Meeting Instructions While We Gather

- You have been muted upon entry
- Please feel free to unmute yourself to say "Hi" and test your sound connection
- Please mute yourself during meeting when you are not talking
- During the meeting, BAWSCA staff will mute your sound and video if necessary
- The <u>Raise Hand</u> button is at the bottom of your "Participants" list.
- To get the "Participants" list, click on the "Participants" button at the bottom of your Zoom Screen.
- If you have technical difficulties, please text Lourdes at 650-799-3845

Bottom left corner of your screen









"A multicounty agency authorized to plan for and acquire supplemental water supplies, encourage water conservation and use of recycled water on a regional basis."

[BAWSCA Act, AB2058 (Papan-2002)]

Board of Directors Meeting July 16, 2020



Item # I









Item # 5



San Francisco Regional Water System Capital Improvement Programs

Steven R. Ritchie Assistant General Manager for Water July 16, 2020



COVID-19 and Recession Impact

- Initially some "non-essential" projects halted due to COVID-19 concerns
- Projects re-started in June with new Health and Safety Plans
- Budget modifications submitted to Mayor's Office with limited impact on Water Enterprise CIPs



Water Enterprise CIP Priorities

- Maintain Levels of Service
- Spend down existing appropriations
- Complete projects that are underway, including WSIP projects
- Dam Safety
- Water Treatment
- Sunol and Millbrae facilities



Regional Water 10-Year Capital Improvement Program

REGIONAL WATER	FY 19-28	FY 21-30
Water Treatment	\$149,349,000	\$280,455,147
Water Transmission	\$311,603,000	\$142,505,828
Water Supply and Storage	\$216,301,000	\$333,531,574
Watersheds and Land Management	\$10,000,000	\$71,878,000
Communication and Monitoring	\$6,530,000	\$7,582,271
Buildings and Grounds	\$94,258,000	\$162,398,727
Long Term Monitoring and Permit Comp.	\$43,008,000	\$24,786,000
Base Funded by WSIP	\$62,000,000	\$0

\$893,049,000 \$1,023,137,547



Regional Water 2-Year Capital Improvement Program

REGIONAL WATER	FY 20-21	FY 21-22
Water Treatment	\$9,225,155	\$12,546,000
Water Transmission	\$0	\$0
Water Supply and Storage	\$0	\$29,842,000
Watersheds and Land Management	\$37,720,000	\$14,861,000
Communication and Monitoring	\$500 <i>,</i> 000	\$481,862
Buildings and Grounds	\$3,000,000	\$2,000,000
Long Term Monitoring and Permit Comp.	\$4,043,000	\$4,000,000
Base Funded by WSIP	\$0	\$0
	\$54,488,155	\$63,730,862



Regional Water 2-Year Capital Improvement Program Highlights

Water Treatment request is \$21.8 million

- \$20.6 million is for Sunol Valley Water Treatment Plant projects
- Water Supply and Storage request is \$29.8 million
 - \$29.8 million is for Purified Water and Other Supply projects
- Watersheds and Land Management request is \$52.6 million
 - \$22 million is for Watershed and Right-of-Way land acquisition
 - \$20.9 million is for 2 major trails in the Peninsula Watershed
 - \$8.6 million is for road reconstruction in the Peninsula Watershed

Buildings and Grounds request is \$5.0 million

- \$3.0 million is for Rollins Road Building Renovation
- \$2.0 million is for Millbrae Yard Lab and shops project



Hetch Hetchy Water 10-Year Capital Improvement Program

 All assets are classified Water (100% Water funded), Power (100% Power funded), or Joint (45% Water and 55% Power funded).

	FY19-28	FY21-30
Water 10-year total	\$247,685,000	\$277,878,200
Power 10-year total	\$142,103,000	\$152,261,207
Joint 10-year total	\$519,143,000	\$594,236,051
TOTAL	\$909,201,000	\$1,024,375,458



Hetch Hetchy Water 2-Year Capital Improvement Program

 All assets are classified Water (100% Water funded), Power (100% Power funded), or Joint (45% Water and 55% Power funded).

	FY20-21	FY21-22
Water 2-year request	\$20,077,000	\$33,733,000
Power 2-year request	\$0	\$10,560,207
Joint 2-year request	\$18,424,775	\$67,181,276
TOTAL REQUEST	\$38,501,775	\$111,474,483



Hetch Hetchy Water 2-Year Capital Improvement Program Highlights

Water 2-year total request is \$53.8 million

- \$42 million is for Mountain Tunnel Improvement Project
- Power 2-year total request is \$10.6 million
 - \$4.3 million is for Moccasin Powerhouse and GSU Rehabilitation
 - \$1.8 million is for Moccasin Powerhouse Bypass Upgrade
- Joint 2-year total request is \$85.6 million
 - \$36 million is for Mountain Tunnel Improvement Project
 - \$13.7 million is for Moccasin Penstock Rehabilitation
 - \$10.1 million is for O'Shaughnessy Dam Outlet Works, Phase 1



Progress in Sunol





Sunol Yard Administration Building





Alameda Creek Watershed Native Plant Nursery





Alameda Creek Watershed Center





Total Deliveries





Questions?



New Calaveras Dam – May 2019



BAWSCA Recently Completed an Asset Management Program Audit of SFPUC

- Asset Management Definition
 - "The coordinated activity of an organization to realize value from assets. Realization of value will normally involve a balancing of costs, risks, opportunities and performance."
- Audit tasks included
 - Document review
 - Interviews with Hetch Hetchy Water and Power (HHWP) and Water Supply and Treatment (WST) staff
 - Evaluation
 - Preparation of report documenting the audit





Item #7A

Five Core Questions for Sustainable Asset Management

- I. What is the current state of my assets?
- 2. What is my required level of service (LOS)?
- 3. Which assets are critical to sustained performance?
- 4. What are my best O&M and CIP investment strategies?
- 5. What is my long-term funding strategy?



BAWSCA's Effort Aligned with EPA Asset Management Framework

- Criteria Evaluated
 - Asset Registry
 - IT Support
 - Risk Procedures
 - O&M
 - Condition Assessment
 - Replacement Planning
 - Alignment with Agency Planning
 - Service Level
 - Supply Chain
 - Staff Support



Ten Primary Audit Criteria Used (1 of 2)

Criterion	Description
I. Asset Registry	Evaluate the state of the asset register and its support of asset management objectives.
 IT Capabilities to Support Asset Mgmt. 	Evaluate management software tools support systems.
3. Risk Procedures	Evaluate the use of risk policy to support decision-making.
4. Operation and Maintenance	Evaluate the use of business processes, data collection, and maintenance practices to support asset management.
5. Condition Assessment and Remaining Useful Life	Evaluate how remaining asset useful life is used in decision-making.



Ten Primary Audit Criteria Used (2 of 2)

Criterion	Description
6. Replacement Planning	Evaluate if processes are in place to forecast refurbishment and replacement timing and needs
7. Service Level	Evaluate the practice of using required service level to optimize decision-making.
8. Connection to Other Plans	Assess the level to which asset management activities are influenced by relevant agency plans and documents.
9. Supply Chain	Evaluate supply chain practices to support asset management and improves work efficiencies.
10. Staff Support	Evaluate staffing levels to support asset management.



A Five Level Evaluation Model Used for Scoring

Level	Description
Initial	Success is likely to depend on individual efforts and is
	not considered to be repeatable
Repeatable	Basic techniques are established, and successes could
	be repeated
Defined	Standard processes exist through greater attention
	to documentation, standardization, and integration.
Managed	Monitors and controls are in place.
Optimized	Processes are constantly being improved through
	monitoring feedback and introducing innovative
	processes to better serve the organization's
	particular needs.



Audit Presents Two General Conclusions and Specific Conclusions by Criteria

General Conclusions

- I. SFPUC embraces the basic principles of asset management within its WST and HHWP Divisions
- 2. Guiding policy and direction exists at the management level, but WST and HHWP are at different levels of implementation and, in some areas, are not consistent in their implementation of certain principles



Specific Conclusions – By Criterion (1 of 2)

Criterion	ННЖР	WST	Conclusions
Asset Registry	Repeatable	Repeatable	 Asset registries nearly complete No process to regularly update registries Insufficient staffing for routine asset reviews Asset registries are reportedly nearly complete but there is no process in place to regularly update the registries and staffing levels do not support routine asset reviews.
IT Capabilities to Support Asset Mgmt.	Managed	Managed	• IT tools and systems are current and provide proper support
Risk Procedures	Initial	Initial	 Risk policies exist but risk assessments not being performed. HHVVP developing asset management programs including a risk assessment protocol
Operation and Maintenance	Repeatable	Repeatable	• Maintenance practices are developed, and maintenance is being performed.
Condition Assessment and Remaining Useful Life	Repeatable	Initial	 Institutional knowledge is relied on significantly. Remaining useful life is not measured.

Specific Conclusions – By Criterion (2 of 2)

Criterion	HHWP	WST	Conclusions
Replacement Planning	Repeatable	Repeatable	 Replacement planning is performed during biennial project planning. Decisions made based on institutional knowledge.
Service Level	Repeatable	Initial	• A structured service level objective is not in place.
Connection to Other Plans	Repeatable	Initial	 There is some development of strategies at HHWP to develop asset management protocols in conformance to the 2018 State of the Regional Water System Report.
Supply Chain	Defined	Defined	 Supply Chain management is prescribed, and methods exist.
Staffing to Support Asset Management	Defined	Defined	 Staffing functions to support asset management are defined.



Recommendations - General

- Enhancements to Current Asset Management
 Planning
 - Develop a uniform approach to risk. HHWP will achieve this by completing the planned development of the risk framework and risk assessment tool.WST should participate in this effort.
 - HHWP is also completing an ISO-55000 Gap Analysis and asset management planning.WST should participate in this effort.



Recommendations – Near-Term (1 to 3 years)

- HHWP and WST adopt the same standards for asset management
- Develop policy to review and update asset registries and renew at approximately 5-year intervals
- Formalize the asset management approach uniformly across the utility per the 2020 Strategic Plan
- Review and update the current asset definition policy



Recommendations – Mid-Term (3 to 5 years)

- Evaluate asset criticality at approximately 5-year intervals
- Maintain a risk register in Maximo for each managed asset or facility
- Configure automated workflow in Maximo for greater efficiencies
- Develop a policy and method for estimating remaining asset useful life
- Develop a replacement planning program to forecast renewal needs
- Implement the 2020 Strategic Plan to develop Level of Service Criteria and goals



Recommendations – Mid-Term (3 to 5 years) (Continued)

- Implement the 2020 Strategic Plan Asset Management Objectives to develop a uniform investment process linked to asset management priorities.
- Implement the 2020 Strategic Plan Asset Management Objectives to formalize the asset management approach across the utility uniformly.
- Develop a formal warehouse management plan to be applied to both HHWP and WST.
- Evaluate spare parts lists and begin stocking spare parts in the warehouse for asset maintenance work.
- Eliminate the practice of undocumented storerooms with "invisible" inventory that are not valued or carried in the finance ledger.



Recommendations – Phase 2 of BAWSCA Asset Management Review FY 2020-21

- Evaluate SFPUC's use of Maximo
 - Delayed until FY 2021-22 due to BAWSCA budget constraints
- Review HHWP Gap Analysis, asset management plans, risk management policies and risk management tool development.
 - Included in FY 2020-21 Work Plan
 - Work has been initiated with HHWP



Asset Management Audit - Next Steps

- Audit report posted to BAWSCA website
 - www.BAWSCA.org
- BAWSCA has initiated its review of the HHWP Gap Analysis
- Regular updates will be provided to Board as appropriate





S. Ritchie, 2019



Los Vaqueros Expansion (LVE) Project

- LVE Project being evaluated by CCWD, BAWSCA and six other agencies
- Includes expanded surface water reservoir storage and other facilities
 - I0 thousand acre-feet (TAF) per year of supply for drought years
- LVE recommended in BAWSCA's Long Term Reliable Strategy
 - Reduce drought rationing impacts of SF Regional Water System (RWS) shortages
- Board last updated in April on:
 - Multi-Party Amendments (MPA) #1 and #2
 - Status of South Bay Aqueduct studies, Final EIS/EIR, and JPA formation
- Board will need to consider next funding and participation commitment this September
 - MPA Amendment #2
- Discussion purposes only today, no action requested



LVE "Knowns" and "Unknowns" – Supply Needs

BAWSCA's Water Supply Needs

<u>Knowns</u>

 Drought year shortfalls are significant and are forecasted to be as high as 48 TAF (43 mgd) during a 20% SF RVVS system-wide shortfall

<u>Unknowns</u>

- Outside factors could increase or decrease BAWSCA need for LVE supplies, for example:
 - Changes to water demands
 - Climate change
 - Regulatory actions
- Recent Regional Demand Study will inform upcoming analyses but provides only part of the information needed



Potential Water Supply Benefits

<u>Knowns</u>

- I0 TAF of LVE supply could reduce overall water supply shortfall on the RWS for the Wholesale Customers:
 - 15% supply shortfall reduced to 10% during a 10% RVVS system-wide shortfall, and
 - 26% supply shortfall reduced to 21% during a 20% RVVS system-wide shortfall

<u>Unknowns</u>

- How much of the 10 TAF will be available in dry years is dependent on:
 - Successive dry years
 - Storage levels
 - Service agreements
 - Draft September 2021
 - Execute December 2021 (Prop I requirement)



Member Agency Interest in Dry Year SupplyKnowns

- Previous interest in BAWSCA identifying new water supplies to offset shortfalls from RWS during dry years
- Concern about the cost of LVE supplies compared to customers' ability to conserve
- A few agencies <u>do not</u> want BAWSCA to pursue LVE supplies on their behalf

- Majority of agencies are undecided about their interest in the benefits of the LVE Project
 - More information is needed regarding costs & access to the water through the SBA
- A very small number of agencies affirmed interest in LVE supply benefits
 - Is a subscription program a viable option?



LVE "Knowns" and "Unknowns" - SBA

SBA Reliability Considerations

<u>Knowns</u>

- SBA is required for BAWSCA to take deliveries of LVE water
- Valley Water "SBA Capacity Study" expected in August 2020
- DWR "SBA Condition Assessment" expected in September 2021

<u>Unknowns</u>

- SBA capacity questions:
 - Is there available capacity?
 - How much capacity is available?
 - When would capacity be available?
- Scale and cost of needed repair work will not be known until September 2021



LVE "Knowns" and "Unknowns" - Costs

Cost Component	Cost	Recurrence	Reference
Annual LVE JPA Cost	\$1,200,000	Yearly	CCWD Staff
Costs to move water during dry year need	\$260/AF	Only when moving water from LVE storage to SBA	CCWD Staff
Use of SBA	\$100- \$300/AF	Only when moving water from LVE storage thru SBA	US Bureau of Reclamation – Final EIS for LVE (\$ rounded; includes power costs and assumed facility usage fee)
Wheeling and Treatment by Delivery Partner Agency (From SBA to either SFPUC,ACWD, or Valley Water)	\$400- \$800/AF	Only when moving water from LVE storage thru SBA to SF RWS	Ballpark cost to treat and convey the supplies to BAWSCA service area – costs developed by using comparable agency (EBMUD) data for the estimate (\$600/AF)
SFPUC – RWS Wheeling	\$100- \$200/AF	Costs associated with moving BAWSCA supplies thru RWS	Ballpark cost includes estimates of incremental increased costs (power costs, staffing during wheeling operations, and misc. facility charges)
TOTAL Annual Cost	\$1,200,000	Yearly	NA
TOTAL Cost of Water During Drought	\$860/AF - \$1,560/AF	When taking water from LVE storage	NA

LVE – Next Board Decision Scheduled for September 2020

Timeline and Key Decision Points



Bay Area Water Supply & Conservation Ager



Jensen, 2011



Item #9

Closed Session





Jensen, 2011



BAWSCA May 2020 Total Potable Water Use 21% Less Than May 2013



Note: Menlo Park and East Palo Alto not reported; used estimated from prior month

Item # 8A

Bay Delta Plan Update

- Governor Newsom continues to provide critical leadership
- CA Secretaries of Natural Resources and CA EPA remain engaged
- BAWSCA continues coordination with SFPUC and others
- BAWSCA and its member agencies continue to
 - Support Bay-Delta Plan objectives
 - Be committed to working with other stakeholders to protect water quality in the Bay-Delta for humans, fish and other wildlife
 - Support voluntary settlement agreements to resolve this critical issue
- BAWSCA remains focused on a voluntary agreement as best solution to resolve this critical issue
- BAWSCA's June 2nd letter to Governor Newsom asks for his further leadership to initiate environmental review of Tuolumne River Voluntary Agreement by the State Water Board



Item # 8C

Federal Energy Regulatory Commission (FERC) Has Released New Don Pedro Final EIS

- Licensing required by FERC for New Don Pedro and La Grange Hydroelectric Projects
 - MID & TID Licensees
 - Involves endangered species issues, bypass flows, water quality and water supply issues
 - Don Pedro Water Bank
- October 11, 2017 Districts filed the final amended Application for License
 - FERC staff recommendation is similar to the District's preferred plan that was supported by BAWSCA and SFPUC
 - January 2018 BAWSCA intervened in the licensing process
- February 11, 2019 Draft EIS released
 - April 12, 2019 BAWSCA and Member Agencies submitted comments
- July 7, 2020 Final EIR released
- BAWSCA coordinating review of Final EIR with SFPUC



Item # 8D

CEO/General Manager Performance Evaluation Process

- CEO evaluation initiated each year in July
- Email from Board Chair next week
 - Annual report on results from CEO
 - Evaluation criteria and form
- Evaluations due back to Chair by August 7th
- Chair will compile scores/results and prepare written draft report for distribution to full Board
- Closed session discussion regarding results of evaluation at September meeting



Board of Directors Policy Calendar Through October 2020

Meeting Date	Purpose	Issue or Topic
July 2020	R&D S	Audit of SFPUC's Asset Management Program Los Vaqueros Expansion Project and Potential BAWSCA Participation
September 2020	D&A D&A D&A R&D R&D	CEO/General Manager Performance Evaluation Los Vaqueros Expansion Project and Potential BAWSCA Participation Establishing a Policy Relating to the WSA Balancing Account Demand Study Findings Review of CERBT Fund Update
November 2020	D&A D&A D&A D&A D&A R&D	Consideration of Action to Extend Current Tier 2 Drought Plan Review of Agency Personnel Handbook Annual Review and Consideration of BAWSCA's Statement of Investment Policy Review and Consideration of BAWSCA's General Reserve Policy Los Vaqueros Expansion Project and Potential BAWSCA Participation OPEB Report
January 2021	D&A D&A R&A R&D S	FY 2019-20 Mid-Year Work Plan and Budget Review Annual Review of General Reserve Management Annual Review of WSA Balancing Account Status Review of Water Supply Forecast FY 2021-22 Work Plan and Budget Study Session

Key: R=Report, D = Discussion, S = Study Session, A = Action







Next Board Meeting:

- September 17, 2020
- Time: 6:30 pm
- Location: "Virtual" Zoom Meeting

