these aforementioned watersheds FIRO is implemented by USACE with water control manual (WCM) updates.

A primary mission of the USACE is flood risk reduction, including operating and maintaining flood risk management infrastructure that includes dams. When federal funds are used to construct a dam that includes flood mitigation or navigation as an authorized purpose, the U.S. Army Corps of Engineers (USACE) becomes responsible for prescribing the regulations corresponding to that purpose pursuant to Section 7 of the U.S. Flood Control Act of 1944. The prescribed regulations comprise the water control plan (WCP), and the WCP is found in the document that contains other pertinent information about the dam and reservoir called the water control manual. The WCP guides aspects of reservoir operations such as storage requirements and water release decisions for the dam. USACE guidance states that WCPs "should be reviewed no less than every 10 years and shall be revised...as necessary to conform with changing requirements resulting from developments in the project area and downstream, improvements in technology, improved understanding of ecological response and ecological sustainability, new legislation, reallocation of storage, new regional priorities, changing environmental conditions and other relevant factors." However, many WCPs and WCMs have not been updated for several decades, often due to a lack of USACE appropriations. A WCM update will consider FIRO if the appropriation includes language regarding FIRO. Updating the WCMs can make California's reservoirs more resilient to climate change, as indicated in the Water Supply Strategy.

Forecast skill has improved during recent decades. At the same time, climate change has induced changes in California's hydrology. Reservoirs and water resource projects were developed and implemented, including operation rules and guidance, based upon historical hydrology that was available when many of California's reservoirs began operation. This means that many of the State's reservoirs reflect operation rules that are based upon basin hydrologies that are fifty or more years old. In the past, this approach was based upon the idea that the hydrologic record was a good predictor of future hydrology. However, with climate change science advancing, we now understand that past hydrology is often an inadequate predictor of future hydrology. The effects of climate change on hydrology in California are already being observed.

Storage for reservoir purposes and priorities - capacity dedicated to flood, water supply, ecosystem support, hydropower generation - may become increasingly inadequate, as both droughts and floods are intensified with climate change effects. Each reservoir in the State possesses a certain amount of storage, frequently shared by multiple purposes, including flood management, water supply for agriculture, urban and environmental deliveries, instream environmental needs, power production, and recreation. In many cases, climate change effects will lead to increased flood risk, decreased water supply reliability, continued decline of aquatic species that rely on instream flows, and other uses with decreased reliability. While there is great value in these multi-purpose projects generally, in practice reservoir operations are becoming increasingly rigid (i.e., lacking flexibility) often due to additional requirements or commitments from each reservoir, so that an improvement or increase in commitment to one water management sector comes at some cost to other sectors. Reservoir reoperation may provide some additional operational flexibility for various water management purposes.

Reservoir re-operation, particularly Forecast Informed Reservoir Reoperation (FIRO), is expanding rapidly and gathering attention from water management agencies. In 2016, the Army Corps of Engineers updated Engineer Regulation 1110-2-240 to allow forecasted conditions to be used for planning future operations.

The Army Corps of Engineers has received appropriations to complete Water Control Manual updates for several dozen reservoirs throughout the West, including some in California. FIRO strategies will be considered during the WCM update process at reservoirs in California, which include the following:

• [need updated list of CA reservoirs that have appropriations for WCMU and that may consider FIRO]

4

Conjunctive Use Recharge and Reservoir Reoperation

0

A second pathway for reoperation is demonstrated by California's Water Storage Investment Program, which includes three projects that have a reservoir reoperation component. California's Water Supply Strategy directs the State to work with local proponents to complete the seven Proposition 1-supported storage projects and consider funding other viable surface storage projects. Of the seven continuing Water Storage investment Program projects, three are explicitly formulated to employ conjunctive use of surface and groundwater and then facilitate a reservoir reoperation that would provide ecosystem benefits downstream of Lake Oroville:

- Chino Basin Conjunctive Use Environmental Water Storage/Exchange Program
- Kern Fan Groundwater Storage Project
- Willow Springs Water Bank Conjunctive Use Project

Each of these reoperation projects would require agreements with one or more State Water Project (SWP) partners, the Department of Water Resources (DWR) and the California Department of Fish and Wildlife (CDFW) to re-operate Oroville Dam and manage the water to provide an ecosystem benefit.

For example, the Southern California Water Bank Authority is proposing the Willow Springs Water Bank Conjunctive Use Project (WSWB Project). The Willow Springs Water Bank is an existing facility located in the adjudicated Antelope Valley Groundwater Basin. The WSWB Project is proposed as a conjunctive use and reservoir reoperation project that would integrate the State Water Project (SWP) reservoir and conveyance system with south-of-Delta groundwater storage. The WSWB Project will leverage 500 thousand acre feet (TAF) of existing groundwater storage facilities and operate conjunctively with the SWP and provide ecosystem benefits north of the Delta. Operations of the WSWB Project to provide ecosystem benefits would require agreements with one or more SWP partners to forego SWP delivery in exchange for receiving WSWB Project water, and agreements with the Department of Water Resources (DWR) and California Department of Fish and Wildlife (CDFW) to re-operate Oroville reservoir and manage the water to provide the ecosystem benefit.

These examples point to a growing opportunity for reoperation in the SGMA era. Operating reservoirs in conjunction with groundwater is not new. For example, Santa Clara Valley has explicitly managed their reservoirs, surface water sources, and aquifers together to store and deliver water. However, operating with an explicit connection of surface and groundwater has been geographically limited. With the passage of SGMA in 2014, GSAs are looking to untapped surface water sources to

provide some assistance in recharging aquifers to help achieve GW sustainability. This is potentially another stressor on California's surface water systems, and by extension, reservoirs. In addition, GSAs now have authority to implement projects and manage both the recharge and extractions in their basins so that re-management of surface water flows can be used for recharge. Reservoir reoperation will be an important part more formal integrated operations of groundwater and surface water systems.

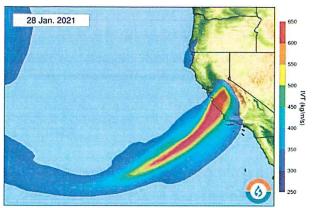
FIRO and Recharge

A related integrated opportunity can be developed by combining the reoperation elements described above - conjunctive use of surface and groundwater using recharge and FIRO. Orange County Water District (Prado Dam) is already integrating aquifer recharge and FIRO. The San Joaquin Basin Flood-MAR Watershed Studies assess adaptation strategies that include the elements described above - FIRO and managed aquifer recharge (i.e., FIRO-MAR). These studies emphasize planning at the watershed scale, identifying water management challenges and opportunities for three water management sectors - flood, ecosystems, and water supply and include up to four components: conjunctive use of surface and groundwater, revising reservoir operation rules to integrate FIRO, changed or additional downstream infrastructure and improved ecosystem flows and actions. Expanding from reservoir reoperation to a system reoperation can capture more benefits than a single reservoir reoperation alone.

A pilot study initiated for the Merced River watershed includes a study partnership of Department of Water Resources and Merced Irrigation District. Analytics are now complete, and documentation will be completed by mid-2023. Additional funding will provide similar studies for Calaveras, Stanislaus, Tuolumne, and Upper San Joaquin watersheds. These studies provide assessments of climate change vulnerability for flood, ecosystems, and water supply (surface and groundwater) as well as performance of Flood-MAR related adaptations, including combinations of FIRO and MAR.

Benefits of Reservoir Reoperation

If implemented, Reservoir Reoperation would increase the resilience of California's flood and water systems. The examples above of reservoir reoperation share a common attribute: expanding the effective storage of the water management system. By using the gains in weather forecasting for example, reservoir re-operation can safely provide more flexibility. This approach adaptively expands the capacity of existing reservoirs for either flood or supply purposes, or both. Climate change will increase storm and drought intensity, and FIRO can help reservoirs prepare for both.



The only major AR that made landfall in 2021. Shading shows the strength of the AR.

A water control manual update that includes consideration of FIRO can give reservoir operators updated forecasting information to optimize how the reservoir can be operated with current weather forecasting skill. More accurate predictions of incoming weather events, especially atmospheric river storms - the leading cause of floods in California - can mitigate flood risk by pre-releasing water in advance of a storm or, conversely, mitigating drought impacts by holding water back when no storms are in sight. FIRO implementation through WCM updates allows reservoir operators to adapt to climate change impacts on their systems.

A third strategy that has received more attention since SGMA is more formal coordination of surface (reservoir) and groundwater storage. Additional water stored from FIRO could be dedicated to a downstream purpose. If one of the purposes of doing a reservoir reoperation study is to create additional water for environmental purposes, then FIRO could have environmental instream benefits. In DWR's Merced Watershed Flood-MAR Watershed Study, which includes FIRO, setting environmental targets using this additionally stored water improved instream salmonid spawning habitat and seasonally inundated off-channel juvenile rearing habitat, in addition to recharging some of the opportunistically stored water. The Merced Study and the San Joaquin Basin Watershed Studies are demonstrating that combining reservoir reoperation (e.g., FIRO) with Managed Aquifer Recharge can provide multi-sector benefits, including flood, ecosystems, and water supply (surface and groundwater). These multi-sector solutions may provide an important climate change resilience opportunity for several watersheds in the State that have demonstrated vulnerability across those water management sectors.

The Lake Mendocino FIRO viability assessment showed benefits to endangered salmonids. Higher reservoir elevations reduce water temperature at depth, which keeps water temperatures cooler downstream, for improved fish success. Likewise, slower releases that can be made with more lead time in weather forecasts can benefit the hydrology needed for fish habitat.

The benefits from reservoir reoperation may be even more extensive if these concepts were applied more broadly to include systems (similar to the Oroville and New Bullards Bar in the Yuba-Feather Basin or Lake Mendocino-Lake Sonoma in the Russian River Basin). In the San Joaquin Valley, for example, the reservoirs operate somewhat independently for water supply, but for flood management, flood operations are coordinated by necessity, indicating some advantages of an integrated water management system. The flexibility benefits and potential for flood management and additional groundwater recharge would be greater if those reservoirs were operated together.

Economic Benefits of Implementation

Studies have been conducted to estimate the benefits of FIRO, which is a viable alternative to far more expensive infrastructure expansion.

The benefits of FIRO at Lake Mendocino were estimated to be more than \$9Million annually, including benefits to fisheries, water supply, recreation and agriculture.

FIRO at Prado Dam could recharge 7,000 acre-feet/ year of additional water, saving Orange County over \$6 million annually and avoiding costly alternatives.

In the Yuba-Feather watershed, if FIRO had been in place during the devastating flood of 1997, reservoir releases could have started sooner and flooding may have been reduced by 2 to 3 feet, saving millions of dollars in flood damages.

Challenges to Implementation

Despite considerable interest in the water management community, there remain legal, technical, and managerial challenges to implementation.

<u>Legal/bureaucratic/administrative challenges - Big process.</u>

The process used by Sonoma Water and partners to implement the FIRO at Lake Mendocino began with FIRO viability assessment, which included interim FIRO operations via USACE-approved deviations to the WCP, and finally implementation of

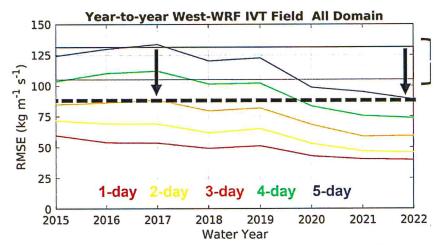
FIRO operations via a Water Control Manual Update (currently underway). Comprehensive WCM updates that include revisions to WCPs require a NEPA analysis. Depending on the complexity of the current operations, the potential impacts to the environment, and other factors, the time required to update a WCM could take several years.

A reservoir operations partner agency with USACE that wants a WCM updated with FIRO concepts should first consult with the appropriate USACE District Office. All reservoirs in California regulated by USACE are being screened for FIRO suitability, and this information should be consulted first. FIRO viability assessments typically take up to 5 years and include meteorology, additional observations, hydrology, water resources engineering, modelling and forecast skill assessment. Examples of FIRO assessments are available here

https://cw3e.ucsd.edu/firo/

Technical challenge - Forecasting

Forecasting weather events is becoming more accurate. An important skill for FIRO is the ability to forecast an atmospheric river-driven event. Improved forecasting skill may provide additional flexibility for reservoir operators. The Center for Western Weather and Water Extremes is running a regional forecast model, West-WRF, that is focused on improvements in forecasting atmospheric rivers. Through integrating new research and technologies, West-WRF has shown improvement in the atmospheric forecasts such that 5 day forecast errors for integrated water vapor transport (IVT; kg m⁻¹ s⁻¹, a measurement of an atmospheric rivers strength) are as good as 3-day forecast prior to WY 2018.



Caption: West-WRF root mean square error (RMSE) for forecasts of integrated water vapor transport, a measurement of AR strength at different lead times indicated by the color. The shaded region indicates the RMSE from West-WRF 30-day 5-day reforecast. Credit: Rachel Weihs, Center for the Western Weather and Water Extremes

Costs If Not Implemented

The alternative to reservoir reoperation is continued use of existing operations (e.g., continued use of the current Water Control Manual) and the costs associated with the existing operations. Existing WCMs determine the allocation of storage that can be used at the reservoir for water supply and flood protection. This allocation is written into law by Congressional approval. Without a WCM update or a FIRO study, there will be no new flexibility incorporated into the reservoir operations rules. Without a WCM update or FIRO study, reservoir operators lose the chance to improve operations based upon better weather forecasting and adaptions to changing hydrology.

Similarly, the cost of not implementing a WSIP recharge and reservoir reoperation would be continued operations using existing operations and consequently existing outcomes.

Climate Change Adaptation

Implementation of reservoir reoperation strategies can support resilience to climate change, as described above. Action 27.3 of the California Water Resilience Portfolio directs State agencies, "in cooperation with the U.S. Army Corps of Engineers and reservoir owners, evaluate the potential for implementing forecast-informed reservoir operations in watersheds where improved weather forecasting capabilities would allow reservoir operators to improve flood control and surface and ground water supply storage." This provides a clear connection between reservoir reoperation and climate change adaptation considerations.

Climate Change Mitigation

The potential for reservoir reoperation GHG reductions is feasible, but will be dependent upon existing conditions and potential implementation. For example, recharge of aquifers will relatively decrease pumping heads associated with groundwater extraction. However, some energy would likely be expended conveying water to recharge locations.

One of the potential benefits of FIRO is more water available for hydropower generation support green house gas mitigation. This needs to be evaluated at each reservoir independently.

[This RMS] and the Water Resilience Portfolio

(Megan Fidell will provide.)

Recommendations

Provide recommendations to accelerate implementation of this RMS. Please exclude recommendations that are "needs funding." [Any recommendations?]

Related Resource Management Strategies

A list of RMSes that are related in a meaningful way to this RMS.

References

Useful Web Links

ADA accessibility requires that electronic documents incorporate "meaningful web links." For example, when including in the body text the title of another published document, the title itself is hyperlinked to the source of that document. In the "Useful Web Link" section, the full title of the document (not linked) is followed by its URL. This allows audience members who are reading the document (say, this RMS) in printed form to access the other document by typing its URL into a browser. Another advantage of employing such a section is that it keeps URLs out of body text; they are quite unwieldy in body text, often creating exaggerated line breaks and otherwise making reading more difficult.

A good example of this section can be found in <u>California Water Plan Update</u> <u>2018</u>. (This is a meaningful web link!) Another example might be the term <u>hydrologic unit map</u>. This can be useful when wanting to avoid a lengthy explanation of what a term, such as "hydrologic unit map," means and involves.

. 7

e



SOUTH FEATHER WATER & POWER AGENCY

TO: Board of Directors

FROM: Kristen McKillop, Regulatory Compliance Manager

DATE: May 10, 2023

RE: FERC Security and Vulnerability Assessments, and Security Plan Updates

Agenda Item for 05/23/2023 Board of Directors Meeting

BACKGROUND

The Federal Energy Regulatory Commission (FERC) Division of Dam Safety and Inspections Security Program for Hydropower Projects Revision 3A outlines responsibilities for both physical and cyber security for dam owners licensed by the FERC.

As outlined in the Security Program Guidelines, a <u>Security Assessment</u> (SA) is a formal document that contains an evaluation of the security procedures and features at the dam, and is an integral part of the Vulnerability Assessment that must be completed for all Group 1 Dam. The SA evaluates the current state and appropriateness of the on-site security system and procedures and what needs to be done at a project or facility to address concerns regarding security. This assessment identifies if any security enhancements are needed for improved security, and these measures are to be incorporated into the Security Plan. The SA must be re-evaluated and completely reprinted (redone) every ten years. Additionally, each SA must be updated annually, with any on-site modifications to security systems/procedures must be addressed.

A <u>Vulnerability Assessment</u> (VA) formally documents the in-depth analysis of four important Security Risk factors: Consequence, Vulnerability, Threat (and its Likelihood), and Security Effectiveness. This multiple threat assessment ultimately leads to recommended changes to physical security or operational procedures that will serve to decrease overall risk. A multi-person team approach, consisting of several technical disciplines, the dam operator, and a security expert, has been found to be the best way to complete a VA at a dam. The VA must be re-evaluated and completely reprinted (redone) every five years. Additionally, each VA must be updated annually, with changes to parameters and conclusions highlighted from the previous year.

A <u>Security Plan</u> (SP) is a formal document that essentially serves as the "Standard Operating Procedures" for all security concerns (physical, cyber, and procedural) identified through the SA and VA at each of the dams and throughout the hydropower project. A separate Security Plan must be developed for each dam in an owner's inventory, and should document site specific concerns in a usable manner so that all operations, maintenance and dam safety staff are aware of, and able to initiate reactions to, security concerns. The SP must be updated with any site condition changes as they occur, and on an annual basis. Additionally, the SP

must be tested (exercised) at least every five years to prove that the SP is a useful and workable tool for staff, and that they are knowledgeable of its contents.

Licensees do not submit their SA/VA/SP to the FERC, however they must make the document available for review during each Dam Safety Inspection. In lieu of submitting the documents to the FERC, the Agency submits an annual letter to our FERC Regional Office by December 31 of each year, certifying compliance with all of the VA, SA, and SP requirements. For the calendar year 2022, we had to submit a certification of non-compliance.

<u>UPDATE</u>

Power Division staff developed a Request For Proposals (RFP) to solicit a firm qualified to conduct the Security Assessment, Vulnerability Assessment and Security Plan Updates. RFPs were issued to Consultants on March 13, 2023 by posting on the Agency's website and via direct email to ten dam safety industry firms. By the closing date of April 17, 2023, two proposals were received. Of the two proposals received, only one firm met the required Consultant Qualifications. Therefore, the other proposing entity was disqualified from consideration.

The attached RFP outlines the Power Division staff that would comprise the Review and Ranking team, as well as the Scoring criteria used to help focus on key elements of the proposal received. The team thoroughly reviewed the attached proposal from Gannett Fleming, and is highly confident in the firm's ability to complete the required scope of work based on their extensive experience conducting Security Assessments, Vulnerability Assessments and developing Security Plans that comply with FERC requirements.

RECOMMENDATION

Staff estimated costs for this project, and a line item was included in the 2023 Adopted Budget. Because the last Vulnerability Assessments were completed in 2010, staff could not accurately anticipate how much this effort may cost. Based on Requests for Information to clarify work scope, the firm included two additional line items of work not specifically called out as work tasks in the RFP that will assist in developing FERC compliant plans. The proposed not to exceed price is \$171,445.20, and based on the firms' extensive experience, staff recommends approval of a notice to proceed and approval of a contract to complete work according to the following schedule (a work breakdown schedule provides greater detail in the attached proposal):

Quarter of Work	Deadline for Completion	Task	
Q1 2023	March 13, 2023	Request for Proposals Issued to Consultants	
	March 27, 2023	Written Questions due	
Q2 2023	April 17, 2023	RFPs Due	
	May 23, 2023	Board Hearing/Notice to Proceed	
Q2/3 2023	TBD June/July/Aug	Conduct field Inspections	
02.2022	September 8, 2023	Draft Security Assessment Report due to SFWPA	
Q3 2023	September 22, 2023	Draft Vulnerability Assessment Report due to SFWPA	
	October 6, 2023	Final Security and Vulnerability Assessment reports due to SFWPA	
Q4 2023	November 9, 2023	Final Security Plan Updates due to SFWPA	
	November 27, 2023	Internal Training Framework due to SFWPA	

In order to authorize the General Manager to execute a contract on behalf of the Agency, the following action is recommended.

"I move authorizing the General Manager to award a contract to Gannett Fleming in the amount of \$171,445.20 to complete the Security and Vulnerability Assessments and Security Plan Updates in compliance with the Federal Energy Regulatory Commission (FERC) Security Program for Hydropower Projects Rev 3A guidelines, and authorize the General Manager to execute the appropriate documents."



SOUTH FEATHER WATER & POWER AGENCY

TO: Board of Directors

FROM: Rath Moseley, General Manager

DATE: May 18, 2023

RE: Memorandum of Understanding – HGEU and WTDEU

Agenda Item for 5/23/23 Board of Directors Meeting

Through negotiation with the Hydro Generation and Water Treatment Distribution Employee's Units, the Memorandum of Understanding consist of the following changes.

HGEU

Assembly Bill 1949 Employees: bereavement leave (2021-2022)

Article 12.7: In the event of the death of the mother, father, step-mother, step-father, brother, sister, step-brother, step-sister, son, daughter, step-son, step-daughter, wife, husband, domestic partner, father-in-law, mother-in-law, son-in-law, daughter-in-law, grandfather, grandmother, grandchild, or any relative or ward residing in the same home as the employee, funeral leave of three (3) days with pay may be taken. Employees are allowed to take up to five (5) total work days due to the death of the employee's "immediate family" in accordance with Government Code section 12945.7. Employees who have exhausted their allowance of paid leave as provided in this section may request to utilize sick leave, vacation or compensatory time off or unpaid leave if the employee wants to take additional time off up to the five (5) total work days of leave provided. Such bereavement leave for immediate family as provided in this section need not be taken in consecutive days, but must be used up within three (3) months of the date of the death of the immediate family member.

Article 15.7: Personal necessity leave

In addition to the holidays listed above, two days of personal necessity leave may be taken by all employees in the position of Hydro Maintenance Foreman and Operations Foreman during the calendar months of April thru September upon management approval.

WTDEU

Assembly Bill 1949 Employees: bereavement leave (2021-2022)

Article 12.7: In the event of the death of the mother, father, step-mother, step-father, brother, sister, step-brother, step-sister, son, daughter, step-son, step-daughter, wife, husband, domestic partner, father-in-law, mother-in-law, son-in-law, daughter-in-law, grandfather, grandmother, grandchild, or any relative or ward residing in the same home as the employee, funeral leave of three (3) days with pay may be taken. Employees are

allowed to take up to five (5) total work days due to the death of the employee's "immediate family" in accordance with Government Code section 12945.7. Employees who have exhausted their allowance of paid leave as provided in this section may request to utilize sick leave, vacation or compensatory time off or unpaid leave if the employee wants to take additional time off up to the five (5) total work days of leave provided. Such bereavement leave for immediate family as provided in this section need not be taken in consecutive days, but must be used up within three (3) months of the date of the death of the immediate family member.

As of this writing the proposed definitions and language for Compensatory Time Off (CTO) has not been voted and approved by the WTDEU. A future business item will be presented if an agreement is reached.

The following action is being requested:

"I move approval of the Memorandum of Understandings for the Hydro Generation Employees Unit and the Water Treatment & Distribution Employees Unit for a 3-year term expiring December 31, 2025 with the language as listed for Article 12.7 of both bargaining units and Article 15.7 for the HGEU."

M/S:
AYES:
NO's:
ABSTAIN:
PUBLIC:



SOUTH FEATHER WATER & POWER AGENCY

TO: Board of Directors

FROM: Kristen McKillop, Compliance and Regulatory Manager

DATE: May 10, 2023

RE: 2023 Water Supply and Demand Assessment

Agenda Item for May 23, 2023 Board of Directors Meeting

HISTORY

In response to the severe drought of 2012-2016, new legislation in 2018 created a Water Shortage Contingency Plan (WSCP) mandate replacing the water shortage contingency analysis under former law. The Agency's WSCP was adopted by the Board of Directors on June 22, 2021, and serves as the Agency's detailed operations plan for water shortages based on local conditions, constraints, and opportunities. The WSCP is a drought-planning tool to help improve preparedness for droughts and other impacts on water supplies, even though there is a low probability of shortage conditions in our specific watershed. A required component of the WSCP spelled out in California Water Code (CWC) §10632.1 outlines that "an urban water supplier shall conduct an annual water supply and demand assessment...or before June 1 of each year, submit an annual water shortage assessment report to the department with information for anticipated shortage, triggered shortage response actions, compliance and enforcement actions, and communication actions consistent with the supplier's water shortage contingency plan."

UPDATES

In January 2022, the State Water Resources Control Board adopted emergency water use regulations¹ that applied to all California residents, businesses, and public agencies. These restrictions that prohibited specific activities considered to be wasteful uses of potable water are expected to be rescinded in June 2023.

On March 28, 2022, Executive Order N-7-22 was issued by Governor Gavin Newsom outlining specific conservation and reporting expectations during the multiyear drought period. As of March 24, 2023, the Governor has lifted the drought state of emergency and rescinded the emergency Level 2 drought restrictions for the majority of the state. Due to the supply available to the Agency, along with the rescission of these emergency orders, the Agency does not have to factor the WSCP Levels into this 2023 Annual Assessment (Table 5 of the Assessment).

In April 2022 the DWR published the Annual Water Supply and Demand Assessment Guidance (Guidance) to help urban water suppliers prepare their Annual Assessment and submit their Annual Shortage Report to DWR in a way that is consistent with CWC §10632.1 requirements. The Guidance recommends that urban water suppliers use actual current year's conditions, as well as can be known prior to the July 1st due date, and project forward into one year using assumed dry year conditions. By following the Guidance recommendations, the one-year

projection would then start on July 1st (which is also the due date of the Annual Shortage Report) and continue through June 30th of the next calendar year.

CURRENT STATUS

The Agency's WSCP outlines that staff will present the Annual Assessment to the Board of Directors annually during the May Board meeting of each year. The following presentation outlines comprehensive hydrologic conditions for the previous and current water year conditions based on the last snow surveys conducted by SFWPA and DWR staff. Consumption data is routinely presented to the Board of Directors, however the consumption use is also summarized in this Annual Assessment in order for the Board to be fully informed as to whether or not any specific shortage response actions are necessary.

Key data sets to be presented to the Board include:

- SFWPA hydrologic data for reservoirs and streams in the Hydropower Project system
- Annual customer demand for both domestic and raw water
- Previous water year and to date water year supply availability
- Conveyance, treatment and distribution conditions
- Any other locally applicable factors

The attached presentation and state data tables demonstrate that the Agency continues to benefit from developed water supply that will adequately cover demand for both treated and raw water needs for the foreseeable future.

In a typical year, if the available water supply remains greater than customer demand, then no further action would be required. However, if in any given year, the WSCP may be enacted based on a number of conditions, including:

- An actual or potential local water supply restriction or emergency affecting the SFWPA system;
- A collective recommendation from Butte County Water and Resource Conservation and the City of Oroville;
 - A formal water supply shortage notification by the Governor.

RECOMMENDATION

Receive the 2023 Water Supply and Demand Assessment for information and direct staff to submit the report to the required state agencies as identified in California Water Code and the Agency's 2020 Water Shortage Contingency Plan.

"I move to accept the 2023 Water Supply and Demand Assessment report as presented and direct the General Manager to file the report with the California Department of Water Resources by July 1, 2023."

¹ https://www.waterboards.ca.gov/water_issues/programs/conservation_portal/regs/emergency_regulation.html



South Feather Water & Power

2023 Annual Water Supply & Demand Assessment

Board of Directors Meeting May 23, 2023

WSCP Regulatory Requirements

CWC §10632.1 - An urban water supplier shall conduct an *annual water supply and demand assessment*...on or before July 1 of each year, submit an annual water shortage assessment report to the department.

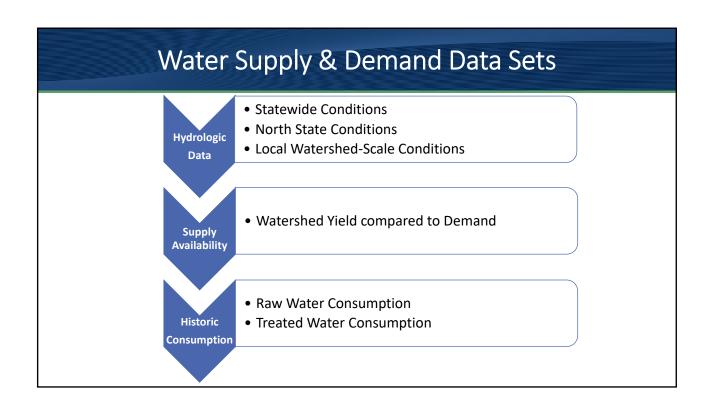
CWC §10632.3 - ...Upon proclamation by the Governor of a state of emergency under the California Emergency Services Act...based on drought conditions, the board defer to implementation of locally adopted *water shortage contingency plans* to the extent practicable.

SFWPA 2020 Water Shortage Contingency Plan, Section 2.1 - Staff will present the Annual Assessment to the Board of Directors annually during the May Board meeting of each year. This report will outline comprehensive hydrologic conditions for the historical period of record...in order for the Board to be fully informed as to whether or not any specific shortage response actions are necessary.

Water Supply & Demand Assessment

Key data sets to be presented to the Board include:

- SFWPA hydrologic data for reservoirs and streams in the Hydropower Project system
- Annual customer demand for both domestic and raw water
- Previous water year and to date water year supply availability
- Conveyance, treatment and distribution conditions
- Any other locally applicable factors



How does SFWPA use Water?

CONSUMPTIVE USES:

Irrigation Supply - Agency formation (1919) ~500 Raw Water Customers today 110 miles of Canal Lake Wyandotte storage reservoir

Initiated <u>Domestic Service</u> (1944) ~6,850 Treated Water Customers today 2 Treatment Plants

4 storage tanks throughout the system (6 million gallons)

141 miles of Distribution Mainline

18,677 AC-FT used in 2022

HYDROPOWER:

8 storage and diversion dams (1926) 4 hydro plants totaling 121.5 MW capacity 9 conveyance tunnels 21 miles of canal and flume conduit

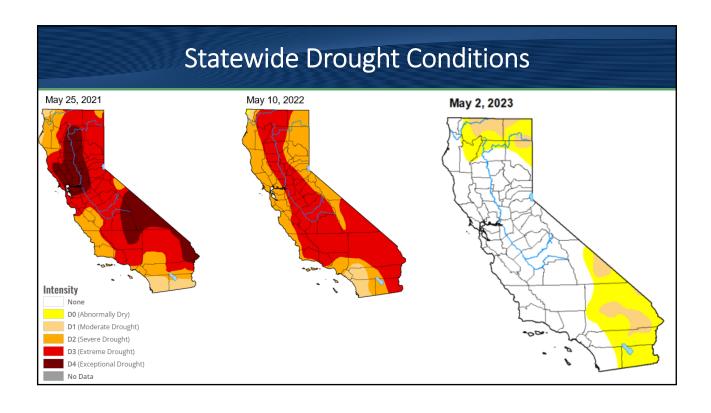
Fish Flows (as required in FERC license to operate)

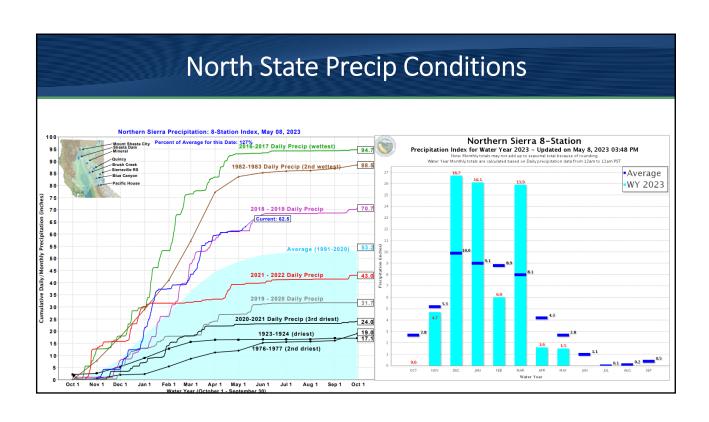
100,160 AC-FT used in 2022, but available for d/s users after passing through Kelly Powerhouse

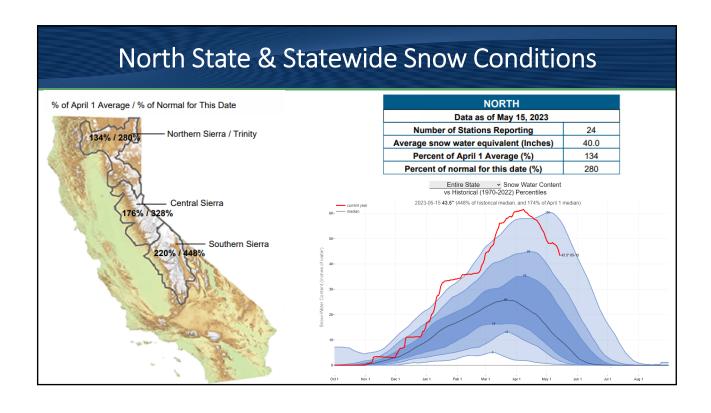
RECREATIONAL USES:

Associated with Hydro project (1963) Boating / White Water Camping

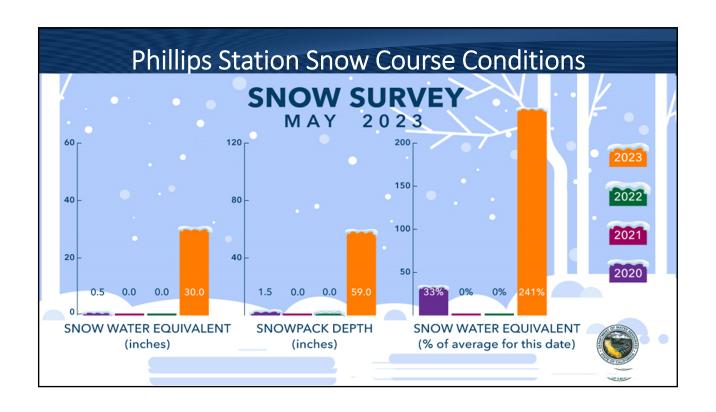
Permit No.	Water Right Application #	Priority Date	Permitted Use	Source Water	Place of Use	
S022067	Pre-1914	1908	Irrigation / Stock	Lost Creek	Lower Forbestown Ditch	
S022068	Pre-1914	1889	Irrigation / Stock	Pinkard Creek	Lower Forbestown Ditch	
1267	A001651	1920	Domestic, Irrigation, Recreation	South Fork Feather River	MRTP, Bangor Canal, Little Grass Res, Sly Creek Res, Lost Creek Res, Ponderosa Res	
1268	A002142	1920	Domestic, Irrigation, Recreation	Lost Creek	MRTP, Bangor Canal, Lost Creek Res, Ponderosa Res	
2492	A002778	1922	Domestic, Irrigation, Recreation	Lost Creek, Sucker Run	MRTP, Palermo Canal, Sly Creek Res, Lost Creek Res, Ponderosa Res	
1271	A002979	1922	Domestic, Irrigation	Lost Creek	MRTP, Bangor Canal	
10939	A013676	1950		South Fork Feather River, Lost Creek		
10940	A013956 1950	POWER	Slate Creek	Sly, Woodleaf, Forbestown, & Kelly Powerhouses		
10941	A014112	1950		South Fork Feather River, Lost Creek		

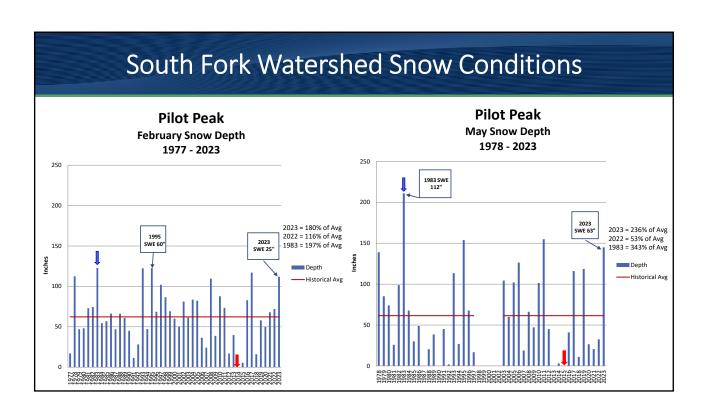








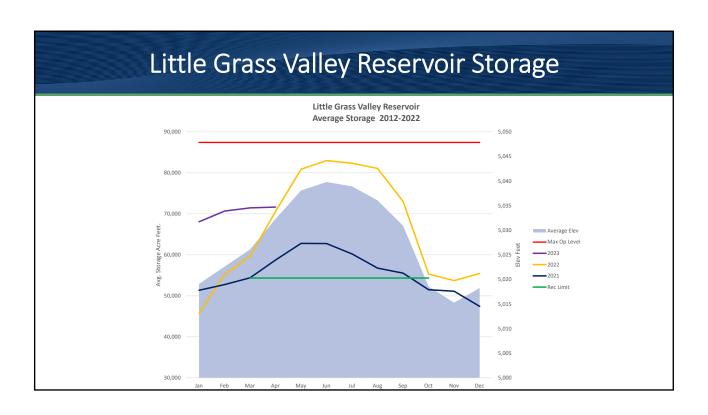


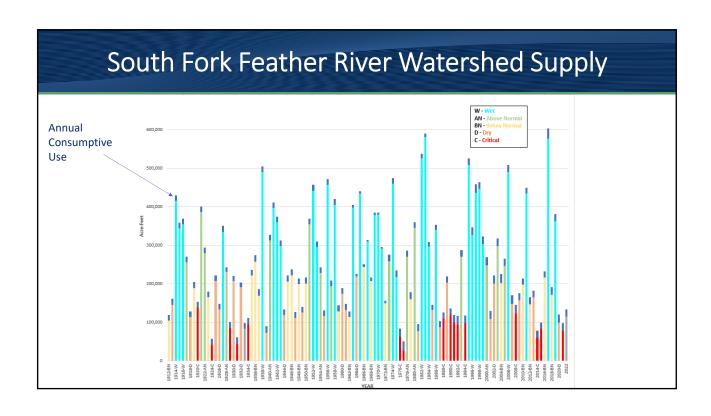


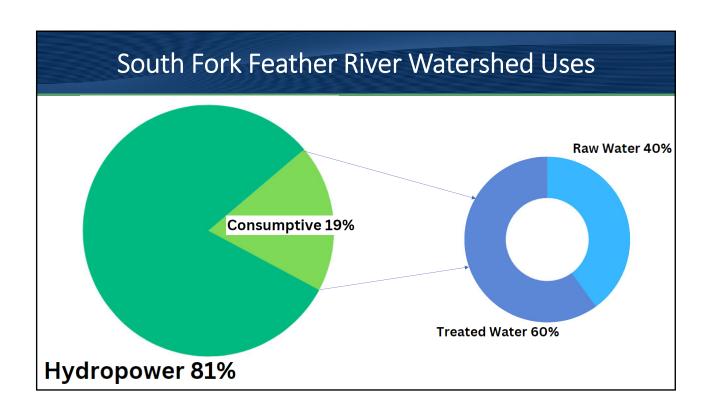












SFWPA – 2022 Consumption (MG)

Month	Treated	Supply Surplus	Raw	Supply Surplus
January	63	435%	24	822%
February	76	289%	25	785%
March	87	289%	32	591%
April	110	208%	56	295%
May	116	164%	108	85%
June	184	67%	165	35%
July	188	63%	202	-1%
August	212	45%	186	8%
September	245	25%	207	-4%
October	157	96%	157	28%
November	127	141%	62	224%
December	90	243%	23	563%
				19

19

Summary

- SFWPA continues to benefit from developed water supply that will adequately cover demand for both treated and raw water needs for the foreseeable future.
- The Agency takes seriously the charge to protect the resource for all available beneficial uses, and will continue to enhance data sets utilized in the Annual Assessments.

20

Next Steps

- QUESTIONS?
- Authorizing General Manager to submit the annual Water Supply & Demand Assessment to DWR before the due date of July 1, 2023.

21

Table 1. Annual Assessment Information

Tuble 1. Alliqui Assessment information	
Annual Assessment Information	
Year Covered By This Shortage Report(Required)	
Start: July 1,	2023
End: June 30.	2024
Volume Unit for Reported Supply and Demand	140
(Must use the same unit throughout	MG
Supplier's Annual Assessment Planning Cycl (Required)	
Start Month:	July
End Month:	
Data Interval:	Monthly (12 data points per year
Water Supplier's Contact Informatio (Required)	
	South Feather Water & Power Agency
	Kristen McKillor
	Regulatory Compliance Manager
	2310 Oro-Quincy Hwy
ZIP Code:	
Phone Number	530-534-1221
Email Address:	kmckillop@southfeather.com
Report Preparer's Contact Information	
lif different from above	
Preparer's Organization Name	
Preparer's Contact Name	
Phone Number	
Email Address:	
Supplier's Water Shortage Contingency Plan	
WSCP Title	SFWPA 2020 Water Shortage Contingency Plar
WSCP Adoption Date	6/22/2021
Other Annual Assessment Related Activities	
Activity	Timeline/ Outcomes / Links / Note
	SFWPA 2023 Water Supply and Demand Assessment
Annual Assessment / Shortage Report Approval Date	5/23/2023
Aumadi Assessifient / Shortage Report Approval Bate	3/23/2023

= From prior table = Auto calculated

Table 2: Water Demands ¹															
Use Type				Start Year:		2023		Volume	etric Unit U	sed ² :		MG			
Drop-down list May select each use multiple times These are the only Use Types that will t recognized by the WUEdata online submittal tool	Additional e Description (as needed)	Level of Treatment for Non- Potable Supplies Drop-down						Projected W	/ater Dema	nds - Volun	ne ³				
(Add additional rows as needed)		list	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Total by Wate Demand Type
Demands Served by Potable Supplies															
Other Potable			151.92	175.22	206.47	124.58	96.76	61.01	54.47	40.61	50.95	49.22	87.32	150.27	1248.8
Multi-Family			10.74	10.35	11.94	7.18	6.68	6.2	6.05	5.07	4.84	5.79	5.85	9.09	89.78
Commercial			4.95	4.89	4.88	4.87	4.84	4.83	4.81	4.8	4.81	7.4	4.83	4.88	60.79
Industria			0.05		0.04	0.03	0.02	0.01	0.03	0.02	0.01	0.01	0.02	0.04	0.31
Institutional/Governmenta			2.19			2.25	2.2	2.24	1.76	1.7	1.76	1.85	2.14	2.14	24.71
Landscape			1.34				1.38	0.43	0.08	0.08	0.1	0.06	0.38	1.11	10.01
Agricultural irrigatio			2.09	2.49	2.58	1.93	1	0.3	0.2	0.15	0.21	0.44	1.05	1.86	14.3
															0
			445	44.5	44.5	44.5	44.5	44.5	445	44.5	445	44.5	44.5		0
Losses			14.5	14.5	14.5	14.5	14.5	14.5	14.5	14.5	14.5	14.5	14.5	14.5	
		/lonth (Potable	187.78	211.57	244.65	156.54	127.38	89.52	81.9	66.93	77.18	79.27	116.09	183.89	1622.7
Demands Served by Non-Potable Suppl	ies														
Agricultural irrigation			202.44	186.31	207.65	156.7	61.86	30.2	15.22	13.81	14.9	13.87	108.53	164.9	1176.39
															0
															0
	•				, i	·								•	0
	•				, i	,	·	_	_	_	_		·		0
	Total by Mont	h /NI D - 4 - h I	1 202 44	186.31	207.65	156.7	61.86	30.2	15.22	13.81	14.9	13.87	108.53	164.9	1176.39

¹Projections are based on best available data at time of submitting the report and actual demand volumes could be different due to many factors.

²Units of measure (AF, CCF, MG) must remain consistent.

3When opting to provide other than monthly volumes (bi-monthly, quarterly, or annual), please see directions on entering data for Projected Water Demand in the Table Instructions.

Optional (for comparison purposes) Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Total
Last year's total demand	472	444	439	337	135	89	105	71	80	141	225	349	2,886
Two years ago total demand	314	295	317	261	184	144	131	131	141	139	189	271	2,517
Three years ago total demand	227	256	242	191	137	104	81	79	80	79	112	172	1,760
Four years ago total demand	234	525	222	190	132	101	81	80	80	78	137	204	2,064

= From prior tables
- 110111 prior tubics
= Auto calculated

Table 3: Water Supplies ¹																
Water Supply		Start Year		2023			Volum	netric Unit I	Ised 2.		MG					
Drop-down List May use each category multiple times.These are the only water supply categories that will be recognized by the WUEdata online	Drop-down List e each category multiple hese are the only water					Projected Water Supplies - Volume ³									Water Quality Drop-down	Total Right Safe Yield (optional)
submittal tool (Add additional rows as needed)		Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Total by Water Supply Type	List List	
Potable Supplies																
Surface water (not desal.)		306.83	306.83	306.83	306.83	306.83	306.83	306.83	306.83	306.83	306.83	306.83	306.83	3681.96		
														0		
														0		
											ļ	ļ	.	0		-
											1			0		.
				ł	ł	ł		1	1	ł	}	ł	ł	0		i
									1		1			0		
								1	1	1		1		0		
														0		
Total by I	Month (Potable	306.83	306.83	306.83	306.83	306.83	306.83	306.83	306.83	306.83	306.83	306.83	306.83	3681.96		0
Non-Potable Supplie																
Surface water (not desal.)		200.33	200.33	200.33	200.33	200.33	200.33	200.33	200.33	200.33	200.33	200.33	200.33	2403.96		
,														0		
														0		
														0		
														0		
Total by Mont	h (Non-Potable	200.33	200.33	200.33	200.33	200.33	200.33	200.33	200.33	200.33	200.33	200.33	200.33	2403.96		0

Notes: 2022 Consumptive watershed yield was,086 MG. Potable consumption will be 60.5% and Non-potable use will be 39.5%, and the total is assisgned as such over 12 months.

¹Projections are based on best available data at time of submitting the report and actual supply volumes could be different due to many factors.

²Units of measure (AF, CCF, MG) must remain consistent.

3When opting to provide other than monthly volumes (bi-monthly, quarterly, or annual), please see directions on entering data for Projected Water Supplies in the Table Instructions.

Optional (for comparison purposes) Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Total
eAR Reported Total Water Supplie	s 256	247	194	163	88	74	80	96	117	123	177	208	1,822

= Auto calculated	
= From prior tables	
= For manual input	

Table 4(P): Potable Water Shortage Assessment 1	ble 4(P): Potable Water Shortage Assessment 1				2023	Volumetric Unit User်:				MG			
	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun ³	Total
Anticipated Unconstrained Demand	187.8	211.6	244.7	156.5	127.4	89.5	81.9	66.9	77.2	79.3	116.1	183.9	1622.70
Anticipated Total Water Suppl	306.8	306.8	306.8	306.8	306.8	306.8	306.8	306.8	306.8	306.8	306.8	306.8	3681.96
Surplus/Shortage w/o WSCP Action	119.1	95.3	62.2	150.3	179.5	217.3	224.9	239.9	229.7	227.6	190.7	122.9	2,059.3
% Surplus/Shortage w/o WSCP Action	63%	45%	25%	96%	141%	243%	275%	358%	298%	287%	164%	67%	127%
State Standard Shortage Leve	0	0	0	0	0	0	0	0	0	0	0	0	0
Planned WSCP Actions													
Benefit from WSCP: Supply Augmentatio													0.0
Benefit from WSCP: Demand Reductio	ı												0.0
Revised Surplus/Shortage with WSO	P 119.1	95.3	62.2	150.3	179.5	217.3	224.9	239.9	229.7	227.6	190.7	122.9	2059.3
% Revised Surplus/Shortage with WS0	P 63%	45%	25%	96%	141%	243%	275%	358%	298%	287%	164%	67%	127%

¹Assessments are based on best available data at time of submitting the report and actual volumes could be different due to many factors.

= Auto calculated	
= From prior tables	
= For manual input	

Table 4(NP): Non-Potable Water Shortage Assessm	4(NP): Non-Potable Water Shortage Assessment 1					Start Year: 2023		Volumetric Unit Used:			MG		
	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun ³	Total
Anticipated Unconstrained Demand: Non-Potable	202.4	186.3	207.7	156.7	61.9	30.2	15.2	13.8	14.9	13.9	108.5	164.9	1,176.39
Anticipated Total Water Supply: Non-Potab	200.3	200.3	200.3	200.3	200.3	200.3	200.3	200.3	200.3	200.3	200.3	200.3	2,404.0
Surplus/Shortage w/o WSCP Action: Non-Potab	-2.1	14.0	-7.3	43.6	138.5	170.1	185.1	186.5	185.4	186.5	91.8	35.4	1,227.6
% Surplus/Shortage w/o WSCP Action: Non-Potab	e -1%	8%	-4%	28%	224%	563%	1216%	1351%	1244%	1344%	85%	21%	104%
Planned WSCP Actions													
Benefit from WSCP: Supply Augmentation	١												0.0
Benefit from WSCP: Demand Reductio													0.0
Revised Surplus/Shortage with WSO	-2.1	14.0	-7.3	43.6	138.5	170.1	185.1	186.5	185.4	186.5	91.8	35.4	1227.6
% Revised Surplus/Shortage with WS0	P -1%	8%	-4%	28%	224%	563%	1216%	1351%	1244%	1344%	85%	21%	104%

¹Assessments are based on best available data at time of submitting the report and actual volumes could be different due to many factors.

³When optional monthly volumes aren't provided, verify Tables 2 and 3 use the same columns for data entry and are reflected properly in Table 4 and make sure to use those same columns to enter the benefits from Planned WSCP Actions. Please see directions on th balancing exercise in the Table Instructions. If a shortage is projected, the supplier is highly recommended to perform a monthly analysis to more accurately identify the time of shortage.

²Units of measure (AF, CCF, MG) must remain consistent.

³When optional monthly volumes aren't provided, verify Tables 2 and 3 use the same columns for data entry and are reflected properly in Table 4 and make sure to use those same columns to enter the benefits from Planned WSCP Actions. Please see directions on th balancing exercise in the Table Instructions. If a shortage is projected, the supplier is highly recommended to perform a monthly analysis to more accurately identify the time of shortage.

⁴If you enter any WSCP Benefits, then you must enter the corresponding planned Actions into Table 5.

²Units of measure (AF, CCF, MG) must remain consistent.

⁴If you enter any WSCP Benefits, then you must enter the corresponding planned Actions into Tab

Table 5: Planned Water	Shortage Response Actions		July 1,	2023	to June 30,	2024	
Anticipated Shortage Level Drop-down List of	ACTIONS ¹ : Demand Reduction, Supply Augmentation, and Other Actions. (Drop-down List)	Is action already being	How much is act reduce the sho (Optio	ortage gap?	When is shortage response action anticipated to be implemented?		
State Standard Levels (1 - 6) and Level 0 (No Shortage)	These are the only categories that will be accepted by the WUEdata online submittal tool. Select those that apply.		Enter Amount	(Drop-down List) Select % or Volume Unit	Start Month	End Month	
Add additional rows as nee	eded						
NOTES:	NOT REQUIRED by SFWPA FOR 2023						
Notes Section to be used only for clarifying details, and not for listing specific actions. Actions must be entred into							

¹If you plan Supply Augmentation Actions then you must enter WSCP Benefits from Supply Augmentation Actions into Table 4. If you plan Demand Reduction Actions then you must enter WSCP Benefits from Demand Reduction Actions into Table 4.

²If an Action is planned to be implemented in multiple non-contiguous periods of the year, please make separate entries on multiple rows for the same action spanning the different implementation periods.



SOUTH FEATHER WATER & POWER AGENCY

TO: Board of Directors

FROM: Rath Moseley, General Manager

DATE: May 15, 2023

RE: Right of Entry Agreement

Agenda Item for 5/23/23 Board of Directors Meeting

Pacific Gas and Electric is performing "System Hardening" by undergrounding electrical utilities and are seeking approval from SFWPA to execute a "Right of Entry" Agreement for a small portion of land owned by the Agency.

A site visit was conducted on April 26, 2023 to confirm construction details and exact location.

After reviewing the field detail's, it was determined that no interference with SF operations would occur and it is my recommendation to approve the ~10' x 12' location for transformer and interconnection hardware. All infrastructure will be installed outside of the South Feather entry gate.

In addition to the hardware installation, PG&E will perform vegetation management in the surrounding area at no cost to the agency.

"I move approval to authorize the General Manager to execute the "Right of Entry" Agreement with Pacific Gas & Electric for the location on Solana Drive; APN# 069-400-078.

W/S:	
Ayes:	
Public:	
Signed:	General Manager / Secretary of the Board

RIGHT OF ENTRY AGREEMENT

This Right of Entry Agreement ("Agreement") is entered into as of ______, 2023 ("Effective Date") by and between Pacific Gas and Electric Company, a California corporation, ("PG&E") and South Feather Water and Power Agency ("Owner").

WHEREAS, PG&E is undertaking the Wyandotte 1110 System Hardening Project ("Project") to ensure the safety and reliability of PG&E's electric grid;

WHEREAS, Owner is in possession of certain real property identified as APN: 069-400-078, Solana Dr, Oroville, CA 95966, Butte County ("Property");

WHEREAS, PG&E desires to construct electric and communication infrastructure ("Facility") on the Property in connection with the Project (Facility is hereby incorporated and included within the defined term of Project);

WHEREAS, PG&E desires to enter upon the Property in order to begin construction of the Project prior to obtaining the formal easement rights from Owner with respect to the Property;

NOW, THEREFORE, the parties agree as follows:

- 1. <u>Right of Entry</u>: Owner hereby grants to PG&E the right to enter upon the Property and the irrevocable right to possession and use of the area shown on Exhibit A (the "Right of Entry Area") for the purpose of pre-construction activities, Project surveys, vegetation management, construction, operation and maintenance of the Project, subject to the terms and conditions of the Easement (no signed easement at this point) and this Agreement.
- 2. <u>Easement</u>: PG&E agrees to contact the Owner within 90 days after construction is completed to secure an easement ("Easement"), if necessary, across the Property owned by the Owner. Both parties agree to negotiate in good faith to finalize the Easement in a form substantially similar to Exhibit B attached hereto.
- 3. <u>Consideration</u>: PG&E will pay the sum of \$ 500.00 to Owner upon the signing of this Agreement. This sum will be credited against the amount ultimately due to Owner for the Easement and any property damage or other loss.
- 4. <u>Construction of Project</u>: Owner consents to the construction, operation and maintenance of the Project on the Property and PG&E shall construct the Project at PG&E's sole cost and expense. PG&E shall comply with all applicable laws and regulations in connection with its entry onto the Property and construction, operation and maintenance of the Project.
 - 5. <u>Restoration of Property</u>: PG&E shall restore the Property as nearly as practicable to its condition prior to PG&E's construction work associated with the Project.

- 6. <u>Indemnity</u>: PG&E agrees to indemnify Owner against any loss and damage which shall be caused by any wrongful or negligent act or omission of PG&E or of its agents or employees in the course of their employment, provided, however, that this indemnity shall not extend to that portion of such loss or damage that shall have been caused by Owner's comparative negligence or willful misconduct.
- 7. <u>Successors, Assigns and Notices to Others</u>: Owner understands that this Agreement must be disclosed to any prospective buyer or tenant of the Property and that this Agreement shall inure to the benefit of and be binding upon the successors and assigns of the parties hereto.
- 8. <u>Counterparts</u>: This Agreement may be executed in one or more counterparts, and all of the counterparts shall constitute one and the same Agreement, notwithstanding that all parties hereto are not signatory to the same or original counterpart.
- 9. <u>Integration</u>: It is understood and agreed that this Agreement has been voluntarily entered into by the parties, and is the complete expression of the agreement of the parties, and no promise or representation of any kind has been expressed or implied except as set out herein. All prior and contemporaneous agreements and representations are superseded.
- 10. <u>Warranty of Authority</u>: Each of the signatories hereto warrants and represents that he or she is competent and authorized to enter into this Agreement on behalf of the party for whom he or she purports to execute this Agreement, without the consent or approval of any other person or entity.
- 11. <u>Electronic Signature</u>: This Agreement may be executed by electronic signature(s) and transmitted either by facsimile or in a portable document format ("pdf") version by email and such electronic signature(s) shall be deemed original for purposes of this Agreement and shall have the same force and effect as a manually executed original.
- 12. <u>Acceptance of Terms</u>: Signatures of the parties on this Agreement shall constitute mutual acceptance of all the terms and conditions of the Agreement.

Right of Entry Agreement (Rev. 12/2022)

"PG&E"	"Owner"
PACIFIC GAS AND ELECTRIC COMPANY, a California corporation	South Feather Water and Power Agency
By:	By:
Name:	Name:
Title:	Title:
Date:	Date:



AUTHORIZATION BY DR CH O.K. DATE

EXHIBIT "A"
Right of Entry Agreement with
South Feather Water and Power Agency APN 069-400-078 Solana Dr, Orville, CA 95966 Wyandotte 1110

PACIFIC GAS AND ELECTRIC COMPANY
San Francisco California



			-
			i
utte			-
			_
1	OF	1	
		CHANG	E
			1 OF 1 G NUMBER CHANG

Distribution Easement (Modified 4/2022) RECORDING REQUESTED BY AND RETURN TO:	,
PACIFIC GAS AND ELECTRIC COMPANY	
245 Market Street, N10A, Room 1015	
P.O. Box 770000	
San Francisco, California 94177	EVLIDIT D
* *	EXHIBIT B
Location: City/Uninc	
Recording Fee \$	
Document Transfer Tax \$	
[] This is a conveyance where the consideration and	
Value is less than \$100.00 (R&T 11911).	
[] Computed on Full Value of Property Conveyed, or	
[] Computed on Full Value Less Liens	
& Encumbrances Remaining at Time of Sale	
[] Exempt from the fee per GC 27388.1 (a) (2); This	
document is subject to Documentary Transfer Tax	(CD CD DOVID DOD DECONDED TO THE
	(SPACE ABOVE FOR RECORDER'S USE ONLY)
Signature of declarant or agent determining tax	
LD#	EASEMENT DEED

NAME OF GRANTOR(S),

Hereinafter (collectively) called Grantor, hereby grants to PACIFIC GAS AND ELECTRIC COMPANY, a California corporation, hereinafter called Grantee, the right from time to time to excavate for, construct, reconstruct, install, replace (of initial or any other size), remove, maintain, inspect and use facilities of the type hereinafter specified, together with a right of way therefor, within the easement area as hereinafter set forth, and also ingress thereto and egress therefrom, over and across the lands of Grantor situated in the unincorporated area of the County of Shasta, State of California, described as follows:

(APN)	į

INSERT LANDS DESCRIPTION

The facilities and easement area are described as follows:

Such underground conduits, pipes, manholes, service boxes, wires, cables, and electrical conductors; aboveground marker posts, risers, and service pedestals; underground and aboveground switches, fuses, terminals, and transformers with associated concrete pads; and fixtures and appurtenances necessary to any and all thereof, as Grantee deems necessary for the transmission and distribution of electric energy and for communication purposes located within the parcel(s) of land described below and outlined by heavy dashed lines as shown upon Grantee's Drawing labeled Exhibit "A" attached hereto and made a part hereof:

INSERT BASIS OF DESCRIPTION IF SURVEYED BY PG&E OTHERWISE REMOVE

The foregoing description(s) is/are based on a survey made by Grantee in (month and year). The bearings used are based on (a course in a deed or recorded map/etc.).

Grantor further grants to Grantee the right, from time to time, to trim or to cut down, without Grantee paying compensation, any and all trees and brush now or hereafter within said easement area, and shall

have the further right, from time to time, to trim and cut down trees and brush along each side of said easement area which now or hereafter in the opinion of Grantee may interfere with or be a hazard to the facilities installed hereunder, or as Grantee deems necessary to comply with applicable state or federal regulations.

Grantor also grants to Grantee the right to use such portion of said lands contiguous to said easement area as may be reasonably necessary in connection with the excavation, construction, reconstruction, replacement, removal, maintenance and inspection of said facilities.

Grantor also grants to Grantee the right to excavate, grade, and level the ground, including the right to construct, reconstruct, replace (of initial size or any other size), remove, maintain, and inspect walls to maintain the graded slopes around transformers and utility boxes for the protection of Grantee's public utility facilities located within the easement area, together with the right to construct and maintain drainage facilities and other appurtenances in connection with the walls.

Grantor hereby covenants and agrees not to place or construct, nor allow a third party to place or construct, any building or other structure, or store flammable substances, or drill or operate any well, or construct any reservoir or other obstruction within said easement area, or diminish or substantially add to the ground level within said easement area, or construct any fences that will interfere with the maintenance and operation of said facilities.

Grantor further grants to Grantee the right to apportion to another public utility (as defined in Section 216 of the California Public Utilities Code) the right to construct, reconstruct, replace, remove, maintain, inspect, and use the communications facilities within said easement area including ingress thereto and egress therefrom.

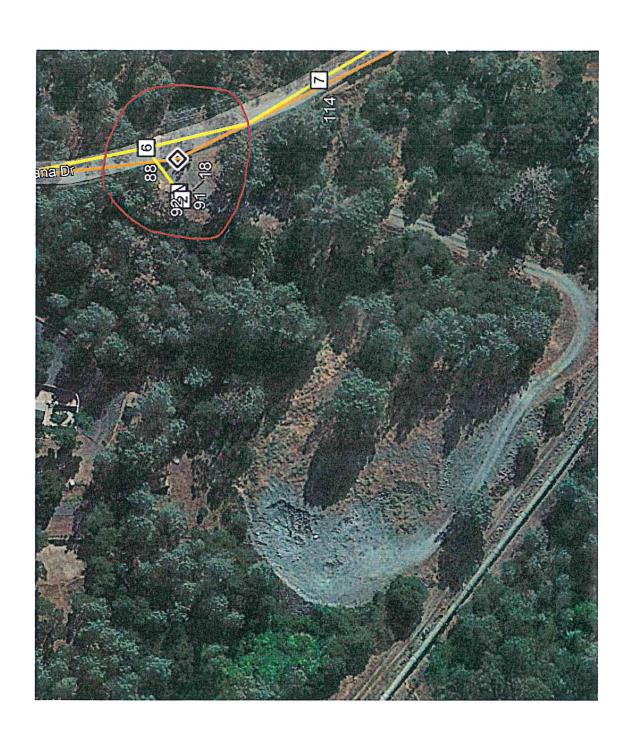
The legal description herein, or the map attached hereto, defining the location of this utility distribution easement, was prepared by Grantee pursuant to Section 8730 (c) of the Business and Professions Code.

This document may be executed in multiple counterparts, each of which shall be deemed an original, but all of which, together, shall constitute one and the same instrument.

The provisions hereof shall inure to the benefit of and bind the successors and assigns of the respective parties hereto, and all covenants shall apply to and run with the land.

Dated:,	
	<do exhibit="" for="" not="" only="" purposes="" sign,=""></do>
	Name of Grantor
	<do exhibit="" for="" not="" only="" purposes="" sign,=""></do>
	Name of Grantor

A notary public or other officer completing this certificate verifies only the identity of the individual who signed the document to which this certificate is attached, and not the truthfulness, accuracy, or validity of that document. State of California County of ______) __, before me, __ _ Notary Public, Insert name <Do not notarize this document; for exhibit purposes only> personally appeared ____ who proved to me on the basis of satisfactory evidence to be the person(s) whose name(s) is/are subscribed to the within instrument and acknowledged to me that he/she/they executed the same in his/her/their authorized capacity(ies), and that by his/her/their signature(s) on the instrument the person(s), or the entity upon behalf of which the person(s) acted, executed the instrument. I certify under PENALTY OF PERJURY under the laws of the State of California that the foregoing paragraph is true and correct. WITNESS my hand and official seal. <Do not notarize this document; for exhibit purposes only> (Seal) Signature of Notary Public **CAPACITY CLAIMED BY SIGNER** [] Individual(s) signing for oneself/themselves [] Corporate Officer(s) of the above named corporation(s) [] Trustee(s) of the above named Trust(s) [] Partner(s) of the above named Partnership(s) [] Attorney(s)-in-Fact of the above named Principal(s) [] Other





SOUTH FEATHER WATER & POWER AGENCY

TO: Board of Directors

FROM: Cheri Richter, Finance Manager

DATE: May 18, 2023

RE: General Information (regarding matters not scheduled on the agenda)

5/23/23 Board of Directors Meeting

Department of Finance Price and Population Estimates

The annual California State Department of Finance report of price factors and population information, used for the Agency's appropriations limit, has been issued. The per capital personal income price factor for 2023-24 has been calculated at 4.44%. The County-wide population factor that will be used in the SFWPA appropriations limit calculation is -0.48%. The 2023 appropriations limit for the Agency is \$1,129,497.

Audit Fieldwork

Auditor review of Agency provided tasks and schedules continues. Recent communications with Jonathan Abadesco of C.J. Brown & Company, CPAs suggest that the audit team will have a Financial Statement Draft prepared and ready for SFWPA to review by June 12 and Final Financial Statement for presentation at the June 27, 2023 board meeting.

Budget Modifications for 2023

This month we received an invoice for \$28,163.85 from Durham Pump for General Fund, 2022 Budget Item 2022-0226 – MRTP Raw Water Pump 3 Replacement, which was anticipated to be received and installed by the end of 2022, but was delayed by unavoidable circumstances. To date, SFWPA has received the 125 HP, 900 RPM Motor, and crane service installation is scheduled to take place in June when the ground has had time to recover from excessive rain this year. To accommodate the increase, this 2022 Budget Item will replace 2023 Budget Request Line Item #5 – 2023-53b – Portable, Towable Generator for BTP/Shop, budgeted for \$30,000.00.

Other Post-Employment Benefits (OPEB)

An update of last year's actuarial valuation of the Agency's retiree health insurance program for our December 31, 2022 annual financial report has been received. The OPEB liability at 12/31/2022 decreased to \$16,089,217 from the prior year liability of \$19,488,464. A full actuarial valuation with a December 31, 2023 measurement date will be performed next year as required for the 2023 audited financial statements.

							2023	
		2020	2021	2022	2023	2023	ACTUAL	% of
<u>ACCOUNT</u>	<u>DESCRIPTION</u>	<u>ACTUAL</u>	<u>ACTUAL</u>	<u>ACTUAL</u>	<u>BUDGET</u>	ESTIMATED	4/30/2023	<u>Budget</u>
REVENUE:								
	1150 Sale of Electricity	10,640,356	17,375,993	17,722,913	18,500,000	18,500,000	9,207,500	50%
	1502 Water Sales	0	5,600,000	37,500	2,520,000	2,520,000	2,341,800	93%
4	2306 Current Service Charges	12,131	54,207	16,588	17,500	17,500	15,711	90%
	2331 Concession Income	0	0	0	0	0	0	0%
	19250 Interest Income	427,042	(21,957)	0	10,000	10,000	0	0%
4	19321 State of CA, DWR	0	0	0	0	0	0	0%
4	19405 Insurance Reimbursement	80,452	67,865	80,181	80,000	80,000	0	0%
4	9521 JFOF FEMA	443,135	108,611	3,276	0	0	0	0%
4	9522 JFOF CalOES	114,763	58,876	0	0	0	0	0%
4	19929 Miscellaneous Income	0	2,700	1,000	1,000	1,000	4,812	481%
	Total Revenue	11,717,879	23,246,295	17,861,458	21,128,500	21,128,500	11,569,823	55%
OPERATING EXPENSI	ES:							
JFOF Administration	, 7-60							
	Salaries & Benefits	1,153,138	855,957	778,800	1,348,762	1,348,762	234,131	17%
	Supplies	2,810	3,671	4,072	7,709	7,709	906	12%
	Services	344,280	385,413	372,359	492,421	492,421	175,065	36%
	Utilities	37,989	39,240	42,327	37,060	37,060	14,240	38%
	Fuel, Oil, Auto	498	25	0	3,209	3,209	0	0%
	Training/Dues	15,180	13,012	12,669	15,385	15,385	152	1%
JFOF Administration	, 7-60	1,553,895	1,297,318	1,210,225	1,904,546	1,904,546	424,495	22%
Dial Management 7	<i>(</i> 2							
Risk Management, 7		07.456	04.045	07.656	122.005	122.005	24 274	220/
	Salaries & Benefits	97,456	84,945	87,656	133,805	133,805	31,374	23%
	Supplies	3,608	3,622	5,544	26,671	26,671	2,046	8%
	Services	196,865	227,986	175,846	147,540	147,540	290	0%
IFOF Faviron Hoolth	Training/Dues	3,672 301,601	1,929 318,482	169 269,214	200 308,216	200 308,216	0 33,710	0% 11%
JFOF Environ Health	& Salety, 7-62	301,001	318,482	269,214	308,216	308,216	33,/10	11%
Power Plant Operati	ons, 7-63							
	Salaries & Benefits	2,735,948	2,042,608	2,199,083	4,043,175	4,043,175	865,594	21%
	Supplies	36,001	56,184	98,709	145,720	145,720	61,889	42%
	Services	215,838	187,893	132,109	315,580	315,580	48,225	15%
	Utilities	76,375	49,115	47,946	56,240	56,240	36,860	66%
	Fuel, Oil, Auto			0	95,478	95,478		
	Training/Dues	315	458	4,884	28,375	28,375	20,775	73%
JFOF Power Plant Op	perations, 7-63	3,064,477	2,336,258	2,482,731	4,684,568	4,684,568	1,033,343	22%

							2023	
		2020	2021	2022	2023	2023	ACTUAL	% of
<u>ACCOUNT</u>	<u>DESCRIPTION</u>	<u>ACTUAL</u>	<u>ACTUAL</u>	<u>ACTUAL</u>	<u>BUDGET</u>	ESTIMATED	4/30/2023	<u>Budget</u>
OPERATING EXPENSES ((CON'T)							
Water Collection, 7-64								
	Salaries & Benefits	622,346	568,672	581,547	703,997	703,997	141,418	20%
	Supplies	42,009	47,502	62,511	74,511	74,511	11,186	15%
	Services	686,098	470,214	562,750	570,530	570,530	347,472	61%
	Utilities	10,183	7,995	5,682	0	0	0	0%
	Fuel, Oil, Auto	63	0	296	4,520	4,520	0	0%
	Training/Dues	73	0	30	0	0	0	0%
JFOF Water Collection,	7-64	1,360,772	1,094,383	1,212,816	1,353,558	1,353,558	500,076	37%
Campgrounds, 7-65								
	Salaries & Benefits	52,532	4,385	23,189	127,449	127,449	0	0%
	Supplies	978	0	1,227	10,790	10,790	0	0%
	Services	7,277	2,567	9,713	59,500	59,500	83	0%
	Utilities	7,633	2,300	7,846	7,850	7,850	0	0%
	Fuel, Oil, Auto	0	0	0	0	0	0	0%
	Training/Dues	0	0	0	0	0	0	0%
JFOF Campgrounds, 7-6	55	68,420	9,252	41,975	205,589	205,589	83	0%
JFOF Plant & Shop, 7-66	5							
	Salaries & Benefits	451,378	560,831	391,794	432,064	432,064	170,321	39%
	Supplies	17,291	15,535	44,413	37,396	37,396	10,235	27%
	Services	13,308	25,410	20,949	24,505	24,505	2,566	10%
	Utilities	71,752	85,188	80,128	71,735	71,735	47,179	66%
	Fuel, Oil, Auto	56,431	116,402	116,712	4,774	4,774	55,289	1158%
	Training/Dues	0	0	4,785	2,500	2,500	150	0%
JFOF Plant & Shop, 7-66	5	610,160	803,366	658,781	572,974	572,974	285,740	50%
Regulatory Compliance	, 7-67							
	Salaries & Benefits	181,105	142,965	179,336	401,425	401,425	60,974	15%
	Supplies	3,058	3,061	872	38,233	38,233	507	1%
	Services	117,517	128,235	388,136	655,350	655,350	140,343	21%
	Utilities	0	0	685	610	610	200	33%
	Training/Dues	199	99	1,980	2,001	2,001	431	22%
JFOF Regulatory Compl	iance, 7-67	301,879	274,360	571,007	1,097,619	1,097,619	202,455	18%

							2023	
		2020	2021	2022	2023	2023	ACTUAL	% of
<u>ACCOUNT</u>	<u>DESCRIPTION</u>	<u>ACTUAL</u>	<u>ACTUAL</u>	<u>ACTUAL</u>	<u>BUDGET</u>	<u>ESTIMATED</u>	4/30/2023	<u>Budget</u>
OPERATING EXPENSES	•							
Communications & IT,		407.006	242.025	400.000	255 252	255 252	64.544	2.49/
	Salaries & Benefits	137,936	313,836	180,292	255,350	255,350	61,541	24%
	Supplies	10,400	35,838	40,934	74,789	74,789	14,377	19%
	Services	44,465	31,656	65,007	65,571	65,571	12,974	20%
	Utilities	1,936	3,455	10,911	11,250	11,250	4,538	40%
	Fuel, Oil, Auto			0	4,774	4,774		
	Training/Dues	1,729	2,292	3,573	1,025	1,025	0	0%
JFOF Communications	& IT, 7-68	196,466	387,077	300,717	412,759	412,759	93,431	23%
	TOTAL OPERATING EXPENSES	7,457,670	6,520,496	6,747,468	10,539,829	10,539,829	2,573,333	24%
SUB-TOTAL, REVENUES	OVER OPER EXP	4,260,209	16,725,799	11,113,991	10,588,671	10,588,671	8,996,490	
Other Non-Operating E	xpenses:							
	North Yuba Water District	(709,000)	(709,000)	(709,000)	(709,000)	(709,000)	(177,250)	25%
		(1,476,613)	(1,547,584)	(4,304,278)	0	0		0%
	Interest Expense	(308,393)	(254,956)	(99,804)	0	0		0%
	Pension Expense	0	0	0	0	0		0%
	Captial Outlay							
2010-0828	LCD Crest Modification		51,245	16,307				
2018-0944	JFOF PP-KPH TSV 2019		2,130	0				
2019-0960	KPH Septic System Repair / Replacement		0	77,365				
2020-0970	CO-CAISO meter installation		54,924	4,857				
2021-0971	CO-SCADA upgrade		167,109	(261)				
2021-0972	FPH New Sump Oil Skimmer (Abanaki me	odel SM8C02-F)	7,316					
2021-0973	Vehicle replacement-F350 utility worker	truck w/utility bed,	53,728					
2021-0974	WC-South Fork Div Dam Safety Buoys an	d Log Booms	8,949					
2021-0975	CO-SCADA master install		30,249	0				
2021-0976	PP-FPH Guide Bearing Oil Coolers		65,986					
2021-0977	JS-Truck Replacement for Comm Tech, re	eplace T-101, 2004 F	38,855					
2021-0978	WC-STA 8 Bridge Deck Replacement		8,538					
2021-0979	CO-Backup generator, pad and appurten	ances	31,256					
2021-0980	PP-Forbestown Div Dam SF-17 Access. R	epl Stairs, Bridge, Tr	8,336					
2021-0981	CO-Generator Building at Sunset Hill Ma		12,302					
2021-0982	JS-Concrete aprons and approach, weldi	ng shop and hazmat	7,184	1,859				
2021-0983	JS-Truck Replacement for Roving Operat	or, replace 2005 Che	0	34,672				
2022-0984	WC-1 ton diesel truck, standard cab, sing	le rear wheel		81,006				
2022-0985	Boom Truck with basket			227,436				

							2023	
		2020	2021	2022	2023	2023	ACTUAL	% of
<u>ACCOUNT</u>	<u>DESCRIPTION</u>	<u>ACTUAL</u>	<u>ACTUAL</u>	<u>ACTUAL</u>	<u>BUDGET</u>	ESTIMATED	4/30/2023	<u>Budget</u>
Capital Outlay (con't)								
2022-0986	SCADA Historian server			12,935	15,000	15,000	0	0%
2022-0987	DAC 2 Rack Server for Scada System			54,818				
2022-0988	Shop Press			7,240				
2022-0989	Welding Shop Cabinets			35,003				
2022-0990	Dump truck- 2014 Peterbilt			134,368				
2022-0991	FPH TSV Seal Kit			71,106				
2022-0992	Storage System (SAN) replacement			23,289				
2022-0993	(3) Data Loggers: Black Rock and Kenzi	ie Ravine. HS22+ with	n GOES Transmitter	19,103				
2022-0994	Security Cameras for Front Gates and T	Transformers, WPH, F	PH, KPH	11,450				
2022-0995	Mini Excavator			68,754				
2022-0996	Bobcat Skid Steer with Power Broom A	ttachment		50,753				
2022-0997	Pewag Loader and Grader Snow Chains	s (3 Sets)		18,186				
2022-0998	GPS Equipment			10,368				
2022-0999	Truck Replace for Roving Operator, rep	lace 2007 Chevy, T-13	12 - Broken Frame	0				
2022-0601	Phone system upgrade, 2022			13,488				
2022-0602	Replace SF10 Walkway, SCDD			1,731				
2022-0603	MRC Panel 300 Access Road Repair			211,138				
2023-060	08 FPH Cooling Water Strainer System, en	gineering and design	proposed	0	63,000	63,000	31,444	50%
2023-63b / Capital	FPH Repaint Generator Housing			0	150,000	150,000		0%
2023-63c / Capital	WPH Repaint Generator Housing and T	WD System		0	130,000	130,000		0%
2023-64c / Capital	WC-LGV Res penstock drain valve repla	acement			60,000	60,000		0%
2023-64d / Capital	Bangor Canal at SF 25 Shotcrete				15,000	15,000		0%
2021-64o / 2023 64f	WC-RTU Water Logger HS522+ GOES X	mitter Forbestown Di	tch		7,500	7,500		0%
2023-63g / Capital	FPH Oil Level Device Upgrade				18,000	18,000		0%
2023-63h / Capital	WPH Oil Level Device Upgrade				18,000	18,000		0%
2023-63i / Capital	KPH Sump Pump and motor				14,000	14,000		0%
2023-64a / Capital	MRC repair, panel 210, 50'				160,000	160,000		0%
2023-060	05 MRC Bin Wall Materials				100,000	100,000	96,051	96%
2023-66d / Capital	Welding Shop 3-Ph Propane Generator	-			45,000	45,000		0%
2022-68e / Capital	WPH PSV Valve Trip System				30,000	30,000		0%
2023-63e / Capital	FPH Tailrace Underwater Concrete Rep	pair			50,000	50,000		0%

							2023	
		2020	2021	2022	2023	2023	ACTUAL	% of
<u>ACCOUNT</u>	<u>DESCRIPTION</u>	<u>ACTUAL</u>	<u>ACTUAL</u>	<u>ACTUAL</u>	<u>BUDGET</u>	<u>ESTIMATED</u>	4/30/2023	<u>Budget</u>
2023-63f / Capital	FPH Penstock Recoat 60 Feet				45,000	45,000		0%
2023-63l / Capital	FPH Gen and Exciter House Ozone Scru	bber			7,500	7,500		0%
2023-06	19 Rock Drills, Bits, and Hydraulic Splitter				27,500	27,500	25,059	91%
2023-64q / Capital	2 Water Quality Meter for the New Aqu	uatics Monitoring Plan	, Part 2.2.5.2.		30,000	30,000		0%
2023-64s / Capital						557,000		0%
2023-06	13 F-350 Super Cab w/ camper shell- repla	ice T97- elect tech tru	ck		65,000	65,000	53,155	82%
2023-66b / Capital	PDHQ 41KW Propane Generator with 2	00 amp XFER Switch			50,000	50,000		0%
2023-66c / Capital	CMMS Software System				50,000	50,000		0%
2023-66f / Capital	Backhoe. Existing Unit will Tier Out.				0	0		0%
2023-06	09 Water Wagon- Fire suppression. Towa	ble 1000 Gallon with F	Pump and Sprayer.		15,000	15,000	10,826	72%
2023-06	10 Equipment Pole Barn fpr Vehicles - Low	ver Yard			125,000	125,000	57,645	46%
2023-66k / Capital	Toolbox and tooling. Jobox to Fly In/Ou	ut of Powerhouses			15,000	15,000		0%
2023-06	06 Tool Trailer. Exist is old, Overloaded, B	ent Axles.			60,000	60,000	0	0%

							2023	
		2020	2021	2022	2023	2023	ACTUAL	% of
<u>ACCOUNT</u>	DESCRIPTION	<u>ACTUAL</u>	<u>ACTUAL</u>	<u>ACTUAL</u>	BUDGET	ESTIMATED	4/30/2023	<u>Budget</u>
2023-66m / Capital	Tire Equipment, Install, Balancer, Brake	Lathe. Save cost of goin	g to Oroville for flat	s, tire installs/swa	18,000	18,000		0%
2023-66n / Capital	Shop Door- Install Additional on Machir	ne Shop			10,000	10,000		0%
2023-66p / Capital	STA 2 Parking Area Paving - Carpool, Pe	rsonal Vehicles			0	0		0%
2023-063	11 Crane Man Basket- Suspended (For Spill	lway Access)			14,000	14,000	12,552	90%
2023-060	04 F350 Truck + Utility Body Mechanic Truc	ck			80,000	80,000	79,489	99%
2023-063	14 F450 Truck + Utility Body Machinist Lloy	rd Boyer			100,000	100,000	0	0%
2023-063	15 F450 Truck + Utility Body Machinist Ros	s Cawthon			100,000	100,000	0	0%
								0%
2023-67s / Capital	Property acquisition - 5.37 Acre Parcel A	Adjacent to MRD (072-05	50-026)		40,000	40,000		0%
2023-063	18 WPH PSV Valve Trip System				30,000	30,000	0	0%
2023-063	16 RTU Upgrades (KPH, FPH, WPH). Exist O	ut of Support, 10 years o	old.		60,000	60,000	0	0%
2023-063	17 RTU Upgrade SPH. Exist Out of Support,	10 years old.			20,000	20,000	0	0%
2023-060	07 Sunset and HQ Fire Suppression System	S			12,000	12,000	12,700	106%
2023-063	12 MRC Stage Transducers				6,000	6,000	3,102	52%
2023-68o / Capital	AC upgrade for comm room				10,000	10,000		0%
								0%
2023-68it3 / Capital	New Hosts				34,000	34,000		0%
2023-68it4 / Capital	Replace Backup storage				11,000	11,000		0%
2023-68it9 / Capital	Finance Software Replacement				10,000	10,000		0%
2023-68it13 / Capital	Point to Point Fiber Circuit - Increase Co	st			16,800	16,800		0%
2023-68it14 / Capital	Construction Costs							
	Total Capital Outlay	(2,157,078)	(548,107)	(1,186,971)	(2,509,300)	(2,509,300)	(382,021)	15%
Transfers In:								
	Power Division Legacy Fund	0	0	0	0	0	0	0%
	Retiree Benefit Trust	1,617,546	0	0	0	0	0	0%
Transfers Out:		,- ,						
	General Fund-Minimum Payment	(709,000)	(709,000)	(709,000)	(709,000)	(709,000)		0%
	General Fund-Overhead	(480,058)	(613,367)	(367,675)	(400,000)	(400,000)		0%
	Retiree Benefit Trust	0	0	0	0	0	0	0%
Net Non-operating, Cap	ital Outlay							
and Transfers	·	(4,222,596)	(4,382,014)	(7,376,728)	(4,327,300)	(4,327,300)	(559,271)	
	NET REVENUE OVER EXPENSES	37,613	12,343,785	3,737,263	6,261,371	6,261,371	8,437,219	
	Beginning Balance			36,838,728	32,050,695	32,050,695		

							2023	
		2020	2021	2022	2023	2023	ACTUAL	% of
ACCOUNT	DESCRIPTION	<u>ACTUAL</u>	<u>ACTUAL</u>	<u>ACTUAL</u>	BUDGET	ESTIMATED	4/30/2023	<u>Budget</u>
	NYWD-Additional Payment			(3,269,900)	(2,000,000)	(2,000,000)		
	General Fund-Additional Payment			(3,269,900)	(2,000,000)	(2,000,000)		
	Reserve for PG&E Standby			0	0	0	0	
	Ending Balance			34,036,191	34,312,066	34,312,066	8,437,219	

ACCOUNT	<u>DESCRIPTION</u>	2020 <u>ACTUAL</u>	2021 <u>ACTUAL</u>	2022 <u>ACTUAL</u>	2023 BUDGET	2023 ESTIMATED	2023 ACTUAL 4/30/2023	% of <u>BUDGET</u>
REVENUE: Water Sales Rev								
	41100 Domestic Water	2,674,305	2,607,133	2,383,082	2,525,000	2,525,000	676,042	27%
	41400 Irrigation Water	263,727	282,060	285,814	260,000	260,000	43,644	17%
	41420 Water Sales, NYWD to Yuba City	195,300	199,215	207,653	200,000	200,000	0	0%
	Sub-Total Water Sales Rev	3,133,332	3,088,408	2,876,548	2,985,000	2,985,000	719,685	24%
Power Revenue								
	41305 Sly Cr Pwr Generation	1,297,452	1,816,122	1,961,433	1,822,298	1,822,298	1,002,797	55%
	41306 Surplus Wtr	25,164	156,026	0	50,000	50,000	0	0%
	Sub-Total Power Rev	1,322,616	1,972,148	1,961,433	1,872,298	1,872,298	1,002,797	54%
Water Serv Chgs								
	42301 Sundry Billing (Job Orders)	57,108	265,038	175,579	100,000	100,000	1,680	2%
	42321 Annexation Fees	0	26,239	37,761	0	0	0	0%
	42341 System Capacity Charges	69,801	61,082	148,319	300,000	300,000	0	0%
	42347 Other Water Serv Charges (Current & Misc.)	29,249	54,799	43,019	25,000	25,000	38,040	152%
	Sub-Total Water Serv Chgs	156,158	407,158	404,678	425,000	425,000	39,720	9%
Non-Oper Revenue								
	49250 Interest Earnings	108,903	1,070	245,423	1,000	1,000	249,366	24937%
	49311 Property Taxes	681,269	718,188	383,319	741,600	741,600	419,757	57%
	49405 ACWA/JPIA RPA	103,294	40,381	45,377	50,000	50,000	0	0%
	49625 Back Flow Installation	9,400	5,385	5,480	5,000	5,000	1,370	27%
	49630 Back Flow Inspection	127,236	130,550	137,586	140,000	140,000	46,897	33%
	Grants	0	0	0	0	0	0	0%
	Fed/State/County Palermo Clean Water	0	0	0	500,000	500,000	0	0%
	Other Non-Oper Rev (Misc.)	31,455	2,672	255	1,000	1,000	0	0%
	Sub-Total Non-Oper Rev	1,061,557	898,246	817,440	1,438,600	1,438,600	717,390	50%
	TOTAL GENERAL FUND REVENUE	5,673,663	6,365,960	6,060,098	6,720,898	6,720,898	2,479,592	37%

		2020	2021	2022	2023	2023	2023 ACTUAL	% of
ACCOUNT	DESCRIPTION	ACTUAL	ACTUAL	<u>ACTUAL</u>	BUDGET	ESTIMATED	4/30/2023	BUDGET
OPERATING EXPENSES:			<u></u> -					
General Administration, 1-5	50							
	Salaries & Benefits	785,777	423,633	701,214	860,946	860,946	200,339	23%
	Supplies	5,032	10,424	9,298	9,150	9,150	2,646	29%
	Services	121,268	129,570	93,099	107,920	107,920	62,026	57%
	Utilities	52,010	58,245	59,972	77,350	77,350	18,436	24%
	Fuel, Oil, Auto	0	0	0	4,520	4,520	0	0%
	Training/Dues	13,616	19,927	23,713	30,620	30,620	3,262	11%
General Admin, 1-50		977,703	641,800	887,297	1,090,506	1,090,506	286,709	26%
Water Source, 1-51								
	Source of Supply	16,117	14,888	16,536	17,000	17,000	9,189	54%
Water Source, 1-51		16,117	14,888	16,536	17,000	17,000	9,189	54%
Risk Management, 1-52								
	Salaries & Benefits	110,291	90,111	88,521	134,525	134,525	33,898	25%
	Supplies	9,895	3,220	5,068	5,337	5,337	948	18%
	Services	118,598	137,138	114,835	133,783	133,783	1,772	1%
	Utilities	910	571	596	600	600	180	30%
	Fuel, Oil, Auto	0	0	0	4,520	4,520	0	0%
	Training/Dues	169	372	249	300	300	0	0%
Environmental Health & Sa	fety, 1-52	239,863	231,412	209,270	279,065	279,065	36,798	13%
Water Treatment, 1-53								
	Salaries & Benefits	1,427,710	1,324,450	1,476,690	2,290,077	2,290,077	485,713	21%
	Supplies	127,484	113,066	155,115	164,000	164,000	28,921	18%
	Services	59,723	32,191	53,059	83,545	83,545	41,108	49%
	Utilities	305,168	309,928	219,583	265,000	265,000	13,839	5%
	Fuel, Oil, Auto	2,510	0	0	18,077	18,077	0	0%
Water Treatment, 1-53	Training/Dues	1,923,428	75 1,779,710	172 1,904,618	1,675 2,822,374	1,675 2,822,374	268 569,848	16% 20%
,		, ,	, ,	, ,	, ,		,	
Transmission & Distribution	•							
	Salaries & Benefits	2,387,626	1,952,583	1,932,322	2,857,078	2,857,078	676,718	24%
	Supplies	71,974	71,859	94,883	125,310	125,310	30,585	24%
	Services	26,518	25,291	7,092	28,100	28,100	5,109	18%
	Utilities	40,021	48,714	50,490	42,500	42,500	13,581	32%
	Fuel, Oil, Auto	0	4,402	25	144,616	144,616	3,022	2%
	Training/Dues	1,995	3,997	1,435	4,500	4,500	0	0%

							2023	
		2020	2021	2022	2023	2023	ACTUAL	% of
<u>ACCOUNT</u>	DESCRIPTION	<u>ACTUAL</u>	<u>ACTUAL</u>	<u>ACTUAL</u>	BUDGET	ESTIMATED	4/30/2023	BUDGET
Transmission & Distribution	, 1-54	2,528,134	2,106,846	2,086,247	3,202,104	3,202,104	729,014	23%
OPERATING EXPENSES (Con	t)							
Customer Accounts, 1-55								
	Salaries & Benefits	806,810	758,608	912,823	1,310,772	1,310,772	265,454	20%
	Supplies	112,376	106,891	150,878	133,970	133,970	46,321	35%
	Services	59,573	81,195	63,911	64,340	64,340	27,036	42%
	Utilities	0	964	1,556	1,575	1,575	1,690	107%
	Training/Dues	11,776	12,903	735	1,200	1,200	0	0%
Customer Accounts, 1-55		990,535	960,561	1,129,903	1,511,857	1,511,857	340,502	23%
Canada Dlant C Chan 4 FC								
General Plant & Shop, 1-56	Salaries & Benefits	527,789	388,464	440,504	673,260	673,260	148,853	22%
	Supplies	16,376	11,380	28,507	54,400	54,400	3,439	6%
	Services	13,755	2,587	585	600	600	338	56%
	Utilities	26,908	28,357	33,300	40,475	40,475	13,140	32%
	Fuel, Oil, Auto	113,709	121,999	186,724	4,520	4,520	46,271	1024%
General Plant & Shop, 1-56		698,537	552,787	689,620	773,255	773,255	212,042	27%
Sundry & Expense Credits, 1	-57							
	Salaries & Benefits	27,334	29,256	26,512	30,000	30,000	2,731	9%
	Supplies	22,290	33,167	46,334	60,000	60,000	0	0%
	Services	235	42,430	7,714	5,000	5,000	6,832	137%
Sundry, 1-57		49,859	104,853	80,560	95,000	95,000	9,563	10%
Information Technology, 1-5	58							
	Salaries & Benefits	419,238	317,458	205,698	387,744	387,744	65,827	17%
	Supplies	13,622	7,630	38,259	45,730	45,730	9,545	21%
	Services	62,351	47,253	81,390	73,986	73,986	19,165	26%
	Utilities	3,045	2,479	2,355	2,650	2,650	479	18%
	Fuel, Oil, Auto	0	. 0	0	4,520	4,520		
	Training/Dues	1,701	6,228	175	, 525	, 525	538	102%
Information Systems, 1-58		499,957	381,048	327,877	515,155	515,155	95,554	19%
Sly Creek Power Plant, 1-61	Caladas O Davidos	262.022	222 772	407.005	F.40.000	F 40 005	455.455	200/
	Salaries & Benefits	363,028	323,779	487,905	540,089	540,089	156,102	29%
	Supplies	12,846	9,402	22,081	17,110	17,110	4,071	24%
	Services	39,758	36,821	36,699	29,312	29,312	9,159	31%
	Utilities	22,677	23,802	13,348	18,900	18,900	15,917	84%
	Auto Expense	0	39	66	0	0	0	0%

		2020	2021	2022	2023	2023	2023 ACTUAL	% of
ACCOUNT	DESCRIPTION	ACTUAL	ACTUAL	ACTUAL	BUDGET	ESTIMATED	4/30/2023	BUDGET
Sly Creek Power Plant, 1-61		438,309	393,843	560,100	605,411	605,411	185,249	31%
0., 0.00m. 0.00m. 1.0mg 2 02		.00,000	333,313	300,200	000,	000,122	100,1	02/0
	TOTAL OPERATING EXPENSES	8,362,442	7,167,748	7,892,026	10,911,726	10,911,726	2,474,469	23%
SUB-TOTAL, REVENUES OV	ER OPER EXP	(2,688,779)	(801,788)	(1,831,928)	(4,190,828)	(4,190,828)	5,123	0%
Other Non-Operating Expe	nses							
	Supplies & Servces	3,600	3,400	3,908	3,600	3,600	0	0%
	Interest	826,793	808,521	798,765	787,026	787,026	394,311	50%
	Principal	600,000	615,000	635,000	655,000	655,000	655,000	100%
	Pension Expense	0	0	0	0	0	0	0%
Other Non-Operating Expe	ncas:							
CAPITAL OUTLAY:	11363.							
2019-0192	TD-Distribution System Remote Monitoring		9,551	5,438			4,627	
2020-0198	Community Line, Foothill Blvd./Oro Bangor Hwy to C	Grange	68,058	,			0	
2020-0200	Oro-Bangor Hwy/BTP to Avacado		48,097	394			0	
2020-0970	SPH-CAISO meter installation		26,094	4,857			0	
2021-0204	MRTP #2 raw water pump replacement		64,907					
2021-0205	Hwy 162 / Arbol		129,559					
2021-0206	IT-MRTP SAN replacement		23,185					
2021-0207	CA-Meter reader communications		1,750	4,557			0	
2021-0208	Replace 1998 Bobcat mini excavator, E-123		0	68,635			0	
2021-0209	IT-Fiber optic and switches replacement		0	10,296			0	
2021-0210	Replace 2009 Ford F-350, T-82		0	0			0	
2021-0971	SPH-SCADA upgrade		55,638	0			1,255	

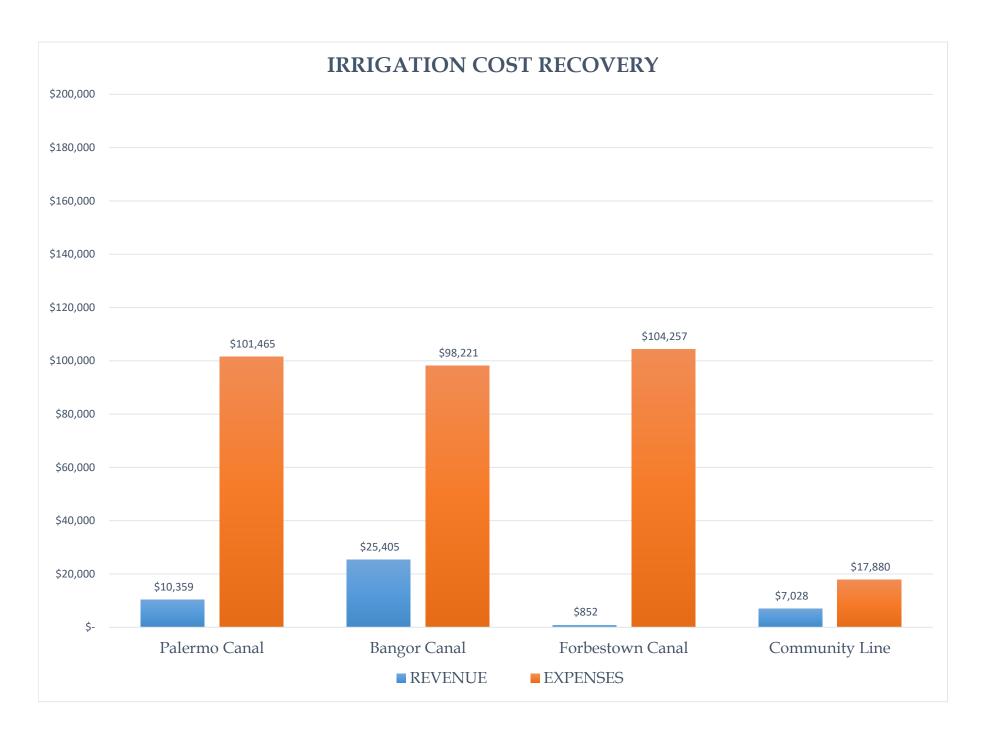
		2020	2021	2022	2023	2023	2023 ACTUAL	% of
<u>ACCOUNT</u>	<u>DESCRIPTION</u>	<u>ACTUAL</u>	<u>ACTUAL</u>	<u>ACTUAL</u>	BUDGET	ESTIMATED	4/30/2023	BUDGET
CAPITAL OUTLAY (Con't)								
2022-0212	Vacuum, portable, towable			29,706			0	
2022-0213	Shotcrete Pinecrest (pipe)			22,304			0	
2022-0214	Streaming Current Analyzer with Organics module			21,742			0	
2022-0215	Ditchtender vehicle, 2021 Ford Ranger, T-318			42,785			0	
2022-0216	SPH station air compressor			10,997			0	
2022-0217	Meter Service Technician vehicle, 2022 Ford F250			69,682			0	
2022-0218	Storage System (SAN) replacement			32,743			0	
2022-0219	Palermo clean water 2022			72,743	500,000	500,000	5,861	1%
2022-0220	MRTP security cameras upgrade			8,138			0	
2022-0221	SPH security cameras for front gate and transformer			3,937			0	
2022-0222	Trailer for Bobcat (see 2021-0208)			28,305			0	
2022-0223	GPS Equipment			8,083			0	
2022-0224	Wood chipper			37,538			0	
2022-0225	Phone system upgrade, 2022			17,638			0	
2022-0226	MRTP raw water pump 3 replacement			0			0	
2022-0227	SPH PSV Roof Replacement and Rockfall Protection			10,925	75,000	75,000	3,805	5%
2023-53a / Capital	MRTP metal storage & work shop building				0	0		
**2023-53b / Capit	al Portable, towable generator for BTP/Shop				30,000	30,000		
2023-023	35 Replacement truck for T177				50,000	50,000	44,674	89%
2023-53d / Capital	Solar field inverter replacement				0	0		
2023-53e / Capital	Filter NTU meters replacement, 4				22,000	22,000		
2023-53g / Capital	Asphalt seal coat, entire facility, 60.000 sq ft.				15,000	15,000		
2023-53h / Capital	Replacement truck for T308 (R. Liese)				80,000	80,000		
2023-53j / Capital	MGT recoating interior and hydropneumatic interior c	oating			0	0		
2023-53k / Capital	MGT fencing				32,000	32,000		
2022-54t / Capital	North Ditch Lincoln to Messina irrigation - Engineering	Study for desig	gn		0	0		
2023-52a / Capital	Ground Penetrating Radar Equipment				25,000	25,000		
2023-54a / Capital	Distribution System Remote Monitoring, 2023				12,000	12,000		
2023-54b / Capital	Domestic - Oro Pond Service Lines and Meter Replace	ments			25,000	25,000		
2023-54c / Capital	Domestic - Coventry Interloop + Regulator Vault				75,000	75,000		
2023-54e / Capital	Irrigation - Dunstone line 12" (meter, manifold and val	ve)			20,000	20,000		
2023-023	30 Irrigation - Shotcrete Pinecrest				10,000	10,000	10,422	104%
2023-54g / Capital	Irrigation - Bangor Canal Siphon -(Rocky Honcut)				10,000	10,000		
2023-54h / Capital	Domestic - Sunset View Service Line				0	0		

							2023	
		2020	2021	2022	2023	2023	ACTUAL	% of
<u>ACCOUNT</u>	DESCRIPTION	<u>ACTUAL</u>	<u>ACTUAL</u>	<u>ACTUAL</u>	BUDGET	ESTIMATED	4/30/2023	BUDGET
2023-54i / Capital	Domestic - Miners Ranch (Chopan) Line Replaceme	nt			15,000	15,000		
2023-54j / Capital	Irrigation - South Villa Raw Water Line Replacemen	t 500'			35,000	35,000		
2023-54k / Capital	Irrigation - Palermo Canal Beaver Grizzly Vertical Sh	oring			12,000	12,000		
2023-023	4 Irrigation - Lower Forbestown Ditch - Old Olive Hwy	140' 8" Pipe Rep	olacement		8,000	8,000	5,867	73.33%
2023-54p / Capital	Irrigation - Miller Hill Gauging Stations				12,000	12,000		
2023-54q / Capital	Irrigation - Oakvale Palermo Canal 900' Shotcrete				37,000	37,000		
2023-54r / Capital	Domestic - Oro Bangor Malengo Pipe Replacement				0	0		
2023-54s / Capital	Irrigation - Culvert Replacement Ridgeway				20,000	20,000		
2023-54t / Capital	Domestic - Chames Court, 500' 6" AC Replacement				0	0		
2023-56a / Capital	Replace 2011 Ranger 4x4 Ditchtender T-302				35,000	35,000		
2023-56b / Capital	Replace 2011 Ranger 4x4 Ditchtender T-303				35,000	35,000		
2023-56c / Capital	Replace 1990 Ford F700 diesel/flatbed dump, T-132	2			102,000	102,000		
2023-56d / Capital	Replace 2012 Ford F150 Supercab 3/4 ton gas T-30	4			35,000	35,000		
2023-56e / Capital	Replace 2002 Chevy Tahoe C-3 (orignally requested	for Dept 50)			0	0		
2023-58f / Capital	Replace 2 Hosts				34,000	34,000		
2023-58g / Capital	Replace Copier				0	0		
2023-58h / Capital	Plotter replacement				0	0		
2023-58l / Capital	Finance Software Replacement				10,000	10,000		
2023-61a / Capital	SPH Governor upgrade				200,000	200,000		
2023-61b / Capital	SPH Exciter upgrade				0	0		
2023-61d / Capital	SPH Bearing Cooling Water Flow Device Upgrade				20,000	20,000		
2023-61e / Capital	SPH oil flow device upgrade				20,000	20,000		
2023-61f / Capital	SPH Bitronics line-side metering xducer				8,000	8,000		
	Total Capital Outlay	307,591	426,839	511,444	1,619,000	1,619,000	76,511	5%
	Total Capital Outlay	307,331	420,639	311,444	1,019,000	1,019,000	70,311	3/0
Transfers:								
	SFPP Jt Facil Oper Fd-Minimum Payment	709,000	709,000	709,000	709,000	709,000	0	0%
	SFPP Jt Facil Oper Fd-Additional Payment	0	0	3,269,900	2,000,000	2,000,000	0	0%
	SFPP Jt Facil Oper Fd-Overhead	480,058	613,367	367,675	400,000	400,000	0	0%
	System Capacity Fund	194,946	0	0	0	0	0	0%
	Retiree Benefit Trust Fund	1,977,001	0	0	0	0	0	0%
Net Non-Operating, Capital (Outlay and Transfers	1,623,021	(531,393)	2,397,458	44,374	44,374	(1,125,821)	-2537%

							2023	
		2020	2021	2022	2023	2023	ACTUAL	% of
<u>ACCOUNT</u>	DESCRIPTION	<u>ACTUAL</u>	<u>ACTUAL</u>	<u>ACTUAL</u>	BUDGET	ESTIMATED	4/30/2023	<u>BUDGET</u>
	NET REVENUE OVER EXPENSES	(1,065,758)	(1,333,180)	565,530	(4,146,454)	(4,146,454)	(1,120,698)	
	Beginning Balance				1,640,341	1,640,341	1,640,341	
	Ending Balance			=	(2,506,113)	(2,506,113)	519,643	

South Feather Water & Power Agency Irrigation Water Accounting Through April 30, 2023

ACCT CODE	<u>DESCRIPTION</u>	<u>R1</u>	<u>EVENUE</u>	<u>E</u> 2	<u>XPENSES</u>	DIFFERENCE
2023-0504	Palermo Canal	\$	10,359	\$	101,465	(\$91,106)
2023-0505	Bangor Canal	\$	25,405	\$	98,221	(\$72,816)
2023-0506	Forbestown Canal	\$	852	\$	104,257	(\$103,405)
2023-0507	Community Line	\$	7,028	\$	17,880	(\$10,852)
	Totals	\$	43,644	\$	321,822	(\$278,179)



SOUTH FEATHER WATER AND POWER AGENCY SCHEDULE OF CASH AND INVESTMENTS April 30, 2023

General Fund Cash and Savings Acc LAIF CalTrust Five Star Bank	count						\$ 5,593,954 26,153,514 1,394,260 1,128,422	
Fixed Income portfolio	<u>Rate</u>	Purch Date I	Purch Price	Face Value	<u>Maturity</u>	Market Value		Estimated
Cash / Money Market						49,954		Annual
								Income
Valley Natl Bank CD	4.450%	11/16/2022	245,000	245,000	5/18/2023	244,922		10,903
Bank of China CD	2.100%	6/15/2022	240,000	240,000	6/15/2023	239,069		5,040
BMO Harris Bk CD	2.800%	7/1/2022	245,000	245,000	7/14/2023	243,812		6,860
Luana Savings Bank CD	0.200%	8/14/2020	245,000	245,000	8/14/2023	241,538		490
John Marshall Bancorp CD	0.400%	12/31/2021	245,000	245,000	8/31/2023	241,256		980
Synchrony Bank CD	0.400%	9/30/2021	245,000	245,000	9/29/2023	240,306		980
Medallion Bank CD	0.250%	10/26/2020	135,000	135,000	10/27/2023	131,929		338
New York Community Bank CD	0.300%	11/9/2020	245,000	245,000	11/9/2023	239,181		735
Beal Bank CD	0.600%	12/20/2021	245,000	245,000	12/20/2023	238,297		1,470
Federal Home Loan Bond	0.190%	12/29/2020	249,777	250,000	12/22/2023			475
Bank OZK CD	4.500%	11/18/2022	245,000	245,000	1/18/2024	244,324		11,025
Customers Bank CD	4.800%	11/22/2022	245,000	245,000	2/23/2024	244,846		11,760
US Treasury Note	0.250%	1/18/2022	258,479	262,000	3/15/2024	251,787		655
Bankunited Bank CD	0.350%	3/15/2021	245,000	245,008	3/19/2024	235,337		858
Ally Bank Sandy Utah CD	1.700%	3/25/2022	245,000	245,000	3/25/2024	238,098		4,165
Comenity Capital Bank CD	2.250%	4/14/2022	245,000	245,000	4/15/2024	238,958		5,513
Web Bank CD	0.400%	5/11/2021	245,000	245,000	5/17/2024	233,875		980
UBS Bank CD	0.350%	6/23/2021	245,000	245,000	6/24/2024	232,525		858
Texas Exchange Bank CD	0.500%	7/9/2021	105,000	105,000	7/9/2024	99,643		525
First Technology Credit Union CD	3.250%	8/5/2022	245,000	245,000	8/5/2024	240,017		7,963
Toyota Finl Svgs Bank CD	0.550%	8/5/2021	245,000	245,000	8/5/2024	231,964		1,348
BMW Bank CD	1.700%	3/4/2022	245,000	245,000	9/4/2024	234,761		4,165
State Bank of Dallas CD	0.700%	12/31/2021	245,000	245,000	10/1/2024	230,780		1,715
Institution for Svg in Newburyport	0.700%	10/28/2021	245,000	245,000	10/28/2024	230,028		1,715
Merrick Bank CD	0.800%	11/19/2021	245,000	245,000	11/19/2024	•		1,960
Live Oak Banking CD	0.850%	12/29/2021	245,000	245,000	12/30/2024	228,881		2,083

Federal Home Loan Bond	1.250%	1/28/2022	250,000	250,000	1/28/2025	235,643		3,125
Federal Home Loan Bond	1.550%	2/18/2022	249,781	250,000	2/18/2025	236,650		3,875
		• •						
Federal Home Loan Bond	2.000%	12/6/2022	235,791	250,000	3/28/2025	238,363		5,000
Bank of Dells Wisconsin CD	4.400%	12/23/2022	245,000	245,000	4/23/2025	242,234		10,780
Capital One Natl Assn CD	3.100%	6/16/2022	246,000	246,000	6/16/2025	236,664		7,626
Federal Home Loan Bond	3.550%	8/18/2022	245,000	245,000	7/25/2025	239,377		8,698
Connexus Credit Union CD	3.500%	8/26/2022	245,000	245,000	8/26/2025	237,028		8,575
Austin Telco Fed CU CD	3.750%	9/21/2022	249,000	249,000	9/22/2025	242,085		9,338
Capital One Bank USA CD	0.900%	11/17/2021	245,000	245,000	11/17/2025	221,355		2,205
United Bankers Bank CD	4.500%	3/17/2023	250,000	250,000	12/17/2025	248,805		11,250
Washington Fed Bank CD	4.700%	12/12/2022	245,000	245,000	12/22/2025	243,408		11,515
Liberty First Credit Union	4.550%	1/17/2023	249,000	249,000	1/1/2026	246,378		11,330
Federal Home Loan Bond	0.680%	12/15/2021	243,905	250,000	2/24/2026	226,535		1,700
Eaglebank Bethesda MD CD	4.250%	2/24/2023	245,000	245,000	2/24/2026	240,458		10,413
Direct Federal CU CD	4.700%	3/8/2023	152,000	152,000	3/9/2026	150,959		7,144
Truliant Federal Credit CD	5.150%	3/22/2023	140,000	140,000	3/23/2026	140,736		7,210
American Express Natl Bank CD	4.950%	3/31/2023	243,000	243,000	3/30/2026	242,964		12,029
Discover Bank	4.500%	4/26/2023	245,000	245,000	4/27/2026	241,955		11,025
State Bank of India CD	1.000%	6/10/2021	245,000	245,000	6/10/2026	217,415		2,450
			10,601,733	10,626,008	. <u>-</u>			
	,	Total Fixed Inc	ome Portfo	lio:	Market Value	10,326,978		\$ 230,841
								2.24%
	T	OTAL CASH &	& INVESTN	MENTS AT	4/30/2023		\$ 44,597,128	

I certify that all investment actions have been made in full compliance with Policy #470- Investments, and that South Feather Water and Power Agency will meet its expenditure obligations for the next six months.

Submitted by:	Cheri Richter, Finance Manager	4/30/2023
Investment Transactions	April, 2023	

\$245,000 CD purchased 4/26/2023 from Discover Bank, 4.5%, matures 4/27/2026, with JP Morgan Chase Bank 4/19/2023 maturity.



SOUTH FEATHER WATER & POWER AGENCY

TO: Board of Directors

FROM: Dan Leon, Power Division Manager

DATE: May 18, 2023

RE: General Information (regarding matters not scheduled on agenda)

May 23, 2023 Board of Directors Meeting

OPERATIONS

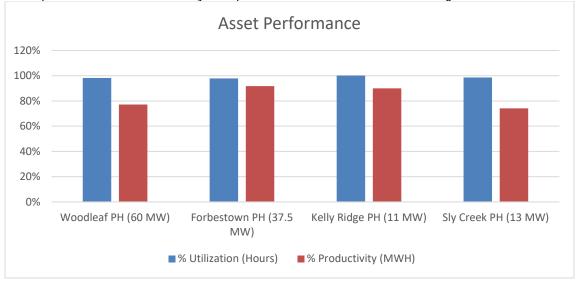
Power Division Summary, Reservoir Storage, and Precipitation Reports for April 2023 are attached.

South Fork Div tunnel average flow was 370 CFS. Slate Creek Div tunnel was closed for the month. Little Grass Valley and Sly Creek Reservoirs combined storage was 133 kAF at month's end. The following reservoirs are currently spilling: LGV Res, SF Div Res, SC Div Res, Forbestown Div Res, and Ponderosa Res.

DWR Bulletin 120 observed conditions as of May 9 for accumulated WY to date precipitation is at 126% of average (North Sierra 8-Station Index), and observed snowpack is at 152% of average for April 1 (North Region).

ASSET PERFORMANCE





Asset Availability									
a. Powerhouse	b. Capacity MW	c. Available for Generation Hrs	d. Generation Dispatched above 50% Output Hrs	e. Generation Dispatch Potential Output Hrs					
Woodleaf	60.0	611	568	43					
Forbestown	37.5	610	572	38					
Kelly Ridge	11.0	678	674	4					
Sly Creek	13.0	609	590	19					

MAINTENANCE

<u>Powerhouses</u>

- Woodleaf Powerhouse. Status: In service, normal dispatch schedule. Sched outage PG&E transmission line maintenance. Repair Cooling Water Pump No.1 bushings and seals.
- Forbestown Powerhouse. Status: In service, normal dispatch schedule. Install safety toe kicks. Sched outage PG&E transmission line maintenance.
- Sly Creek Powerhouse. Status: In service, normal dispatch schedule. Annual maintenance outage scheduled for October 2 thru 21, 2023. Sched outage PG&E transmission line maintenance.
- Kelly Ridge Powerhouse. Status: In service, normal dispatch schedule. Annual maintenance outage scheduled for November 6 thru 18, 2023. Check surface air cooler and plan repair. Forced outage – Generator exciter problem. Remove exciter armature and field.

Project Facilities and Assets

- Little Grass Valley Dam Set lower outlet flows
- South Fork Div Dam Set lower outlet flows
- Sly Creek penstock Fabricate PSV platform / enclosure
- Sly Creek roadway Flail roadway and remove debris
- Woodleaf Ph roadway Apply herbicide to roadway and gutters
- Forbestown Ph roadway Apply herbicide to roadway and gutters
- MRC Grade roadways with rock rake, apply herbicide to roadways
- MRC Check and clean trashracks, fabricate personnel crossings, install pressure transducers
- MRC Remove rock fall, repair roadway at Sta 7, flush canal
- Kelly Ridge penstock Remove encroaching tree at surge chamber
- Surveillance system Install equipment

REGULATORY COMPLIANCE

Owners Dam Safety Program Audit Consulting Team:

Title 18 of the Code of Federal Regulations requires that FERC hydropower licensees complete the preparation of, and ongoing updates to, the Owner's Dam Safety Program (ODSP), as well as conducting an independent external audit every five years. In order for the Agency to comply with 18 CFR § 12.64-12.65, and the FERC Guidance for ODSP External Audits, Power Division staff developed a Request For Proposals (RFP) to solicit a firm qualified to conduct the ODSP Audit, and ODSP Manual Updates.

RFPs were issued to Consultants on March 2, 2023 by posting on the Agency's website and via direct email to ten dam safety industry firms. By the closing date of April 7, 2023, two proposals were received.

The RFP outlined the Power Division staff that would comprise the Review and Ranking team, as well as the Scoring criteria. The team thoroughly reviewed and ranked both proposals, and determined that the package submitted by Schnabel West Engineering, Inc. best meets the needs of the Agency and will provide the best value. The Schnabel team was notified of our intent to award the project to them.

As the FERC Guidance outlines, the Regional Engineer must review the qualifications of the Audit Team and accept them prior to performing the Audit. Upon receipt of approval, the Consultant Agreement will be finalized, and formal notice to proceed provided. The proposed timeline for the Audit, preparation of the final reports and ODSP Manual updates is tentatively May 24 – November 9, 2023. The start date is dependent on FERC approval of the Audit Team, and if necessary, will shift the timeline accordingly. SFWPA's ODSP has not been comprehensively updated since 2013, and an external audit has not been previously performed. FERC has transmitted numerous written requests for the Agency to complete this Audit, so they have commented that they will work to review the Audit Team in a timely manner. Members of the Audit Team have previously been approved by FERC to conduct external audits.

The 2023 Adopted Budget included a line item for this work effort. The contractual price will not exceed \$79,525.00, which is below the budgeted amount.

National Dam Safety Awareness Day – May 31, 2023

This month the Agency is highlighting the importance of May 31st as we join together with other dam owners across the country to commemorate National Dam Safety Awareness Day, and to remember the lessons learned from past dam failures.

The issue of dam safety was not widely recognized until 1889 when the failure of South Fork Dam near Johnstown, Pennsylvania claimed more than 2,200 lives, the most fatalities from a dam failure in the history of the United States. National Dam Safety Awareness Day occurs annually on May 31 to encourage the public to learn about the benefits as well as potential safety risks associated with dams.

Dams have numerous benefits including water supply for domestic, agricultural, industrial, and community use; flood control; recreation; and generation of clean, renewable energy through hydropower. South Feather Water and Power Agency dams are regulated by both federal and state agencies, and each dam is inspected annually by their respective engineers. Power Division Operations, Maintenance, Regulatory Compliance and Engineering staff are all actively inspecting and monitoring the dams and appurtenant structures to keep our dams safe, operational and resilient.

PROJECT WORK

Sly Creek Powerhouse Governor Work

The Sly Creek Powerhouse was recommissioned under South Feather Water and Power Agency's ownership in 1986. At that time, a Woodward Cabinet Governor with electro-mechanical actuation was installed to control the turbine. The Turbine Governor is a system that is responsible for controlling the amount of water that is fed to the turbine at all times; it is critical for the smooth and safe operation of the plant under normal, and especially rapid shut down, conditions. In recent years, the agency has experienced an increase in electrical issues within the analog electronic components of the governor. Aging components and outdated technology are contributing to decreased reliability and, less responsive and predictable control of the Generator.

The Agency has issued an RFP to solicit proposals from qualified firms to remove the antiquated electromechanical controls of the governor, and replace them with a modern Programmable Logic Controller (computer). This will reduce the maintenance demands of this system and increase the reliability, controllability, and safety of the unit.

Personnel

Bob Cherry retired in April. He was employed with the Agency for over 29 years, and a very competent team member in his roles and assignments. In his roles at the Water Division and Power Division, he performed his work with a priority on safety, and did an excellent job maintaining the Agency's water and power assets. He generously provided training and mentoring for new workers. We wish Bob a wonderful retirement, and we will miss him.

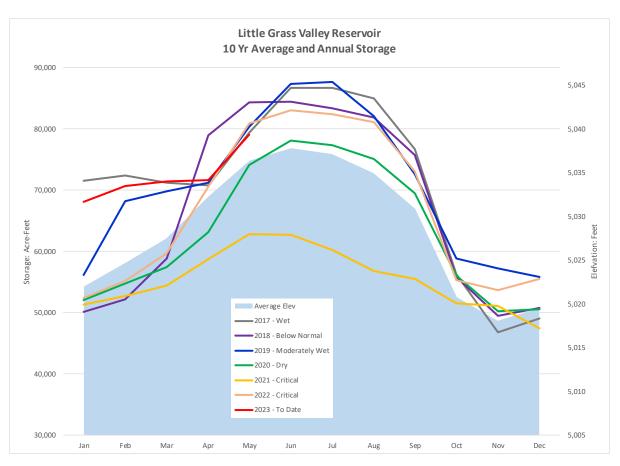
SOUTH FEATHER WATER AND POWER SOUTH FEATHER POWER PROJECT 2023

Reservoir and Stream Operations

	RESERVOIR ELEVATIONS MONTHLY AVERA					MONTHLY AVERAGE	STREAM RELEASES	
	Little Grass	Valley	Sly Cree	k	Release to SFFR	Release to SFFR	Release at	Release at
Maximum Elevation End of Month Conditions	5,046.50	Feet	3,530.00	Feet	at LGV Dam	at Forbestown Div.	Lost Creek Dam	Slate Creek Div.
January	5,034.43	Feet	3,502.81	Feet	8.32 cfs	204.00 cfs	113.00 cfs	430.00 cfs
February	5,034.74	Feet	3,506.16	Feet	7.89 cfs	7.69 cfs	7.20 cfs	79.80 cfs
March	5,034.72	Feet	3,515.27	Feet	7.93 cfs	681.00 cfs	273.00 cfs	598.00 cfs
April	5,037.80	Feet	3,520.28	Feet	39.80 cfs	171.00 cfs	181.00 cfs	576.00 cfs
May	0.00	Feet	0.00	Feet	0.00 cfs	0.00 cfs	0.00 cfs	0.00 cfs
June	0.00	Feet	0.00	Feet	0.00 cfs	0.00 cfs	0.00 cfs	0.00 cfs
July	0.00	Feet	0.00	Feet	0.00 cfs	0.00 cfs	0.00 cfs	0.00 cfs
August	0.00	Feet	0.00	Feet	0.00 cfs	0.00 cfs	0.00 cfs	0.00 cfs
September	0.00	Feet	0.00	Feet	0.00 cfs	0.00 cfs	0.00 cfs	0.00 cfs
October	0.00	Feet	0.00	Feet	0.00 cfs	0.00 cfs	0.00 cfs	0.00 cfs
November	0.00	Feet	0.00	Feet	0.00 cfs	0.00 cfs	0.00 cfs	0.00 cfs
December	0.00	Feet	0.00	Feet	0.00 cfs	0.00 cfs	0.00 cfs	0.00 cfs

Powerhouse Operations

	Sly Creek	Woodleaf	Forbestown	Kelly Ridge	Energy Revenue
January	5,428.21 MWH	32,624.64 MWH	25,726.22 MWH	7,437.09 MWH	\$3,195,636.16
February	2,677.38 MWH	18,497 .44 MWH	12,943.98 MWH	5,397.99 MWH	\$1,743,491.85
March	5,274.14 MWH	26,121.91 MWH	15,726.87 MWH	7,394.35 MWH	\$2,393,833.10
April	5,866.43 MWH	28,278.41 MWH	21,001.38 MWH	6,702.65 MWH	\$2,877,336 <u>.</u> 02
May	0.00 MWH	0.00 MWH	0.00 MWH	0.00 MWH	\$0.00
June	0.00 MWH	0.00 MWH	0.00 MWH	0.00 мүүн	\$0.00
July	0.00 MWH	0.00 MWH	0.00 MWH	0.00 MWH	\$0.00
August	0.00 MWH	0.00 MWH	0.00 MWH	0.00 MWH	\$0.00
September	0.00 мwн	0.00 MWH	0.00 MWH	0.00 мүүн	\$0.00
October	0.00 MWH	0.00 MWH	0.00 MWH	0.00 MWH	\$0.00
November	0.00 MWH	0.00 MWH	0.00 MWH	0.00 MWH	\$0.00
December	0.00 MWH	0.00 MWH	0.00 MWH	0.00 MWH	\$0.00
	19,246.15 MWH	105,522.40 MWH	75,398.45 MWH	26,932.08 MWH	\$10,210,297.13



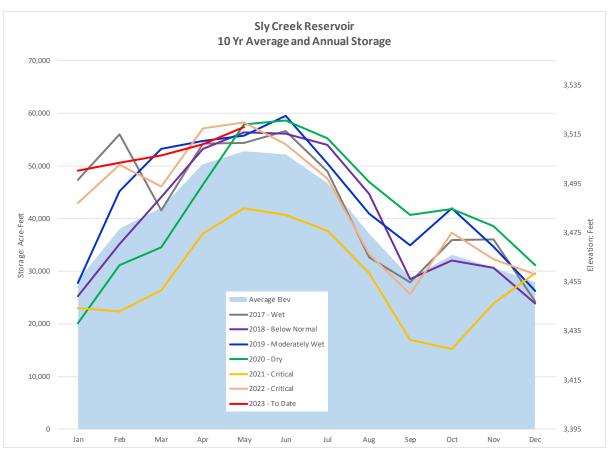
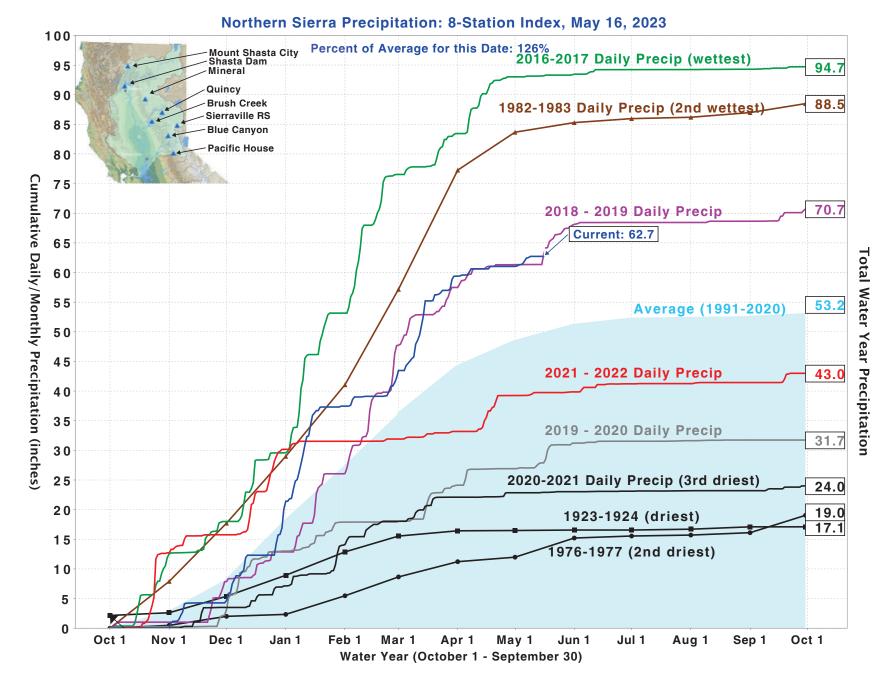


Table B.



SOUTH FEATHER WATER & POWER AGENCY



TO: Board of Directors

FROM: Rath Moseley, General Manager

Jaymie Perrin, Operations Support Manager

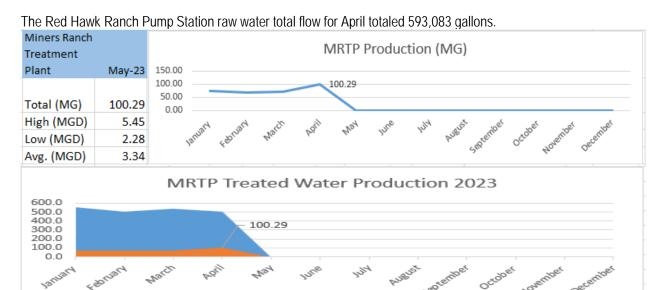
DATE: May 18, 2023

RE: General Information (regarding matters not scheduled on the agenda) 5/23/23 Board of Directors Meeting

Domestic Water Treatment Operations

The total Miners Ranch Treatment Plant (MRTP) treated water production for the month of April totaled 100.29 million gallons.

The total Bangor Treatment Plant (BTP) treated water production for the month of April totaled .510 million gallons.



All bacteriological requirements were in compliance for the MRTP& BTP. Miners Ranch production was 83% of average over the past 5 years. Bangor's production was 113% of average over the past 5 years.

MRTP Capacity (MG)

District Wide Water Operations

Multiple leak and meter repairs were performed during the month. Some of the meters were a result of tampering due to delinquent accounts and water shutoffs. Resources were applied to mutual aid support on the upper Forbestown ditch up to the start of irrigation.

MRTP Production (MG)

	Install	Meter	Ditch		Install	Lower	Remove	Install		Weed
May-23	Service	Repairs	Maintenance	Leak Repair	Backflow	Culvert	Coffer Dam	Cribbing	Grade Road	Abatement
						Upper	Upper	Upper	Upper	
					Morningside	Forbestown	Forbestown	Forbestown	Forbestown	Regulator
	Foothill Blvd.	Oak Knoll	Tank Ditch	Harbor Ct.	Dr.	Ditch	Ditch	Ditch	Ditch	Vaults
	Almond Ave.	Greenville	Bangor Canal	Royal Oaks						ID2
		Arbol	South Honcut	Van Duzer Ln.						
		Mt. Ida	Sunny Slope Ditch	Lemon Hill						
		Moonshine Ct.	Palermo Canal	Ling Bar						
		Lower Wyandotte	Palermo Dr.	Richter Ridge						
			Lower							
		Skyline	Forbestown	Tennessee Ln.						
			Upham Rd.	Midway						
				Reservoir Rd.						
				Lower						
				Wyandotte						

Two new water services were installed during the month.

Below are repair work pictures for raw water conveyance.



Before



After



Smashed culvert pipe with gap and debris



Water flowing after culvert repair

SB 998 Statistics (At time of print)

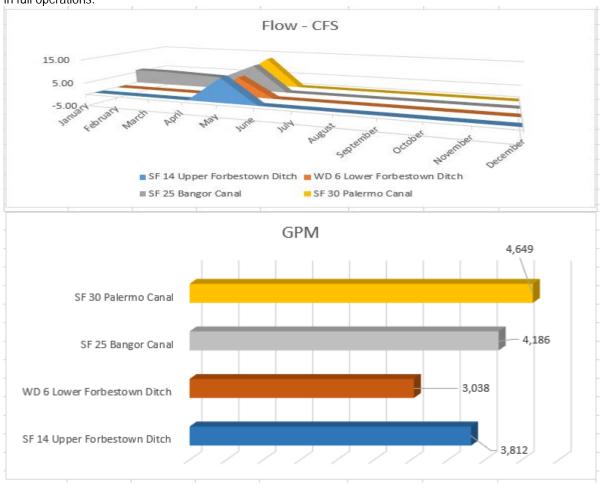
Billing cycles are based on meter reading routes

Billing Cycle	Division Impacted	Date of Service Shut-off	# of Shut- offs	Carrying Cost of Shut-offs	Remaining Services Shut-off	Carrying Cost of Remaining Accounts Shut-off
1 & 2	1,2,3,5	04/25/2023	10	\$1,891.04	0	\$0.00
3 & 4	2,3,4	05/02/2023	15	\$2,587.57	1	\$171.79
5 - 10	1,2,3,4,5	05/09/2023	8	\$1,469.08	1	\$162.47

^{**}Shut-off carrying costs include the additional incurred fees of the door hanger and meter lock in addition to the delinquent balance and other fees associated with the delinquent amount**

Irrigation Water Operations

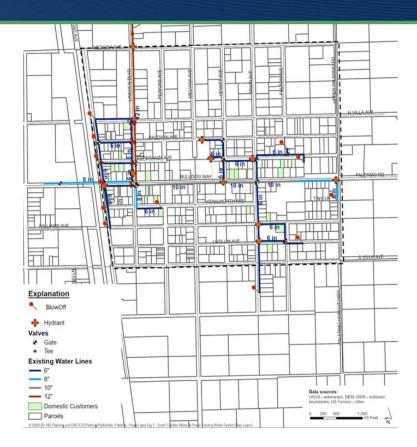
Irrigation on the Forbestown Ditch and Bangor area started May 8th and is operating well. All canals and ditches are in full operations.



Palermo Water Consolidation Project

Butte County Public Works has not issued a permit to continue work as of this writing. South Feather will be submitting an invoice to the County for costs associated with the project to date. Those costs include annexation of the defined project area, raw material (pipes, fittings, etc.) sand and gravel. Total expenditures to date are \$588K. SF has enough material on hand to complete phase 1 domestic line expansion, minus meters and backflows.

Existing SFWPA water system





Progress Through Local Partnerships

The Palermo Clean Water Project

- South Feather Water and Power Agency has water capacity to share
- Palermo needs a safe reliable water supply
- Butte County Governance efficiency by improving service
- LAFCO Facilitating Annexation of Palermo service area
- State Ability to provide grant funding to improve the Palermo community

Community outreach a key to project success





Proposed Improvements





Palermo Clean Water Consolidation Project

- Next Steps
 - County/SFWPA Agree To Implement Phase 1 Project (\$3.525M Budget)
 - SFWPA Agrees To Lead Phase 1 Project Construction Activities
 - Procure Phase 1 materials/supplies/equipment
 - Schedule crews for Phase 1 work starting in July 2022
 - 9-month construction schedule with County reimbursements
 - Coordinated outreach program
 - LSCE serving as Project Engineer schedule SFWPA Kick-off Meeting

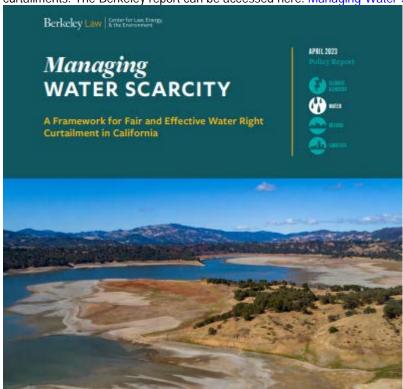


PG&E Standby Metering

A survey of 3 powerhouses (Forbestown, Sly Creek, & Woodleaf) is being scheduled in June. The purpose of the survey is to determine where PG&E can install revenue meters to measure standby power. This has been a topic of debate by South Feather as during the 11 ½ years hydro energy was delivered via a power purchase agreement, no revenue meters were required at the power houses. Continued investigation is required on who bears the cost of install and billing rate structure. Post powerhouse inspections, SF will engage with NCPA on requirements of the Power Purchase Agreement.

Water Rights Reform (Narrative provided by Minasian Law)

There continues to be a coordinated effort to fundamentally change the water right priority system. In addition to the usual NGO parties advancing reform, the Wheeler Institute at Berkeley Law on May 1st released "Managing Water Scarcity: A Framework for Fair and Effective Water Right Curtailment in California." Fortunately, the paper does not recommend wholesale changes to the priority system. However, it does recommend enlarging the SWRCB's power, including expressly empowering the SWRCB to curtail pre-1914 and riparian rights, and broadening the year types in which the SWRCB may curtail and expanding the SWRCB's emergency and regular rulemaking power concerning curtailments. The Berkeley report can be accessed here: Managing-Water-Scarcity_Report_April2023 (berkeley.edu)



Bills of Interest (Narrative provided by Minasian Law)

AB 754 (Papan) Water management planning; automatic conservation plan. The bill requires urban water suppliers with surface water reservoirs to identify in their urban water management plans target carryover storage levels sufficient to satisfy water users and environmental needs downstream and mandatory water use reductions when certain carryover storage levels are not met. ACWA adopted an oppose position.

SB 504 (Dodd) Wildfires; defensible space; grant programs for local governments. The bill would require CalFire, when reviewing applications for local assistance grants, to give priority to local governments that are qualified to perform defensible space assessments in very high and high fire hazard severity zones. ACWA adopted a favor position.

AB 755 (Papan) Water; public entity cost of service analysis. The bill would require a public agency conducting a cost of service analysis under Proposition 218 to identify the incremental costs incurred by major water users within its service area and how those costs could be avoided if these high water users satisfied urban water use efficiency standards. ACWA adopted an oppose position.

SB 57 (Gonzalez) Utilities and disconnection of residential service. The bill would preclude utility providers, including water providers, from terminating service if the forecast predicts a temperature will be 32 degrees Fahrenheit or less or 95 degrees Fahrenheit or warmer. ACWA adopted an oppose position.

Director Tours

Staff would like to set up field tours of the district starting with water treatment, storage, regulator vaults and raw water pump stations. In order to comply with the Brown Act we would request only two Directors at a time. I would suggest starting with the newly elected Directors (Mark Grover and Brad Hemstalk). If this is of interest, please discuss a date that is best and the Water Treatment Superintendent will lead the tour of locations listed above.

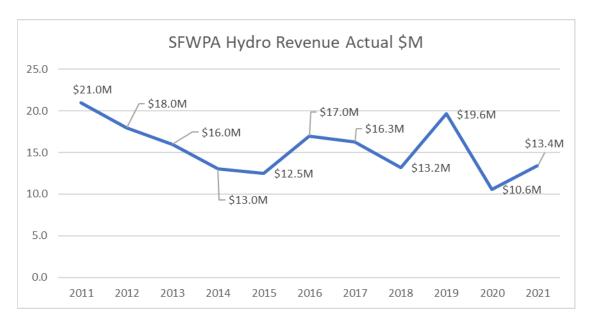
Water Rates

At the June 25, 2013 Board Meeting, the following was communicated.

"After the present power- purchase agreement with PG&E was negotiated in 2008/2009, we began developing strategies for how best to utilize the increase in proceeds from the hydropower project's generation of electricity. In addition to building ample reserves, providing for competitive employee compensation and retirement, paying off outstanding debt, and replacing worn out equipment and vehicles, plans were implemented for the purpose of improving the economies of the communities served by the Agency. The first part of this economic-improvement plan was a systematic reduction in rates for both domestic and irrigation customers that will be fully implemented by 2017".

At the time of implementation of the Power Purchase Agreement with PG&E with an effectivity date of 2010, SF was communicating to the Board that the annual revenue forecast for the generation and sale of electricity would be \$30.0 - \$40.M.

As you can see below the first year of the PPA only resulted in \$21.0M. At that point immediate adjustments should have been made on how to manage subsidized rates rather than following through with a year over year water rate reduction.



In 2018 an Oroville Region Water Service Study was performed by NorthStar Engineering on behalf of Butte LAFCO.

In that study, the following was documented.

"SFWPA water rates are highly subsidized by hydro sales. In fact, the actual costs to produce and deliver water into the SFWPA system are very similar to the actuals costs for Cal Water to produce and deliver water into their system. The debt service and depreciation costs for the recent completion of the Miners Ranch Treatment Plant (MRTP) upgrade by SFWPA in being completely subsidized by hydro. The future of power sales revenue is uncertain, and this subsidy may not be sustainable. Without the hydro subsidy the current SFWPA rate would have to triple".

South Feather faces the reality that water rates must be reviewed and addressed in order to create a funding mechanism to f aging infrastructure repairs, continued increases in water compliance costs, and significant material cost increases.

It is my recommendation that the Agency engages with an outside firm to conduct a water rate study providing independent financial advisory and utility rate consulting specific to California public agencies. The 2023 Budget only included \$1K for a water rates study but a realistic target cost would be \$30K and would be offset by reduction of another line item in the overall budget.



SOUTH FEATHER WATER & POWER AGENCY

TO: Public Recipients of Agenda Information

FROM: Rath Moseley, General Manager

DATE: May 15, 2023

RE: Real Property Negotiations, and Anticipated and Existing Litigation

Closed Session Agenda Item for 5/23/23 Board of Directors Meeting

The information provided to directors for this agenda item is not available to the public. The purpose for this item is to give the Board an opportunity to confer with legal counsel about litigation in which the Agency is already involved or is anticipating. The Board is permitted by law (Brown Act) to confidentially discuss information that might prejudice its legal position, to have a confidential and candid discussion about meet-and-confer issues. Such discussions are exempt from the Brown Act's requirement that matters before the Board be discussed in public. Attendance during the closed-session will be limited to directors, together with such support staff and legal counsel as determined necessary by directors for each subject under discussion.