SAN JUAN WATER DISTRICT

Board of Director's Meeting Minutes
March 9, 2016 – 7:00 p.m.

BOARD OF DIRECTORS

Pam Tobin	President
Ken Miller	Vice President
Ted Costa	Director
Dan Rich	Director
Bob Walters	Director

SAN JUAN WATER DISTRICT MANAGEMENT AND STAFF

Shauna Lorance	General Manager
Keith Durkin	Assistant General Manager
Donna Silva	Director of Finance
Teri Grant	Board Secretary/Administrative Assistant
Joshua Horowitz	Legal Counsel

OTHER ATTENDEES

Dane Wadle	California Special Districts Association
Lynn Scherrer	Customer
Dave Underwood	Fair Oaks Water District
Ibrahim Khadam	MWH
Yung-Hsin Sun	MWH
Tony Barela	SJWD
Jason Mayorga	SJWD
Mike Miller	The Ferguson Group
Kristi More	The Ferguson Group

AGENDA ITEMS

I. Public Forum
II. Consent Calendar
III. Presentations
IV. Committee Reports
V. Information and Action Items
VI. Upcoming Events
VII. Closed Session
VIII. Open Session
IX. Adjourn

President Tobin called the meeting to order at 7:00 p.m.

I. PUBLIC FORUM

Mr. Dane Wadle addressed the Board introduced himself as a Field Coordinator with the California Special Districts Association (CSDA), and thanked the District for its membership in CSDA. He explained that he is part of the CSDA field

coordinator program and is the District's liaison for the Sierra Network. He provided the Board Secretary with a handout of information and will provide the Board Secretary with a list of meeting dates.

II. CONSENT CALENDAR

All items under the consent calendar are considered to be routine and are approved by one motion. There will be no separate discussion of these items unless a member of the Board, audience, or staff request a specific item removed after the motion to approve the Consent Calendar.

1. Minutes of the Board of Directors Meetings

Approval of San Juan Water District's Board of Director's meeting minutes as follows:

1. Minutes of the Board of Directors Meeting, February 10, 2016
2. Minutes of the Board of Directors Workshop #1, February 17, 2016
3. Minutes of the Board of Directors Workshop #2, February 18, 2016

Director Costa moved to approve the Consent Calendar. Director Walters seconded the motion and it carried unanimously.

Director Walters noticed a number of items in the minutes that require follow-up. He will provide the Board Secretary with a list of items.

III. PRESENTATIONS

1. Water Management and Reliability Study Update – MWH

Mr. Durkin introduced Mr. Ibrahim Khadam, MWH Principal Engineer. MWH has been working on the Water Management and Reliability Study and has produced three Technical Memorandums which will be attached to the meeting minutes.

Mr. Khadam conducted a presentation on the status of the study, progress made to date and the next steps. He reviewed the purpose and goal of the study, and provided specific study objectives. In addition, he reviewed the planning constraints, the roles and responsibilities of each group associated with the study, and the study process and schedule. A copy of the presentation will be attached to the meeting minutes.

Mr. Khadam reviewed the evaluation criteria and metrics, which includes cost-effectiveness, contribution to objectives, implementation complexity, and uncertainty. He explained that there will be a high-level evaluation and preliminary screening of all options in order to provide a short list of options. The retained options will receive a refined evaluation and be prioritized.

Mr. Khadam informed the Board that the options in the study fall within three strategies - Increase Use of District's Water Rights & Contracts Entitlements; Develop Alternative Access to Surface Water; or Diversify Water Supply

Portfolio. He reviewed the tactics to use for each strategy. In addition, he explained the preliminary evaluation form that will be used for each option and showed how the options will be summarized. Furthermore, the options will be presented in a Trade-off Analysis which will show which options are more or less desirable based on different criteria.

Mr. Khadam informed the Board that all the options will be brought back to the committee for input once they are evaluated and placed into three separate groups – high potential, moderate potential and low potential. After the committee input is incorporated into the study, the information will be brought to the Board for their input and then the short list of options will go through the refined evaluation and prioritization phase. He explained that once this phase is complete then the final study report will be provided to the Board with recommendations for short-term and long-term actions.

2. Federal Lobbying Update – Mike Miller and Kristi More

President Tobin introduced Mike Miller and Kristi More from The Ferguson Group, and informed the Board that they would be providing an update on federal lobbying activities.

Mr. Miller provided an outline on how federal lobbying has changed over the last decade. He explained that lobbying efforts used to focus on securing congressional earmarks or directive language that ensured funding to specific projects. However, about ten years ago a change occurred and an earmark moratorium went into effect. He explained that the earmark moratorium has had an important impact on both funding and policy decision making.

Mr. Miller informed the Board that funding and policy decision making is more balanced between Congress and the federal agencies. He explained that funding decisions now often come in the form of agency work plans as opposed to congressionally directed spending (earmarks). He further explained that decisions are tied less to the appropriations cycle and more to the process. A steady engagement throughout the year with both Congress and the agencies provides the best results.

Mr. Miller stated that providing well-planned and informed communication with the agencies in Washington, D.C., as well as locally, providing local perspective directly to the members of Congress and their staff, meeting with committee staff members, and meeting with agency officials and staff are all important to the success in lobbying the issues that are important to the District. He informed the Board that the recent set of meetings in Washington, D.C. that the District participated in continues the effort in a very positive way. He stated that the District has very successfully stayed engaged in federal lobbying. In addition, he stressed the importance of having local connections and relationships with representatives.

Ms. More reviewed the successes and challenges at the federal level. She informed the Board that The Ferguson Group lobbies on behalf of R3 Water,

which signifies the joint partnership between the District and the cities of Folsom and Roseville as the three direct water purveyors off of Folsom Dam. Recently, The Ferguson Group has also worked with PCWA and the City of Sacramento on joint issues that affect all five agencies.

Ms. More reported that The Ferguson Group has always advocated for regulatory and policy issues, as well as legislative issues for the region. She explained that The Ferguson Group took a lot of the issues, projects and programs from the last five years and integrated them into a more formal federal agenda. A copy of the agenda will be attached to the meeting minutes.

Ms. More explained that the agenda is broken down into three main areas – operations, the future, and awareness. She explained that, being local, she has been able to develop relationships with congressional offices in the Sacramento region as well as the USBR, Army Corp of Engineers, and most recently, NOA Fisheries. She explained that in a critical year, such as this past year, she has made multiple trips to Washington, D.C. targeting the Sacramento delegation, as well as the northern delegation.

Ms. More informed the Board that the last trip to Washington, D.C. focused on operations, as it is the largest issue that the region is facing. In addition, drought legislation was discussed. She commented that that the House of Representatives approved drought legislation last year and that a new bill, introduced by Senator Feinstein, is currently being considered in the Senate. The Ferguson Group has lobbied for provisions in drought legislation that ensure the District's water rights are not negatively impacted, and that operations at Folsom Dam do not diminish or prevent access to the District's water supply. In addition, grant funding for water projects was also lobbied for.

Ms. More informed the Board that The Ferguson Group has worked with USBR on the control manual update for the new Joint Federal Project (spillway). She explained that the control manual will be used to operate the spillway when it goes into operation in 2017. She explained that The Ferguson Group advocated for forecast-based operations to be used in the control manual and that water supply is considered as well.

Ms. More informed the Board that there is a lot of support from the congressional delegation. She explained that last fall a letter was secured from the bipartisan congressional delegation in support of the operations to keep Folsom Reservoir whole (operational reliability). In addition, she mentioned that there is more awareness of the needs of Folsom Reservoir on a regional basis.

ACTION AND INFORMATIONAL ITEMS

IV. COMMITTEE REPORTS

1. Legal Affairs Committee (1/29/16)

Director Costa reported that the committee met on February 29, 2016, and discussed the following:

- Review BKS Legal Services Agreement (W & R)
- Legislative Strategy for Groundwater and Conserved Water Transfer (W)
- Strategies related to SWRCB Conservation Requirements (W & R)
- FO-40 Agreement on Payment Schedule (W)
- Conflict of Interest Issues (W)
- Los Lagos Tank CEQA Notice of Exemption (R)
- Other Legal Affairs Matters
- Public Comment
- Closed Session
- Open Session

The committee meeting minutes will be attached to the original board minutes.

Review BKS Legal Services Agreement (W & R)
This agenda item was tabled to the next committee meeting.

Legislative Strategy for Groundwater and Conserved Water Transfer (W)
Director Walters reported that legislative strategy was mainly regarding conserved water transfers since groundwater transfers already have a process to follow. Ms. Lorance will provide more information under her General Manager's Report.

For information only; no action requested

Strategies related to SWRCB Conservation Requirements (W & R)
Ms. Lorance will provide more information under her General Manager's Report.

FO-40 Agreement on Payment Schedule (W)
For more information on *FO-40 Agreement on Payment Schedule*, please refer to the committee meeting minutes.

Conflict of Interest Issues (W)
Director Walters reported that the conflict of interest issues related to the Water Management and Reliability Study have been resolved as reflected in the committee meeting minutes.

Los Lagos Tank CEQA Notice of Exemption (R)
Mr. Durkin informed the Board that the Los Lagos Tank Recoating Project is categorically exempt from CEQA. However, the project has the potential to

create some noise, dust and fumes during the rehabilitation process; therefore, public outreach is being performed with customers in the area near the project. The CEQA Notice of Exemption (NOE) will be placed on a future agenda for the Board to authorize staff to file the NOE and to hear any customer comments.

For information only; no action requested

Other Legal Affairs Matters (W/R)
Director Walters reported that the committee had a Closed Session to discuss the transfer of conserved water.

For information only; no action requested

2. Water Supply & Reliability Committee (3/1/16)
Director Walters reported that the committee met on March 1, 2016, and discussed the following:

- Water Management and Reliability Study Update (W)
- Groundwater Reimbursement Status (W)
- Strategy and Options to Address Various Conservation Requirement Scenarios This Year (R)
- Other Matters
- Public Comment

The committee meeting minutes will be attached to the original board minutes.

Water Management and Reliability Study Update (W)
MWH provided an update to the Board at the beginning of the meeting.

Groundwater Reimbursement Update (W)
Ms. Lorance reported that a meeting with the City of Folsom and Orange Vale Water Company was held to discuss how to deal with groundwater reimbursements. In addition, she sent a request to Tom Gray (FOWD) and Bob Churchill (CHWD) to meet after the RWA meeting to discuss the meeting with the City of Folsom and OVWC.

Ms. Lorance explained that there are two options to consider – pay for the water costs from 2014 for the requested water that was pumped and continue to discuss the 2009-2013 costs, or SJWD-W pays everything up front. At this point, the first option is preferred by the OVWC and the City of Folsom. In addition, they would like to see the backup documentation for the 2009 water costs since those charges are similar to the 2014 costs when water was actually pumped.

Ms. Lorance confirmed that this item will be discussed by the committee on April 6th.

Strategy and Options to Address Various Conservation Requirement Scenarios This Year (R)

Director Walters informed the Board that the committee had a long discussion on the 2016 conservation requirements and program. Ms. Lorance reported that the committee minutes outline the conservation program and costs. She commented that the State Water Resources Control Board (State Board) will provide more information later on conservation and the District needs to be prepared.

Mr. Durkin reviewed the committee's discussion regarding their recommendation to proceed with a conservation program similar to last year with some revisions. The recommended revisions include:

- Update ordinance to incorporate progressive penalties for water waste (for example $100/$200/$500/shut off)
- Update ordinance to incorporate winter irrigation schedule. October 1-March 30 irrigation allowed 1 day per week. This should be applicable to Stages 2-4.
- Increase FY15/16 budget by $16,000 and increase the FY16/17 budget by $36,000
    - Maintain two 1,000 hour water waste patrol staff ($6,000)
    - Maintain contracted night patrol services (spring/summer/fall) ($10,000)

Ms. Lorance commented that, hearing no objections, staff will bring back an ordinance change to include the penalties and restrictions on watering in the winter months. She explained that the Board does not have to implement either, but at least they would be available should the drought become more serious in the future. In response to Director Rich's question, Ms. Lorance confirmed that the ordinance changes would be tied to a conservation stage. Mr. Durkin commented that the committee recommends that should progressive penalties be implemented then there needs to be a due process with an appeal process and possible water school option for first-time violators in lieu of paying the fine. Director Miller commented that if penalties are implemented by the District then they need to be tied to specific violations of the restrictions.

The Board discussed the conservation program and the possible penalties. There was concern to impose penalties on conservation when Folsom Reservoir is releasing water. Ms. Lorance informed the Board that a telephone town hall is scheduled for Monday, March 14th, to inform customers regarding current water supply conditions and what the District is doing at this time.

In response to Director Miller's request, Director Rich informed the Board that the committee also requested to see last year's PI spending versus the effectiveness. Director Rich commented that the committee was informed that the patrols were very effective in reaching customers and he believes that Ms. Lisa Brown is preparing information for the committee regarding the

effectiveness of the program. Ms. Silva pointed out that it is important for the District to show its efforts through a conservation program in case the District fails to meet the conservation requirements.

Mr. Durkin informed the Board that it could take upwards of three months to finalize an ordinance change so it is important that an ordinance is in place even if the ordinance is not used. He commented that water supply conditions are changing.

Director Rich commented that the Board should consider removing the drought surcharge since it really does not cover all revenue losses from the drought. He suggested that the finance planning consider removing the drought surcharge and instead anticipate the revenue for the next year to five years. Ms. Lorance commented that The Reed Group can incorporate this option into the financial plans and bring back to the Board.

For information only; no action requested.

3. Engineering Committee (3/2/16)

Director Rich reported that the committee met on March 2, 2016, and discussed the following:

- WTP Flocculation/Sedimentation Basin Improvements Project (W)
  Update on construction bids and recommendation to award contract
- WTP Flocculation/Sedimentation Basin Improvements Project (W)
  Recommendation for construction management
- Hinkle and Kokila Reservoir Condition Assessments Status Report (W & R)
- Los Lagos Tank Recoating Project Status Update (R)
- GIS (W and R)
  Presentation on District's current capabilities, needs assessment, and recommendation for additional implementation
- Other Engineering Matters
- Public Comment

The committee meeting minutes will be attached to the original board minutes.

WTP Flocculation/Sedimentation Basins Improvements Project (W)

Director Rich informed the Board that bids were received and opened for the WTP Flocculation/Sedimentation Basin Improvements Project on February 25th. The bid results came in below the engineer's estimate of $7,574,000. He reported that Myers & Sons Construction (Myers) submitted the lowest bid at $6,040,100.

Director Miller moved to award a construction contract to Myers & Sons Construction, LP, for the amount of $6,040,100 and authorize a construction contingency of $604,010 (10%) for a total construction budget of $6,644,110 for the WTP Flocculation/Sedimentation Basins

Improvements Project. Director Walters seconded the motion and it carried unanimously.

In response to Director Walter's question, Mr. Horowitz confirmed that the lowest bidder adequately met the experience qualifications.

WTP Flocculation/Sedimentation Basins Improvements Project (W)
Director Rich informed the Board that proposals for construction management of the WTP Flocculation/Sedimentation Basin Improvements Project were received from Kennedy/Jenks Consultants (KJ), the design engineer for the project, and Inferrera Construction Management Group (ICM).

President Tobin moved to award a construction management contract to ICM for the amount of $390,640, a construction engineering support contract to Kennedy/Jenks Consultants for the amount of $203,000, and authorize a 15% contingency of $90,000 for a total construction management budget of $683,640 for the WTP Flocculation/Sedimentation Basins 2016 Improvements Project. Director Miller seconded the motion and it carried unanimously.

Hinkle and Kokila Reservoir Condition Assessments Status Report (W & R)
Director Rich informed the Board that the Hinkle and the Kokila Reservoir Condition Assessments Status Reports for phase 1 are complete. A copy of each report was attached to the committee meeting minutes. He explained that there will be some field testing to determine the remaining useful life of each reservoir lining/cover so that costs can be projected.

For information only; no action requested.

Los Lagos Tank Recoating Project Status Update (R)
Director Rich commented that Mr. Durkin covered this under the Legal Affairs Committee report.

GIS (W & R)
Director Rich informed the Board that a status of the District's current Geographical Information System (GIS) was provided to the committee. He reported that the committee agreed that a needs assessment be performed and agreed that staff should place the needs assessment costs into the financial plan and budget for consideration by the Board.

For information only; no action requested.

4. **Finance Committee (3/8/16)**
Director Costa reported that the committee met on March 8, 2016, and discussed the following:

- Review and Pay Bills (W & R)

- Financial Plan Update (W & R)
- FY 2016-17 Budget Update (W & R)
- Quarterly Treasurer's Report – Quarter Ending December 31, 2015
- Quarterly Financial Report – Quarter Ending December 31, 2015
- Other Finance Matters
- Public Comment

The committee meeting minutes will be attached to the original board minutes.

Review and Pay Bills (W & R)
Director Costa reported that the committee reviewed bills and claims in the amount of $1,030,084.37 and found them to be in order.

Director Costa moved to approve Resolution 16-03. Director Rich seconded the motion and it carried unanimously.

Financial Plan Update (W & R)
Ms. Silva reported on the financial plans under Agenda Item 3.

FY 2016-17 Budget Update (W)
Director Costa reported that a Strategic Planning Workshop will be set for the end of April. In addition, Mr. Bob Reed will be presenting the financial plans on May 24th or 25th with a budget workshop planned for May 25th or 26th.

For information only; no action requested.

Quarterly Treasurer's Report – Quarter Ending December 31, 2015
Director Costa reported that the Quarterly Treasurer's Report for the quarter ending December 31, 2015 was received. A copy of the report was provided in the Board packet and will be attached to the original meeting minutes. In addition, he informed the Board that Ms. Silva will be reviewing the investment portfolio in order to receive a higher return.

For information only; no action requested.

Quarterly Financial Report – Quarter Ending December 31, 2015
Director Costa reported that Ms. Silva provided the committee with a system generated Income Statement for the period ending December 31, 2015. A copy of the report, including a system generate project activity report, was provided in the Board packet and will be attached to the original meeting minutes.

For information only; no action requested.

Other Finance Matters (W or R)
Director Costa reported that Ms. Silva contacted US Bank, as requested by President Tobin, and was informed that two authorized signers on the District bank accounts could withdraw money at a branch location.

For more *Other Finance Matters*, please refer to the committee meeting minutes.

For information only; no action requested.

V. INFORMATION AND ACTION ITEMS

1. GENERAL MANAGER'S REPORT

1.1 Water Supply Update

Ms. Lorance reported that Folsom Reservoir is at approximately 699,565 acre feet, which is above 100% of average for this time of year. She conducted a brief presentation and a copy of the presentation will be attached to the meeting minutes.

Ms. Lorance reported that the level of Folsom Reservoir is above the flood control level which is why the Bureau has been increasing releases. She explained that releases have transitioned from 3F releases to flood control releases (215 water).

Ms. Lorance reported that another storm system is anticipated over the weekend. The U.S. Seasonal Drought Outlook shows the drought improving in our region. She informed the Board that the current conservation requirement is 33%; however, she will be pushing for that to be removed. In addition, she will be requesting that the Board remove the drought surcharge once the conservation stage is reduced.

Ms. Lorance reported that she received a letter from the Bureau informing the District that they would not be giving the District its allocation of CVP water in March. She explained that the District is not taking CVP water at this time anyway, so there is no impact to the District. She informed the Board that reservoirs in the south are much lower than the northern reservoirs so it is not expected that the Governor will remove the drought emergency declaration.

Ms. Lorance reviewed a draft proposal to the State Board regarding the mandatory conservation requirements and requesting that the State Board remove the mandatory conservation requirements for the American River Basin to allow agencies to use their available water supply.

For information, no action requested

1.2 SSWD Phase 2B Study

Ms. Lorance informed the Board that Sacramento Suburban Water District provided a letter to the District which stated that SSWD will not be proceeding with the Phase 2B study. However, Ms. Lorance was informed that this topic may be placed back on their agenda for re-consideration.

For information, no action requested

1.3 Report Back Item

1.3.1 Conserved Water and GW Substitution Transfers Update

Ms. Lorance conducted a presentation on the water transfers. A copy of the presentation will be attached to the meeting minutes. She reviewed the 2016 export constraints and explained that when pumping in the Delta is restricted, a water transfer will be difficult to complete since there may not be capacity to push water through.

Ms. Lorance informed the Board that two potential water transfers are being looked at for this summer – one conserved water transfer and one groundwater substitution transfer. She explained that the groundwater substitution transfer will be easier to accomplish. She reviewed a list of required actions that need to be completed for a groundwater substitution transfer. Mr. Horowitz commented that SSWD has completed this process and there is an established template that the District could use.

Ms. Lorance reported that a one-year conserved water transfer is being investigated for this year and a long-term conserved water transfer is also being looked at. She informed the Board that Santa Clara Valley Water District is working on pulling data together for a one-year transfer. Ms. Lorance reviewed the next steps for each potential transfer. The Board discussed the transfers including a long term transfer, CEQA limitations, and timeline. Mr. Horowitz will provide the Board with a matrix on CEQA requirements for the various water supplies that the District might transfer.

For information, no action requested

1.3.2 Groundwater Reimbursement

Ms. Lorance reported on this topic under *Committee Reports*.

1.4 Miscellaneous District Issues and Correspondence

Ms. Lorance informed the Board that she provided a copy of the PCWA Special Edition newsletter in the Board packet as it was an excellent public information piece.

Ms. Lorance reported that the Water Forum earned the Governor's Environmental and Economic Leadership award. In addition, she informed the Board that she will be meeting with Pam Hurt Hobday who will probably facilitate the Strategic Planning Workshop.

For information, no action requested

2. ASSISTANT GENERAL MANAGER'S REPORT

2.1 Joint District/Fire Department Emergency Response Table Top

Mr. Durkin informed the Board that a joint table top exercise with the District and local fire departments occurred the week of February 22nd. He provided the Board with a written staff report from Mr. Tony Barela. A copy of the report will be attached to the meeting minutes.

Mr. Durkin reported that, in the case of a chlorine leak incident, South Placer Fire District is designated the first responder as they have the closest emergency personnel to the facility; Roseville Fire Department's HazMat Team will provide specialized support, personnel and equipment during an incident. In addition, all emergency personnel will work directly with Treatment operations personnel during any response.

Mr. Barela informed the Board that the exercise was conducted over three days in order to accommodate the three fire department shifts. He reported that the training was well conducted and a great learning experience for the District.

For information, no action requested

2.2 Report Back Items

There were no items discussed.

2.3 Miscellaneous District Issues and Correspondence

There were no items discussed.

3. DIRECTOR OF FINANCE'S REPORT

3.1. Report Back Items

Ms. Silva reported that FY 2014-15 accounting work will be completed by March 11th. Ms. Silva reported that the balance sheets for wholesale and retail were separated as of the end of FY2014-15. She informed the Board that all bank accounts, except payroll, are reconciled through January 2016. In addition, final adjusted numbers will be provided to the auditors on March 11th. She anticipates the completed CAFR and financial report in April. The Board would prefer that the auditors conduct the audit presentation to the Board.

For information, no action requested

3.2. Quarterly Financial Report – Quarter Ending December 2015

Ms. Silva reported that a system generated Income Statement for the period ending December 31, 2015, was provided in the Board packet. She explained that there was a lot of detail in the report and as discussed with the Finance Committee she will be revising the format in order to provide the Board with a more useful report.

Ms. Silva reported that as of December 31, 2015, SJWD Wholesale is on track with the budget revenue and expenses. She reported that SJWD Retail revenue is low at 41.6% while expenses are at 49% of the budget. She explained that in January property tax revenue was received which will bring up the revenue percentages. She informed the Board that once the mid-year budget review is completed, then she will provide more information.

For information, no action requested

3.3. Miscellaneous District Issues and Correspondence
There were no items discussed.

4. LEGAL COUNSEL'S REPORT

4.1 Legal Matters
Mr. Horowitz reported that the State Board's proceedings regarding the changes to Reclamation and DWR's water rights for the twin tunnels project has been pushed back to May 5, 2016. He explained that this is the first phase of the hearing and the second phase will deal with environmental issues in 2017.

5. DIRECTORS' REPORTS

5.1 SGA
No report.

5.2 RWA
President Tobin reported that RWA meets March 10, 2016.

5.3 ACWA

5.3.1 Local/Federal Government/Region 4 - Pam Tobin
No report.

5.3.2 Energy Committee - Ted Costa
Director Costa reported that the Energy Committee meets next week.

5.3.3 JPIA - Bob Walters
No report.

5.4 CVP Water Users Association
No report.

5.5 Other Reports and Comments
Director Walters reported that he attended the RWA Lobbyist Subscription Program meeting where they discussed a proposed initiative regarding moving the high speed rail money to water issues. Mr. Horowitz commented that the initiative includes reordering water right priorities, which is a significant problem.

5.5.1 Sacramento Suburban Water District Meeting – Ted Costa
Ms. Lorance reported that Director Costa attended the February SSWD meeting and requested that one of their board packet items be distributed to the Board members. The item was included in the Board packet.

VI. UPCOMING EVENTS

1. 2016 Water Education Foundation – Executive Briefing
   March 17, 2016
   Sacramento, CA
2. 2016 Cap To Cap – Metro Chamber
   April 9-13, 2016
   Washington DC

President Tobin reported that there would be no Closed Session

VII. CLOSED SESSION

1. Conference with legal counsel--anticipated litigation; Government Code sections 54954.5(c) and 54956.9(b); significant exposure to litigation involving state and federal administrative proceedings and programs affecting District water rights
2. Conference with real property negotiators involving the transfer of water conserved under the District's pre-1914 water right and by groundwater substitution. The Board will provide direction to District negotiators, General Manager Shauna Lorance and Assistant General Manager Keith Durkin, on the price, terms of payment or both for the transferred water. The specific buyers and their representatives with whom the District will negotiate have not yet been identified, but those buyers and representatives will be publicly identified at the Board meeting or as soon thereafter as possible. (See Government Code sections 54954.5(b) and 54956.8.)

VIII. OPEN SESSION

There was no closed session.

IX. ADJOURN

The meeting was adjourned at 10:05 p.m.

PAMELA TOBIN, President
Board of Directors
San Juan Water District

ATTEST:

TERI GRANT, Board Secretary

Water Management and Reliability Study Update – MWH

- **Technical Memorandum 1**
- **Technical Memorandum 2**
- **Technical Memorandum 3**

Technical Memorandum 1: Purpose, Goals, and Objectives

Wholesale Water Management and Reliability Study

PREPARED FOR

SAN JUAN WATER DISTRICT

PREPARED BY

MWH

BUILDING A BETTER WORLD

18 February 2016

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INTRODUCTION

This Technical Memorandum (TM) is the first of a series of memoranda that will look to improve management of surface water and groundwater resources within the San Juan Water District's (District) wholesale service area, and potentially outside the District's current service area. This TM reflects input of District staff, the District Water Supply and Reliability Committee, and comments from stakeholders and interested members of the public during the Kickoff meeting for the District's Wholesale Water Management and Reliability Study (Study) on February 2, 2016. This TM sets the direction for the broader Study process by defining the purpose, goals, objectives, and planning constraints as follows:

- The purpose creates the conceptual planning framework for the Study to follow.
- The goal represents the desired "end state" of activities, and supports the defined study purpose. The Study goal is the foundation of the entire planning process.
- Objectives provide additional details on how the District's Study goal will be achieved and serve as a means of measuring success in achieving the goal.
- Planning constraints provide guidance on how the Study will be developed and evaluation conducted. It is important that these are consistent with the goals and objectives of the Study, as well as with good planning principles.

The TM also describes the process and schedule, and roles and responsibilities for conducting the Study.

STUDY PURPOSE, GOALS, & OBJECTIVES

This section describes the District's Study purpose, goals, and objectives.

Purpose

The purpose of the Study is to develop a short, prioritized list of water management options to improve water supply reliability, and a scope for the next phase of work (a more detailed feasibility study).

Study Goal

The Study goal is to improve management of surface water and groundwater resources within the District's wholesale service area, and potentially outside the District's current service area, through collaboration, consolidations, or other actions improve its water supply reliability.

Objectives

The three objectives of this Study are as follows:

1. Increase water supply reliability to the District's retail customers and Wholesale Customer Agencies during dry years by integrating surface water and groundwater storage.

2. Perfect the beneficial use of the District's water rights, contractual entitlements, and facilities.

3. Provide long-term financial benefits to our ratepayers, and provide regional and statewide benefits.

PLANNING CONSTRAINTS

The following planning constraints provide guidance on how the Study will be developed and evaluations conducted. Planning constraints are necessary to aid in development and efficient screening of proposed water management options:

- Consider the full range of options within district maximum allowable authority.
- Maintain and improve current water supply reliability to Wholesale Customer Agencies.
- Maintain consistency with new and emerging regulations, such as the Sustainable Groundwater Management Act.
- Maximize potential financial assistance for implementation.

STUDY PROCESS & SCHEDULE

Study process and schedule is illustrated in Figure 1. The Study process reflects a streamlined approach, where incremental findings from discrete tasks are documented in TMs. Development of Study goal, objectives, and planning constraints is followed by these activities:

- Collection and review of existing information
- Development of screening criteria and metrics
- Identification, preliminary evaluation, and screening of water management options
- Refined evaluation, and prioritization of selected water management options
- Development of detailed scope for next phase of Study

- Development of recommendations and Study Final Report

Figure 1 also highlights the various Study meetings with District staff, the District Water Supply and Reliability Committee, the District Board, the Wholesale Customer Agencies, and the District Board and Wholesale Customer Agency Boards.

STUDY ROLES AND RESPONSIBILITIES

Table 1 is the RACI responsibility matrix for the Study. The matrix defines the multiple roles and responsibilities for the various parties involved in developing and conducting the Study. It also helps to track accountability, and improves the value of Study meetings. RACI stands for **R**esponsible, **A**ccountable, **C**onsulted, and **I**nformed:

- **A**ccountability describes where the buck stops, who is held accountable
- **R**esponsibility describes where the work is done, who is responsible for carrying out a task
- **C**onsulted are the critical people who need to contribute prior to completing the activity
- **I**nformed indicates that it is less critical for this person to be involved but they need to be updated and informed about the outcome of the activity

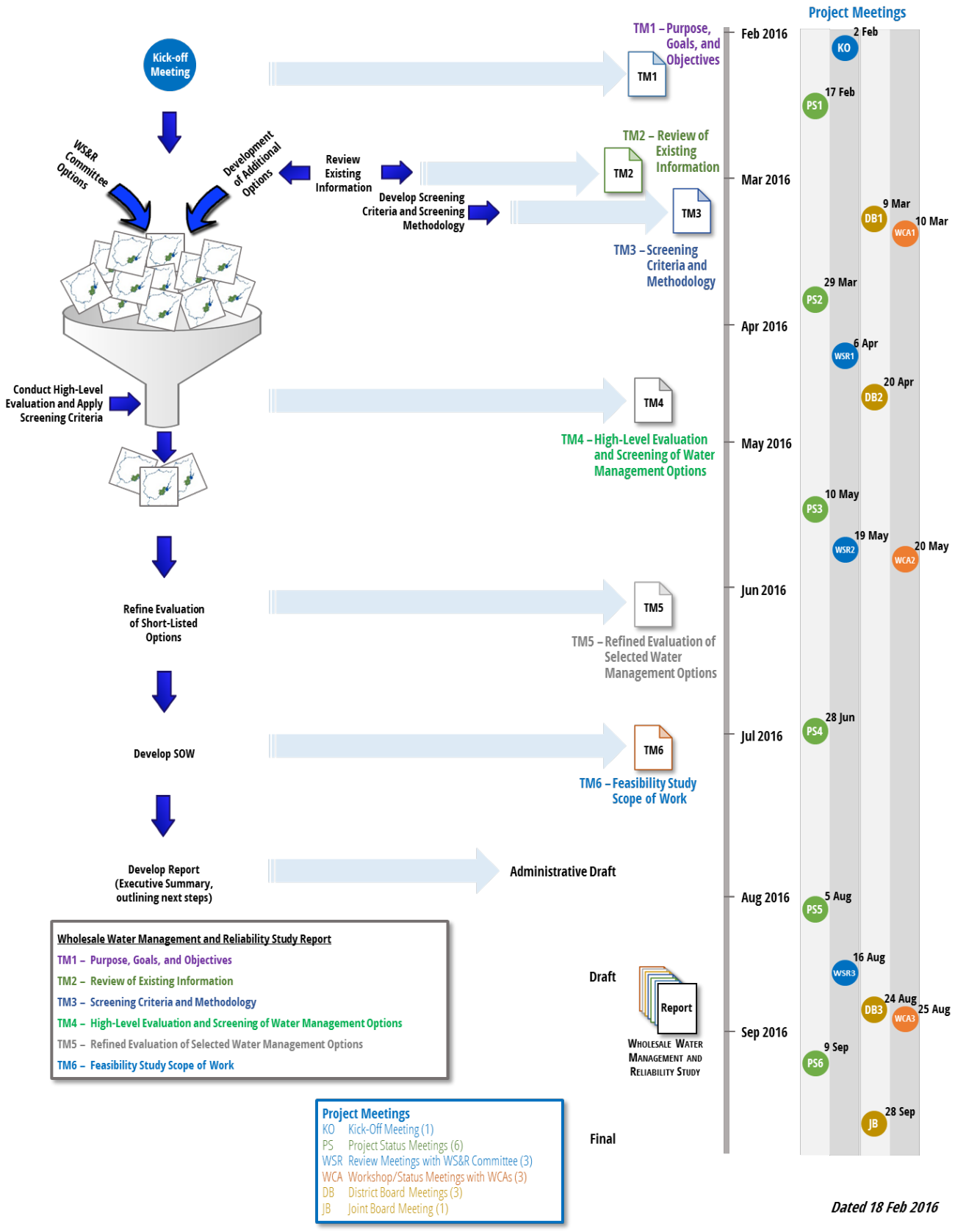

Figure 1. Process to Develop the Wholesale Water Supply Reliability Study

Table 1. Wholesale Water Management and Reliability Study Roles and Responsibilities

	Responsible	Accountable	Consulted	Informed	
GROUP	**R**	**A**	**C**	**I**	**ANTICIPATED ACTIVITIES**
District Staff	☑	☑			* Review Study progress (technical, schedule, budget, etc.) * Address review comments * Resolve issues * Prepare for upcoming meetings * Provide direction to Consultant
Water Supply & Reliability Committee			☑		* Review Study progress * Provide input (review comments, study direction, etc.) * Participate in Study exercises * Preview upcoming activities
District Board		☑		☑	* Become informed on Study progress * Provide input (review comments, study direction, larger policy issues, etc.) * Preview upcoming activities * Receive Final Report * Act on next steps/recommendations
Wholesale Customer Agencies				☑	* Become informed on Study progress * Provide input (review comments, etc.) * Preview upcoming activities
MWH Team	☑	☑			* Conduct Study based scope of work and on direction provided by District staff * Develop meeting materials and conduct meetings * Present issues to be resolved to District staff as well as items requiring input from Water Supply & Reliability Committee and/or District Board * Adhere to schedule and budget

Key:
R = Responsibility describes where the work is done, who is responsible for carrying out a task.
A = Accountability describes where the buck stops, who is held accountable.
C = Consulted are the critical people who need to contribute prior to completing the activity.
I = Informed indicates that it is less critical for this person to be involved but they need to be updated and informed about the outcome of the activity.

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Technical Memorandum 2: Review of Existing Information

Wholesale Water Management and Reliability Study

PREPARED FOR

SAN JUAN WATER DISTRICT

SAN JUAN WATER
SINCE 1854

PREPARED BY

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3 March 2016

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List of Abbreviations and Acronyms

AB	Assembly Bill
AF	acre-feet
ASR	aquifer storage and recovery
District or SJWD	San Juan Water District
DWR	California Department of Water Resources
GIS	geographic information system
GW	groundwater
option	water management option
PCWA	Placer County Water Agency
PPIC	Public Policy Institute of California
Roseville	City of Roseville
RWA	Regional Water Authority
SGA	Sacramento Groundwater Authority
SMUD	Sacramento Municipal Utility District
SSWD	Sacramento Suburban Water District
Study	Wholesale Water Management and Reliability Study
TBD	to be determined
TM	technical memorandum
WCA	Wholesale Customer Agency
WTP	water treatment plant

1.0 Introduction

This Technical Memorandum (TM) is the second of a series of memoranda that will support improving management of surface water and groundwater resources within the San Juan Water District's (District or SJWD) wholesale service area, and potentially outside the District's current service area. It summarizes the compilation and review of existing information required for completing District's Wholesale Water Management and Reliability Study (Study).

The purposes of this TM are (1) to identify the data and information that will be needed to support evaluation, comparison, and prioritization of both the initial set of water management options (options) and the retained options, and (2) to assess the data and information that are readily available. This TM contains the following:

- Descriptions of the categories of data and information needed to support the Study
- Overview of the status and high-level assessment of the existing data and information
- Recommendations and next steps

As presented, TM 2 provides a list of the information identified, currently available, and retrieved at this point in the Study. Additional information needs may be identified throughout the course of the Study as potential options are analyzed. This list of information and data sources will be updated throughout the Study as necessary.

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2.0 Data and Information Categories

The purpose of this data review effort is to survey and collect available information to support evaluation of options to address the Study objectives. Key to these evaluations are the definition of existing and no action conditions, i.e., status quo option. The no action helps defines the scope of the problems to be addressed, and the related areas that could be influenced by possible actions taken to address the identified problems. It also provides the baseline against which to measure the performance of other considered options. In addition to defining the existing and no action conditions, the data identified in this TM will be used for formulation and screening of water management options, and to assess which options best address the evaluation criteria and metrics (documented in TM 3). These evaluations will be documented in TM 4.

The categories of data and information that will be needed to support the Study evaluations include the following:

- **Water Rights and Contracts –** Includes details on the District's various surface water rights and contractual water entitlements. Also included are agreements which affect the District's water supply and water system, such as the Water Forum Agreement, City of Roseville agreement, and water diversion, treatment and conveyance agreement with Sacramento Suburban Water District, and agreements with the Wholesale Customer Agencies.

- **Surface Water Supplies –** Includes data on the District's historical and projected surface water supplies and deliveries. Annual data of the District's past surface water use, including deliveries to its wholesale and retail customers and others is included.

- **Groundwater Basin Conditions –** Includes information on groundwater basin conditions, including, but not limited to the following: historical and future availability, past groundwater use, groundwater levels, groundwater quality, aquifer characteristics, well logs, groundwater storage, groundwater contours, and location of major groundwater contamination plumes.

- **Recycled Water –** Includes information on the potential for using recycled water within the District. To date, the District does not use recycled water as a supply.

- **Water Conservation Measures –** Includes water conservation measures that are either already implemented or could be implemented to improve supply reliability during dry years.

- **Existing Infrastructure –** Includes details of the District's existing surface water and groundwater infrastructure. Information includes sizes, capacities, and geographic information system (GIS) locations of relevant infrastructure such as the Peterson water treatment plant, tanks, pipelines, wells, and interties with other agencies. This

information provides an understanding of the existing conditions and a starting point for integrating potential options.

- **Water Demands –** Includes information of the District and potential regional partners related to both present and future demands, such as land use and future population growth.

- **General District Information –** Includes general information on the District such as sphere of influence and past budgets. This information could be used to confirm the viability of potential options.

- **Potential Water Management Options –** Provides information on specific options to be considered as part of the Study. This information is mainly provided on a general level and is not specific to the District; the ideas presented in these documents may be adapted to form various options.

3.0 Data and Information Index List

This section presents the status and high-level assessment of the existing data and information needed to support the Study. For each item, the database includes the category; title/subject; file format; author; source; dates requested and obtained (as applicable); brief description of its relevancy to the Study; and applicability to specific options.

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Table 3-1. Existing Data and Information

ID	Title/Subject	Category	Data Type	Author (Date)	Source of Information	Date Requested	Date Received	Brief Description (Relevancy to Study)	Related Water Management Option ID(s)
1	Analysis of Water Rights and Contractual Entitlements of San Juan Water District	Water Rights and Contracts	PDF	Bartkiewicz, Kronick & Shanahan (2008)	http://www.sjwd.org	n/a	n/a	Legal review of SJWD's water rights and contracts - volume, source, and terms of use	TBD
2	Hydrogeologic Investigation - Potential for Groundwater Supply	Groundwater Basin Conditions, Existing Infrastructure	PDF, maps, well logs	GEI (2008)	http://www.sjwd.org	n/a	n/a	Summary of field work to assess if groundwater is viable within SJWD's boundary to support a municipal supply well. Determined GW well was possible. Looked groundwater levels, groundwater quality, aquifer characteristics. Provided preliminary well design & cost. PDF maps and well logs.	TBD
3	Sacramento Suburban Water District and San Juan Water District High-Level Feasibility Analysis for Water Supply Reliability	Surface Water Supplies, Potential Water Management Options	PDF	Municipal Consulting Group (2014)	http://www.sjwd.org	n/a	n/a	Investigated opportunities to maximize reliability of SSWD and SJWD's water supplies, including collaborative water management opportunities (no change, inter-agency agreements, consolidation).	TBD
4	Sacramento River Regional Water Reliability Project, Planning Phase I	Surface Water Supplies, Potential Water Management Options	PDF	West Yost (2015)	http://www.sjwd.org	n/a	n/a	Multi-agency project to provide additional flexibility in dry years to SJWD (supply reliability & diversity; operational flexibility). Project will divert water through existing intakes from the Sacramento River to offset water currently diverted from the American River.	TBD
5	Wholesale Master Plan Phase II	Surface Water Supplies, Existing Infrastructure	PDF, tables, graphs	Black & Veatch (2007)	http://www.sjwd.org	n/a	n/a	Assess SJWD's storage and transmission and develop a water supply plan: demands/level of service; plan for normal operations, plan for reduced surface water operations, and cost for additional required facilities.	TBD
6	2010 Urban Water Management Plan	Water Demands, Existing Infrastructure, Surface Water Supplies	PDF, tables	SJWD (2011)	http://www.sjwd.org	n/a	n/a	Plan describes facilities, demands, supplies, reliability, shortage contingency planning, and demand management measures.	TBD
7	Final Municipal Service Review and Sphere of Influence Update for San Juan Water District (LAFC 16-10)	General District Information	PDF, tables	n/a (2011)	http://www.sjwd.org	n/a	n/a	Formal letter of concurrence on SJWD's sphere of influence and growth. Includes tables of facilities and finances.	TBD
8	Fiscal Year 2015-2016 Budget	General District Information	PDF, tables	n/a (2015)	http://www.sjwd.org	n/a	n/a	Tables showing annual budgets for past several years	TBD
9	Member Agency Water Infrastructure Maps	Existing Infrastructure	PDF, GIS Files	West Yost (2014-2015)	RWA	n/a	n/a	Surface Water Diversion, storage and delivery information	TBD
10	Groundwater Management Plan, Sacramento County - North American	Groundwater Basin Conditions, Existing Infrastructure	PDF	SGA (2014)	http://www.sgah2o.org/sga/files/GMP_SGA_2014_Final.pdf	n/a	n/a	Recharge areas, groundwater storage, available storage, management levels.	TBD
11	Basin Management Report Update 2013	Groundwater Basin Conditions	Excel files Groundwater Production, Figures	SGA (2013)	http://www.sgah2o.org/sga/files/pub-bmreport-2013.pdf	n/a	n/a	Annual groundwater use by agency, location of major groundwater contamination plumes.	TBD

ID	Title/Subject	Category	Data Type	Author (Date)	Source of Information	Date Requested	Date Received	Brief Description (Relevancy to Study)	Related Water Management Option ID(s)
12	Western Placer County Groundwater Management Plan	Groundwater Basin Conditions		MWH (2007)	https://www.pcwa.net/files/docs/enviro/WPCGMP_Groundwater_Managerment_Plan_07.pdf	n/a	n/a	Historic comparison of Groundwater Contours	TBD
13	Western Placer County Biennial State of Basin Report 2011 through 2012	Groundwater Basin Conditions	PDF and electronic files	GEI (2013)	GEI, files	n/a	n/a	Annual groundwater use by agency, groundwater recharge (ASR), location of major groundwater contamination plumes.	TBD
14	AB 32 Water-Energy Assessment, SMUD and RWA	Groundwater Basin Conditions, Existing Infrastructure	PDF and electronic files	GEI (2014)	GEI, files	n/a	n/a	Summary of Agency Facilities, number of wells, Groundwater/surface water use by agency.	TBD
15	Data Management System, SGA	Existing Infrastructure	Electronic files	GEI (2015)	GEI, files	n/a	n/a	Location of Municipal Water Supply wells, pumping capacity of wells to estimate ASR potential, well locations relative to SJWD main transmission pipeline	TBD
16	Western Placer County Groundwater Recharge Mapping and Water Quality Protection Program, Monitoring Well Construction and Testing Report	Groundwater Basin Conditions	PDF	GEI (2015)	GEI, files	n/a	n/a	Groundwater surface water interaction, potential spreading basin recharge area.	TBD
17	California's Groundwater Bulletin 118 Update 2003 Report.	Groundwater Basin Conditions	PDF	DWR (2006)	http://www.water.ca.gov/groundwater/bulletin118/index.cfm	n/a	n/a	North American River Subbasin general information.	TBD
18	Groundwater Information Center Interactive Map Application	Groundwater Basin Conditions	Electronic files	DWR (2015)	https://gis.water.ca.gov/app/gicima/	n/a	n/a	Groundwater contours Fall 2015, North American Groundwater Subbasin, and change in storage.	TBD
19	Western Placer County Groundwater Storage Study	Groundwater Basin Conditions	PDF	MWH (October 2005)	MWH and GEI files	n/a	n/a	Potential for groundwater recharge along major creeks, Placer County.	TBD
20	South Sutter Water District Water Management Plan	Groundwater Basin Conditions	PDF	MBK (2003)	http://www.water.ca.gov/wateuseefficiency/sb7/docs/2014/plans/FINAL%20SSWD%20WMP%2011%2025%2003.pdf	n/a	n/a	Annual groundwater and surface water use, potential for in-lieu water use.	TBD
21	South Sutter Water District Groundwater Management Plan	Groundwater Basin Conditions	PDF	Luhdorff and Scalmanini Consulting Engineers, Inc., October 2009	GEI, files	n/a	n/a	Annual groundwater and surface water use, potential for in-lieu water use.	TBD
22	Groundwater Injection Feasibility Study	Groundwater Basin Conditions	Hard Copy	Luhdorff and Scalmanini Consulting Engineers, Inc., June 1998	GEI, files	n/a	n/a	Reference source for ASR suitability.	TBD

ID	Title/Subject	Category	Data Type	Author (Date)	Source of Information	Date Requested	Date Received	Brief Description (Relevancy to Study)	Related Water Management Option ID(s)
23	Iowa Hill Pump Back Storage Project Description	Potential Water Management Options	PDF	SMUD	https://www.smud.org/en/about-smud/environment/renewable-energy/hydropower/iowa-hill/	n/a	n/a	Potential reservoir construction, option to contribute to construction to obtain storage. Project no longer being considered by SMUD.	TBD
24	The State of the Sierra Nevada's Forest	Potential Water Management Options	PDF	Sierra Nevada Conservancy	http://sierranevada.ca.gov/our-work/state-of-the-sierra	n/a	n/a	Potential supply reliability augmentation option via watershed management.	TBD
25	Soil Suitability Index Identifies Potential Areas for Groundwater Banking on Agricultural Lands	Groundwater Basin Conditions	website	California Agriculture	http://californiaagriculture.ucanr.edu/landingpage.cfm?article=ca.v069n02p75&fulltext=yes	n/a	n/a	Identifies recharge potential throughout California.	TBD
26	Details of SJWD Peterson treatment plant (e.g., historical use data, water quality data)	Existing Infrastructure	excel	SJWD (2015)	Flow Summary Report from 1979 to present	2/16/2016	2/22/2016		TBD
27	Historical water data (monthly, annual) of: - water demands (by individual wholesale, retail, etc. customers) - water deliveries by customer - supplies by contract - transfers	Surface Water Supplies	excel	SJWD (2015)	Flow Summary Report from 1979 to present	2/16/2016	2/22/2016	- table includes water deliveries by SJWD (WTP production) and demands by WCAs (WTP + groundwater) - SJWD provides small amount of raw water by contract to Granite Bay Golf Course. See table. -no transfers	TBD
28	Rates ($/AF) for: - water deliveries (wholesale, retail, other) - supplies by contract - transfers	General District Information	excel	SJWD (2014)	Wholesale Financial Plan and Water Rate Study	2/16/2016	2/22/2016	Summary of rates on page 23	TBD
29	Wholesale Water Supply Agreements with Fair Oaks Water District, City of Folsom, Orange Vale Water Company, and Citrus Heights Water District	Water Rights and Contracts	PDF	SJWD (varies)	Agreements with Wholesale Customers	2/16/2016	2/22/2016	Details wholesale agreement between SJWD and its wholesale customers	TBD
30	Allocating California's Water: Directions for Reform	Potential Water Management Options	PDF	PPIC (2015)	online	n/a	n/a	Provides statewide view on potential directions for reform	TBD
31	Water Forum Agreement	Water Rights and Contracts	PDF	(2000)	online	n/a	n/a	Details the District's Water Forum Agreement	TBD
32	GIS files for PCWA (locations and capacities): -PCWA canal system -Infrastructure -Water treatment plant locations -Transmission pipelines.	Existing Infrastructure	GIS files	PCWA	SJWD	2/16/2016			TBD

ID	Title/Subject	Category	Data Type	Author (Date)	Source of Information	Date Requested	Date Received	Brief Description (Relevancy to Study)	Related Water Management Option ID(s)
33	SJWD facilities (location and capacities): -pipelines -connections to other districts (PCWA, Roseville) -Storage tanks -Pumps -Location of cathodic wells for SJWD main transmission pipeline, available locations to construct wells, potential to construct wells.	Existing Infrastructure	AutoCAD files	SJWD	SJWD	2/16/2016	Preliminary information 3/1/2016	Locations and sizes (and some capacities where available) for the District's surface water and groundwater infrastructure including transmission pipelines (16-n and larger), interties/connections to other districts, storage tanks and reservoirs, pump stations, and production wells.	TBD

Key:

AB = Assembly Bill
AF = acre-feet
ASR = aquifer storage and recovery
DWR = California Department of Water Resources
GW = groundwater
PCWA = Placer County Water Agency
PPIC = Public Policy Institute of California
Roseville = City of Roseville
RWA = Regional Water Authority
SGA = Sacramento Groundwater Authority
SJWD = San Juan Water District
SMUD = Sacramento Municipal Utility District
SSWD = Sacramento Suburban Water District
TBD = to be determined
WCA = Wholesale Customer Agency
WTP = water treatment plant

4.0 Conclusions and Next Steps

Through this initial data review process, over 30 sources of information were obtained or requested to support the Study. The information ranged from legal agreements/contracts, planning documents, and reports to raw data and AutoCAD/GIS shapefiles.

As mentioned above, additional information needs may be identified throughout the course of this Study as the various options are developed and analyzed. Information not readily available on the Internet will be requested from the District. If the District cannot obtain the requested information or the data/information is of unacceptable quality, specific options will be analyzed using broad assumptions, if applicable or dropped from consideration.

Next steps include continuing to analyze the information obtained to date and develop a comprehensive list of potential options using this information.

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Technical Memorandum 3: Screening Criteria and Methodology

Wholesale Water Management and Reliability Study

PREPARED FOR

SAN JUAN WATER DISTRICT

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SINCE 1854

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3 March 2016

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List of Abbreviations and Acronyms

District	San Juan Water District
option	water management option
Reclamation	U.S. Department of the Interior, Bureau of Reclamation
Section 7 consultation	Section 7 of the federal Endangered Species Act, requiring consultation with U.S. Fish and Wildlife Service when an action may affect a listed endangered or threatened species
Study	Wholesale Water Management and Reliability Study
SSWD	Sacramento Suburban Water District
TM	technical memorandum

1.0 Introduction and Background

This Technical Memorandum (TM) is the third of a series of memoranda that will look to improve management of surface water and groundwater resources within the San Juan Water District's (District) wholesale service area, and potentially outside the District's current service area. It presents the criteria, methods, and approach developed to help complete the District's Wholesale Water Management and Reliability Study (Study). This TM contains the following:

- Description of the evaluation criteria and metrics developed to support evaluation, comparison, and prioritization of identified water management options (option).
- Overview of the approach for screening the initial options using the developed evaluation criteria and metrics to identify which options should be retained for further evaluation.
- Overview of the approach for prioritizing the retained options using the results of a more detailed evaluation of each retained option and applying the same evaluation criteria and metrics to provide a consistent framework for evaluation, comparison, and prioritization of the options.

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2.0 Evaluation Criteria and Metrics

To support evaluation, comparison, and prioritization of identified options, the following four evaluation criteria and associated metrics will be used:

1. Cost-effectiveness
2. Contribution to objectives
3. Implementation complexity
4. Uncertainty

These criteria were vetted with the District's Water Supply and Reliability Committee during the Study kickoff meeting. This section describes each of the evaluation criteria and associated metrics. For each metric within a criterion, a score between 1 and 3 will be assigned for each evaluated option. The water drop symbol, ♦, represents the score each option will receive, based on the initial evaluation to be conducted:

- ♦ represents a score of 1
- ♦♦ represents a score of 2
- ♦♦♦ represents a score of 3

The higher the score, the more likely an option will be prioritized higher.

2.1 Cost-Effectiveness

This criterion quantitatively measures the cost-effectiveness of an option's water supply benefits (yield) relative to its costs at a conceptual or pre-appraisal level. Cost-effectiveness is summarized by one metric:

- $ per acre-foot: Annualized total cost of the option divided by yield.

To develop the scores for the quantitative metrics, the values will be normalized to a standard range (1 to 3). The option with the highest value (i.e., lowest cost per acre-foot) will receive a score of 3, while the option with the lowest value (i.e., highest cost per acre-foot) will receive a score of 1. All other options will be assigned scores based on a linear relationship between 1 and 3.

2.2 Contribution to Objectives

This criterion quantitatively and qualitatively assesses an option's contribution to each of the Study objectives. Each objective is measured through separate metric(s) and will be scored as follows:

- Increase water supply reliability to the District's retail customers and Wholesale Customer Agencies by integrating surface water and groundwater storage:
    - Increase reliability during dry years (acre-foot/year): Average annual acre-foot increase in dry year supply from implementing the option. To develop the scores for this quantitative metric, the values will be normalized to a standard range (1 to 3).
    - Mitigate extreme drought conditions (rated high, moderate, or low): The potential to improve the District's ability to receive water supplies during an extreme drought when there is very limited access to the District's current water rights and contract entitlements will be assessed qualitatively.
- Perfect the beneficial use of the District's water rights, contractual entitlements, and facilities (percent): Percent increase in average annual use of the District's water supply and treatment capacity as compared to the District's current average annual use. To develop the scores for this quantitative metric, the values will be normalized to a standard range (1 to 3).
- Provide long-term financial benefits to District ratepayers, and provide regional and statewide benefits (rated high, moderate, or low):
    - High – Likely to able to implement new water transfers.
    - Moderate – Likely to only have a limited ability to perform new water transfers.
    - Low – Not likely to include new water transfers.

2.3 Implementation Complexity

This criterion qualitatively assesses how likely an option will be implemented within a reasonable timeframe to achieve its potential benefits relative to the following seven implementation factors or metrics (rated high, moderate, or low):

- Environmental compliance requirements
    - Low 💧💧💧 – Categorical Exclusion/Exemption will likely be needed
    - Moderate 💧💧 – Environmental Assessment, Mitigated Negative Declaration, or Negative Declaration will likely be needed
    - High 💧 – Environmental Impact Statement or Environmental Impact Report will likely be needed
- Permitting requirements and approvals
    - Low 💧💧💧 –Jurisdictional Waters/Wetlands not likely to be affected
    - Moderate 💧💧 – Nationwide/general permits and information; Section 7 consultation[1] will likely be needed
    - High 💧 – Individual permit(s) and formal Section 7 consultation will likely be needed
- Water rights and contracts requirements
    - Low 💧💧💧 – Likely no changes will be needed
    - Moderate 💧💧 – Change to point of diversion or place of use will likely be needed
    - High 💧 – New water right or contract will likely be needed
- Institutional arrangements and coordination
    - Low 💧💧💧 – No partnerships will be needed
    - Moderate 💧💧 – Partnerships will be needed, but will likely be similar to existing arrangements
    - High 💧 – Partnerships will be needed, and will likely require new agreements
- Land acquisitions
    - Low 💧💧💧 – Option will be within the existing right-of-way
    - Moderate 💧💧 – Willing seller has been identified
    - High 💧 – No willing seller has been identified

[1] Section 7 of the federal Endangered Species Act, requiring consultation with U.S. Fish and Wildlife Service when an action may affect a listed endangered or threatened species.

- Public acceptance and support
    - High ♦♦♦ – Public acceptance and wide support
    - Moderate ♦♦ – Some public acceptance and moderate support
    - Low ♦ – Low public acceptance and support
- Schedule
    - Short ♦♦♦ – Option will likely take less than a year to implement
    - Moderate ♦♦ – Option will likely take more than one, but less than three years to implement
    - Long ♦ – Option will likely take more than three years to implement

2.4 Uncertainty

This criterion qualitatively assesses level of confidence in the definition of the option with respect to the following two areas or metrics (rated high, moderate, or low):

- Costs
    - High ♦♦♦ – Plans/studies available to support costs
    - Moderate ♦♦ – Cost information available, but no engineering details to support costs
    - Low ♦ – No plans/studies available; best engineering judgment applied
- Yield and reliability
    - High ♦♦♦ – Confirmed yield and high reliability
    - Moderate ♦♦ – Confirmed yield and moderate reliability
    - Low ♦ – Unconfirmed yield and low/moderate reliability

2.5 Option Evaluation Summary

These evaluation criteria and associated metrics will be used to evaluate each identified option. Figure 2-1 shows a template for the evaluation summaries.

SAN JUAN WATER DISTRICT WATER SUPPLY & RELIABILITY STUDY

Project Evaluation Summary

ID:

Project Name: Type:

Project Description:

METRICS	ASSESSMENT/ VALUE	SCORE	NOTES
Cost-Effectiveness			
Yield - Long-term Average (TAF/year)	1.0	N/A	
Water Supply Source	Pre-1914 and appropriative water right	APPR	
Total Cost ($)	$ -	N/A	
Overall Cost-effectiveness ($/AF) (Total Cost / Yield)	$ -	N/A	*Annualized, 3.5% discount rate over 30 year project life*
Contribution to Objectives			
Improve Dry Year Reliability	Moderate Potential	💧💧	*Average annual acre-foot increase in dry year supply from implementing the option.*
Perfect Beneficial Use	High Potential	💧💧💧	*Percent increase in average annual use of the District's water supply and treatment capacity as compared to the District's current average annual use.*
Provide Financial Benefit	Not likely to include new water transfers and/or high upfront costs.	💧	
Extreme Drought Conditions	Limited Potential to Improve Conditions During an Extreme Drought	💧	*(i.e., very limited access to water rights/contract entitlement supplies)*
Implementation Complexity			
Environmental Compliance Requirements	Complex: Likely EIS/EIR	💧	
Permitting Requirements	Complex: Likely Individual Permit, Formal Section 7 Consultation	💧	
Water Rights / Contracts	Moderate: Likely Change to Point of Diversion/Place of Use	💧💧	
Institutional & Coordination	High: Partnerships Needed, Likely New Agreement	💧	
Land Acquisition	High: No Willing Seller Identified	💧	
Public Acceptance & Support	High: Public Acceptance and Wide Support	💧💧💧	
Schedule	Greater than 3 years to implement	💧	
Uncertainity			
Costs	Moderate: Cost Information, No Engineering Details	💧💧	
Yield & Reliability	Moderate: Confirmed Yield, Moderate Reliability, and/or Agreement is Long-Term	💧💧	

Key: AF = acre-feet, CVP = Central Valley Project, EIS/EIR = Environmental Impact Statement/Environmental Impact Report, N/A = not applicable, PCWA = Placer County Water Agency, ROW = Right-of-Way, TAF = thousand acre-feet

Relative Ranking

References:

Figure 2-1. Template for Water Management Option Summary Evaluation

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3.0 Approach for Screening Initial Water Management Options

To support evaluation, comparison, and prioritization of the initial options, the four criteria and associated metrics described in Section 2 will be evaluated for each option using best available information. Scores for each metric will be developed and used for screening. TM2 will document the data collection and review conducted under Study Task 4. TM 4 will document the preliminary evaluation and screening of options to be conducted under Study Task 5.

3.1 Scoring

For qualitative metrics, scores will be developed based on each option's assigned assessment value (1 to 3).

For quantitative metrics, the scores will be normalized to a standard range (1 to 3) to be consistent with the qualitative scores. The option with the highest metric value will be assigned a value of 3, and the lowest value will be assigned a value of 1. The other options will be assigned a proportional value between 1 and 3.

The developed initial scores will be used to conduct a trade-off analysis to support screening of the options. This analysis will be documented in TM4.

3.2 Trade-off Analysis

The trade-off analysis will investigate how the options rank across two or more criteria. It will allow for identification of options that score best across multiple criteria and those that score well on one metric, but not on others. The following three trade-offs will be used to evaluate the options:

1. **Cost-Effectiveness and Contribution to Objectives Trade-off** – Options will be ranked according to their cost-effectiveness and overall contribution to objectives scores. Options with lower cost per acre-foot and higher overall contribution to objectives scores will rank higher.

2. **Cost-Effectiveness and Implementation Complexity Trade-off** – Options will be ranked according to their cost-effectiveness and implementation complexity scores. Options with lower cost per acre-foot and higher overall implementation factors (easier to implement) scores will rank higher.

3. **Contribution to Objectives and Implementation Complexity Trade-off** – Options will be ranked according to their contribution to objectives and implementation complexity scores. Options with higher overall contribution to objectives and higher overall implementation factors (easier to implement) scores will rank higher.

Figures 3-1 through 3-3 present example charts for these three trade-offs scenarios. Each figure plots the two considered criteria on the y- and x-axes. For example, in Figure 3-1 (cost-effectiveness and contribution to objectives trade-off), the y-axis represents the cost-effectiveness and the x-axis the overall contribution to objectives score. An option plotting in the upper right corner of the figure would be more efficient and contribute better to the objectives; therefore, it would be more desirable than an option represented in the bottom left corner of the figure. Similarly for Figure 3-2 (cost-effectiveness and implementation complexity trade-off), and Figure 3-3 (contribution to objectives and implementation complexity trade-off) the upper right regions represent the more desirable ranges, the lower left regions represent the less desirable ranges.

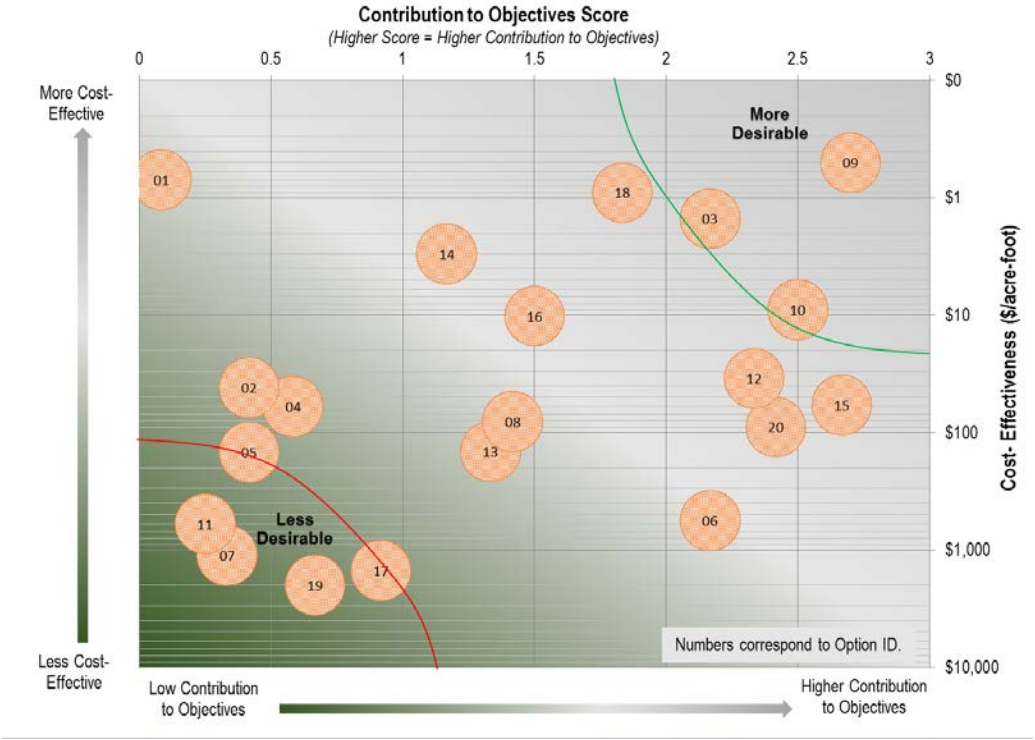


Figure 3-1. Example Cost-Effectiveness and Contribution to Objectives Trade-off Analysis

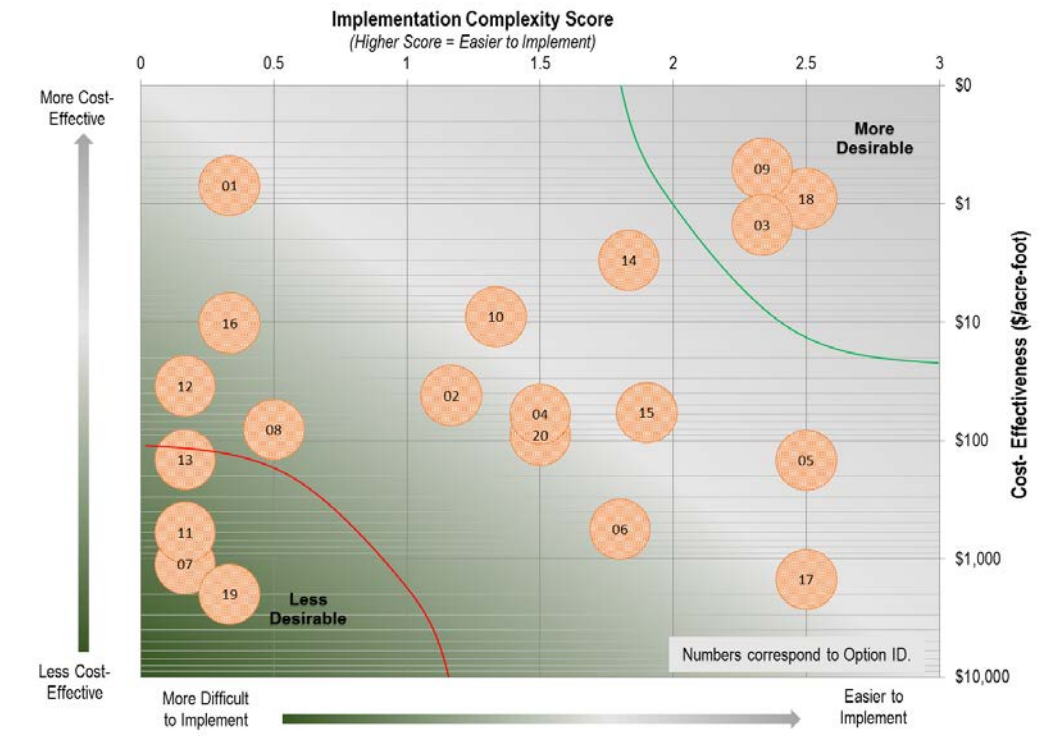


Figure 3-2. Example Cost-Effectiveness and Implementation Complexity Trade-off Analysis

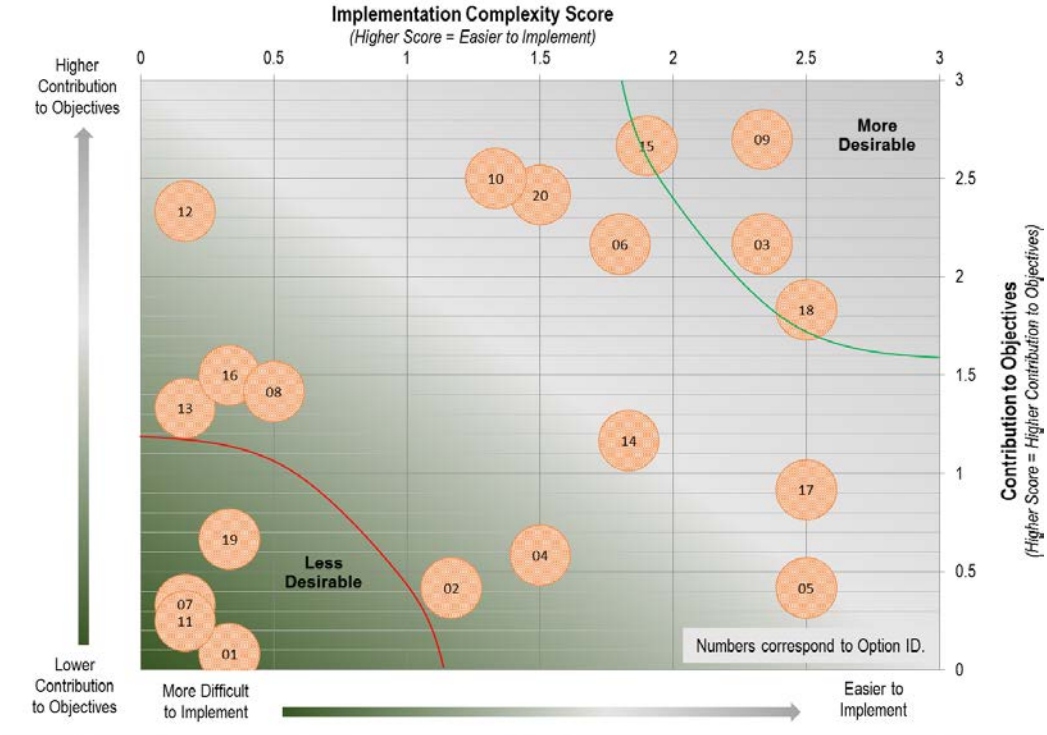


Figure 3-3. Example Contribution to Objectives and Implementation Complexity Trade-off Analysis

3.3 Screening

The findings of the trade-off analysis will be used to identify options that consistently rank in the desirable regions and those that consistently rank in the less desirable regions. This will allow for organizing options into three groups: (1) high potential, (2) moderate potential, and (3) low potential. This approach will provide a means for identifying those options with a greater chance of achieving the District's goals and objectives for this Study in a cost-efficient manner, within a reasonable timeframe, and with higher degree of confidence.

The results of this initial cluster analysis will be discussed with the District's Water Supply and Reliability Committee and Board to solicit feedback and direction. Input received will provide guidance to finalize the screening of initial options.

4.0 Approach for Prioritizing Retained Water Management Options

Based on the initial screening, options that score relatively high in all or most of the prioritization scenarios may then be evaluated in more detail as refined options. TM 5 will document the evaluation and prioritization of the refined options to be conducted under Study Task 5.

4.1 Evaluation of Retained Options

Evaluation of the refined options will likely include the following activities:

- Additional analysis to verify options and develop more detailed descriptions regarding operations, availability of water supplies, and infrastructure needs to allow for a more refined operations analysis to better estimate option yield and potential benefits

- Refinement of information on option location and site-specific details to allow for a more thorough assessment of implementation requirements (e.g., environmental and permitting requirements)

- Conceptual engineering designs and cost estimates for structural features

4.2 Scoring of Refined Options

The scoring of the refined options will use a similar approach to the screening of initial options. The four evaluation criteria and associated metrics described in Section 2 will remain applicable to provide a consistent framework for evaluation, comparison, and prioritization of the options.

4.3 Priortization of Refined Options

In addition to the trade-offs described in Section 3, a composite weighted score of all four of the evaluation criteria will also be used to aid in the prioritization of the refined options relative to one another. The weights for each of the criteria and metrics will be determined using input from the District's Water Supply and Reliability Committee and Board on the relative importance of the four criteria. Table 4-1 is an example of the relative criteria weights that will need to be determined.

In addition, a sensitivity analysis of the assigned weights may be performed to identify any potential effects that varying weights may have on the prioritized list of refined options.

The results from this analysis will be a prioritized list of refined options available to the District to implement to improve its water supply reliability and management as funds become available. A detailed scope of work for the subsequent feasibility study will be developed for these prioritized options under Study Task 6 and documented in TM 6.

Table 4-1.
Example Relative Weights for the Evaluation Criteria

Criteria	Criteria Relative Weight
Cost-Effectiveness	X_1%
Contribution to Objectives	X_2%
Implementation Complexity	X_3%
Uncertainty	X_4%
TOTAL	100%

Prepared for
SJWD Board Meeting
March 9, 2016

SAN JUAN WATER
SINCE 1854

Status Report and Summary

Wholesale Water Management and Reliability Study

MWH®
BUILDING A BETTER WORLD

Study Purpose and Goal

- **PURPOSE** is to develop a short, prioritized list of water management options to improve water supply reliability, and recommendations for the next phase.
- **GOAL** is to improve management of surface water and groundwater resources within the District's wholesale service area, and potentially outside the District's current service area, through collaboration, consolidations, or other actions improve its water supply reliability.

Study Objectives

Increase water supply reliability to the District's retail customers and Wholesale Customer Agencies **during dry years** by integrating surface water and groundwater storage.

Perfect the beneficial use of the District's water rights, contractual entitlements, and facilities.

Provide long-term financial benefits to ratepayers, and provide regional and statewide benefits.

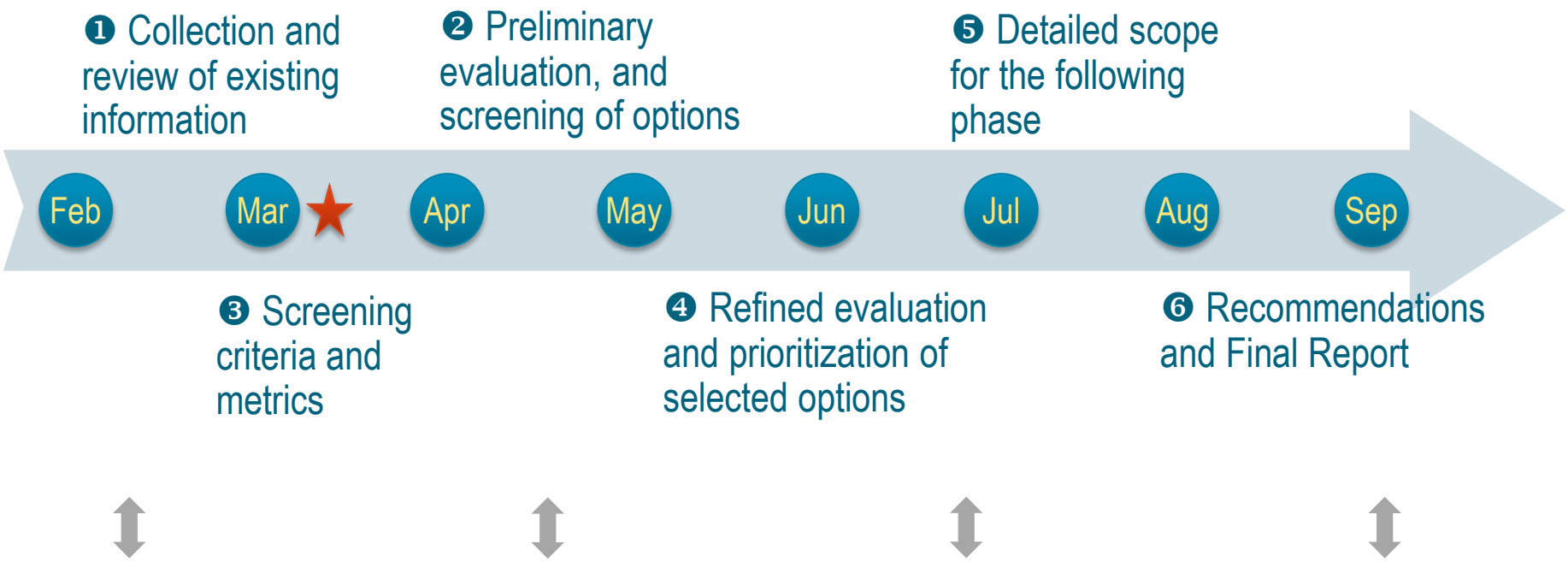
Planning Constraints

- Consider the full range of options within district maximum allowable authority.
- Maintain and improve current water supply reliability to Wholesale Customer Agencies.
- Maintain consistency with new and emerging regulations, such as the Sustainable Groundwater Management Act.
- Maximize potential financial assistance for implementation.

Study Roles and Responsibilities

Group	Responsible (R)	Accountable (A)	Consulted (C)	Informed (I)
District Staff	☑	☑		
Water Supply & Reliability Committee			☑	
District Board		☑		☑
Wholesale Customer Agencies				☑
MWH Team	☑	☑		

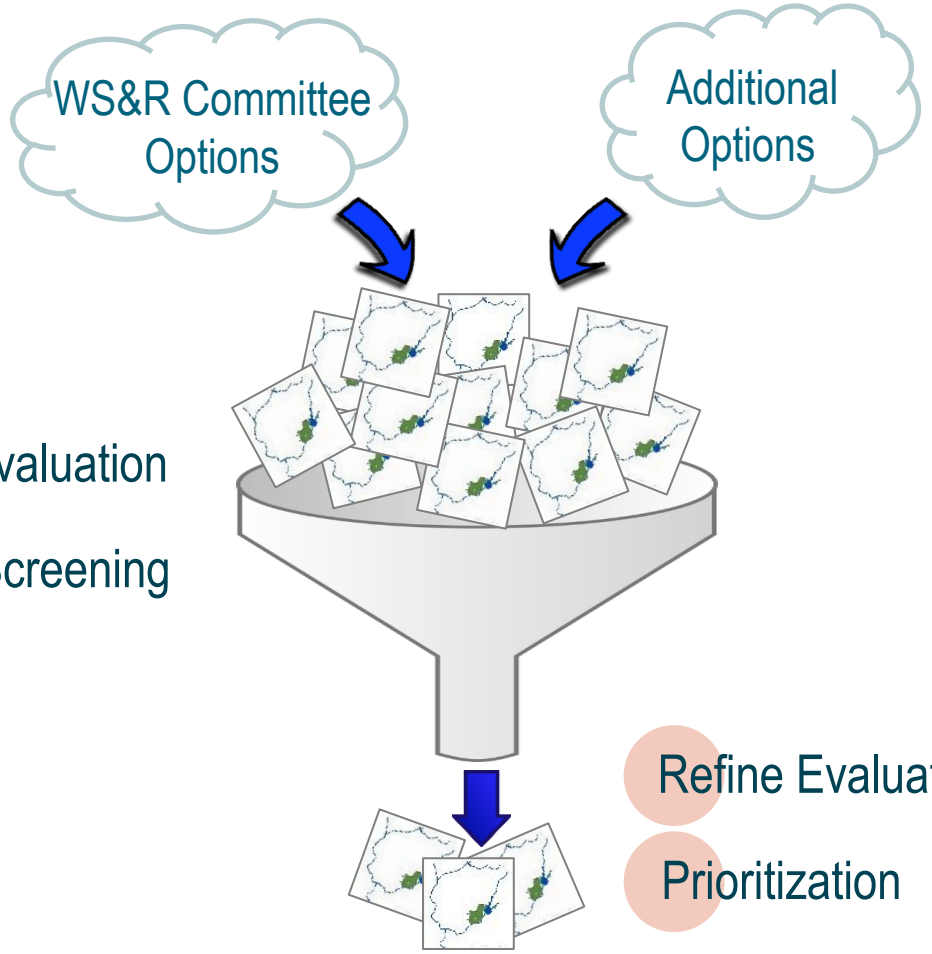
Study Process and Schedule



Evaluation Criteria and Metrics

Cost-Effectiveness	• Cost per acre-foot
Contribution to Objectives	• Dry year reliability & extreme drought conditions • Increase use of District's water supplies & treatment capacity • Provide long-term financial benefits to District ratepayers
Implementation Complexity	• Environmental & permitting requirements and approvals • Water rights and contracts requirements, Institutional • Land acquisitions, public support, & schedule
Uncertainty	• Costs • Yield and reliability

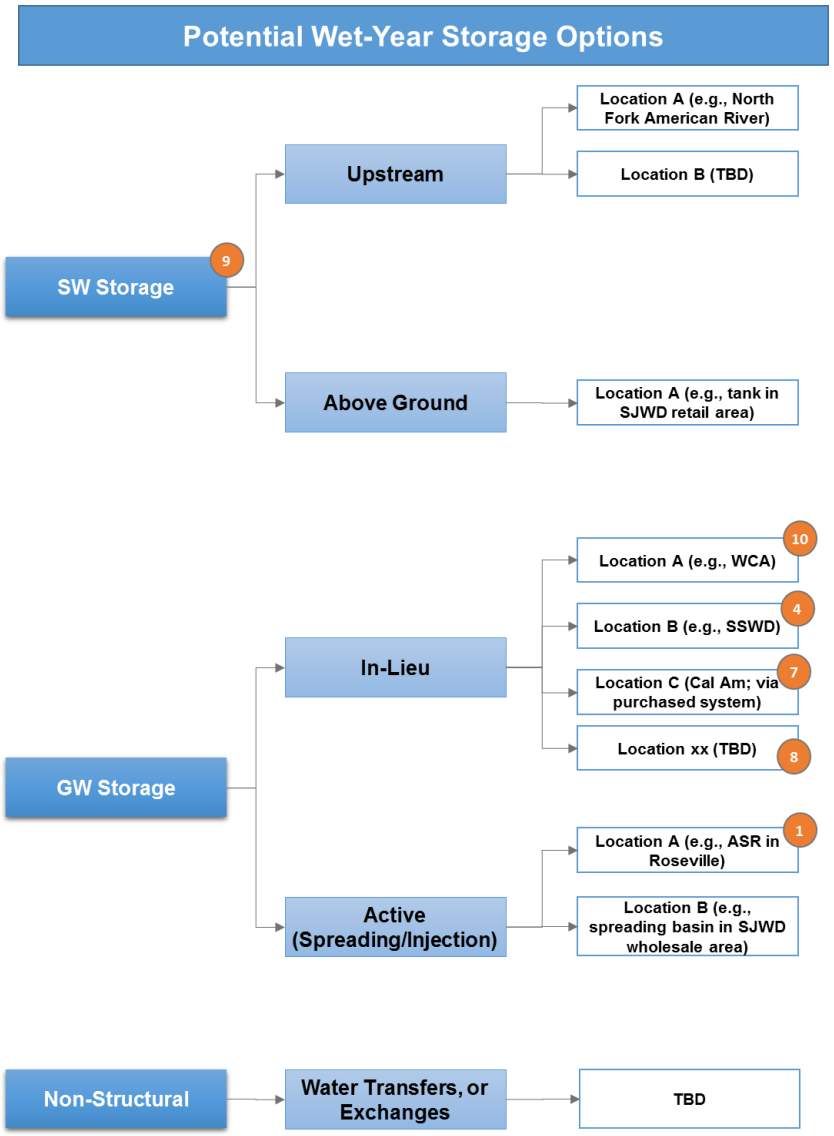
Two-Step Evaluation and Screening

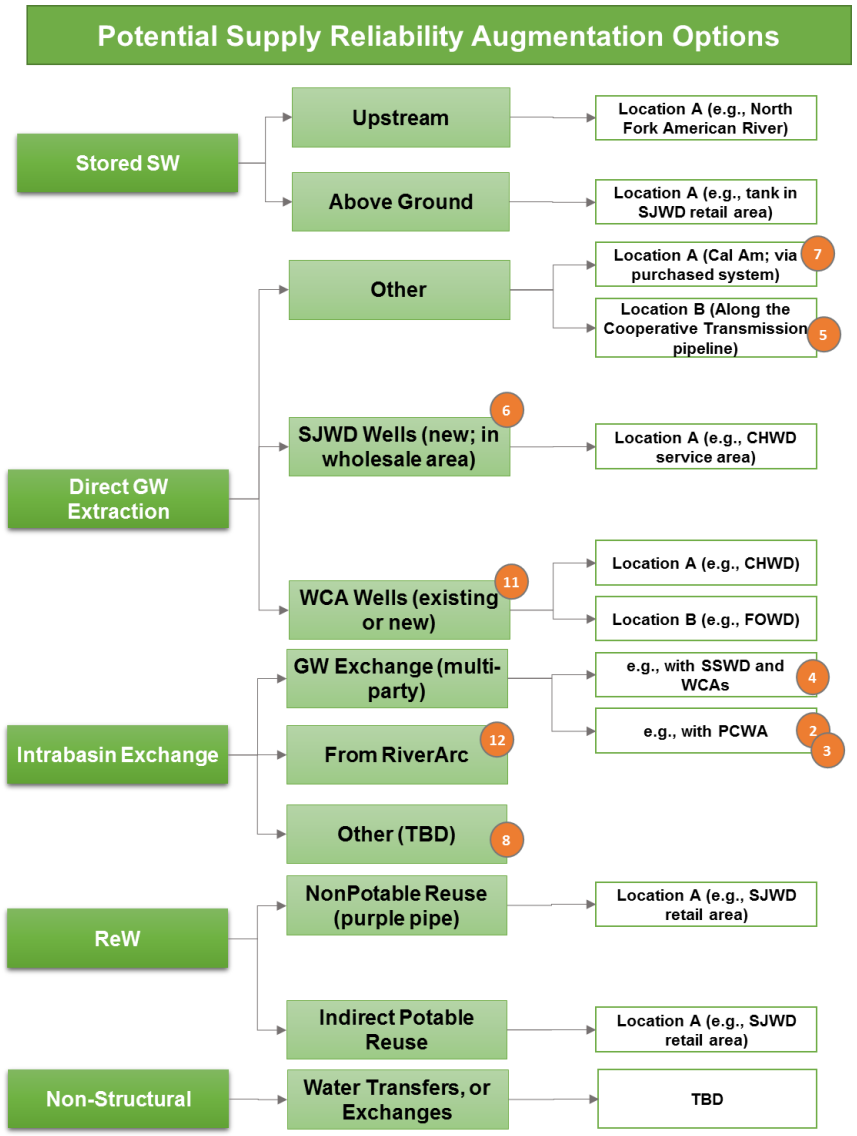


- High-Level Evaluation
- Preliminary Screening

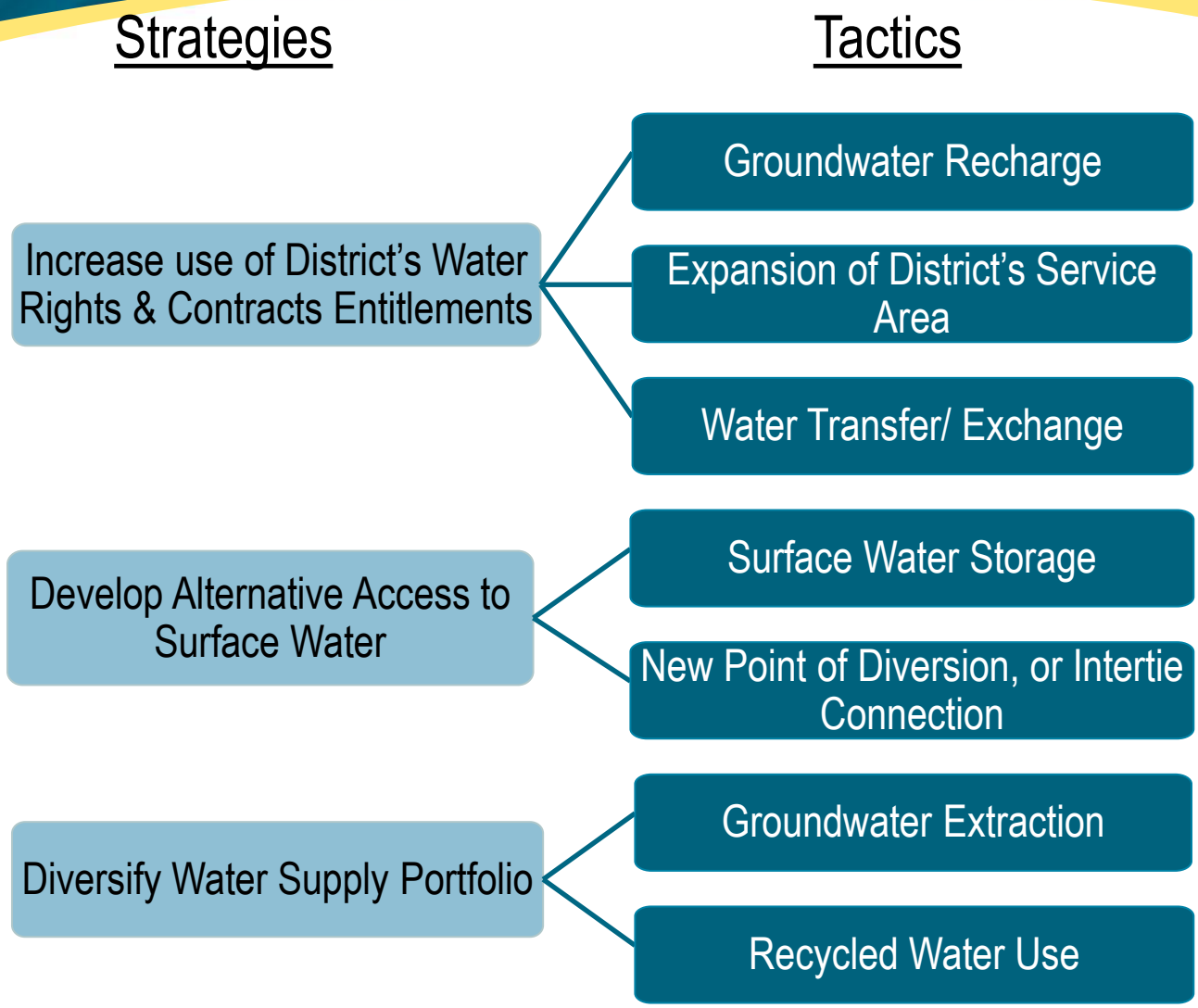
- Refine Evaluation of Retained Options
- Prioritization

Water Management Options Development





Water Management Options



Preliminary Evaluation

- Using existing information
- Qualitative & quantitative evaluation
- Consistent level of detail

SAN JUAN WATER DISTRICT WATER SUPPLY & RELIABILITY STUDY

Project Evaluation Summary

ID:

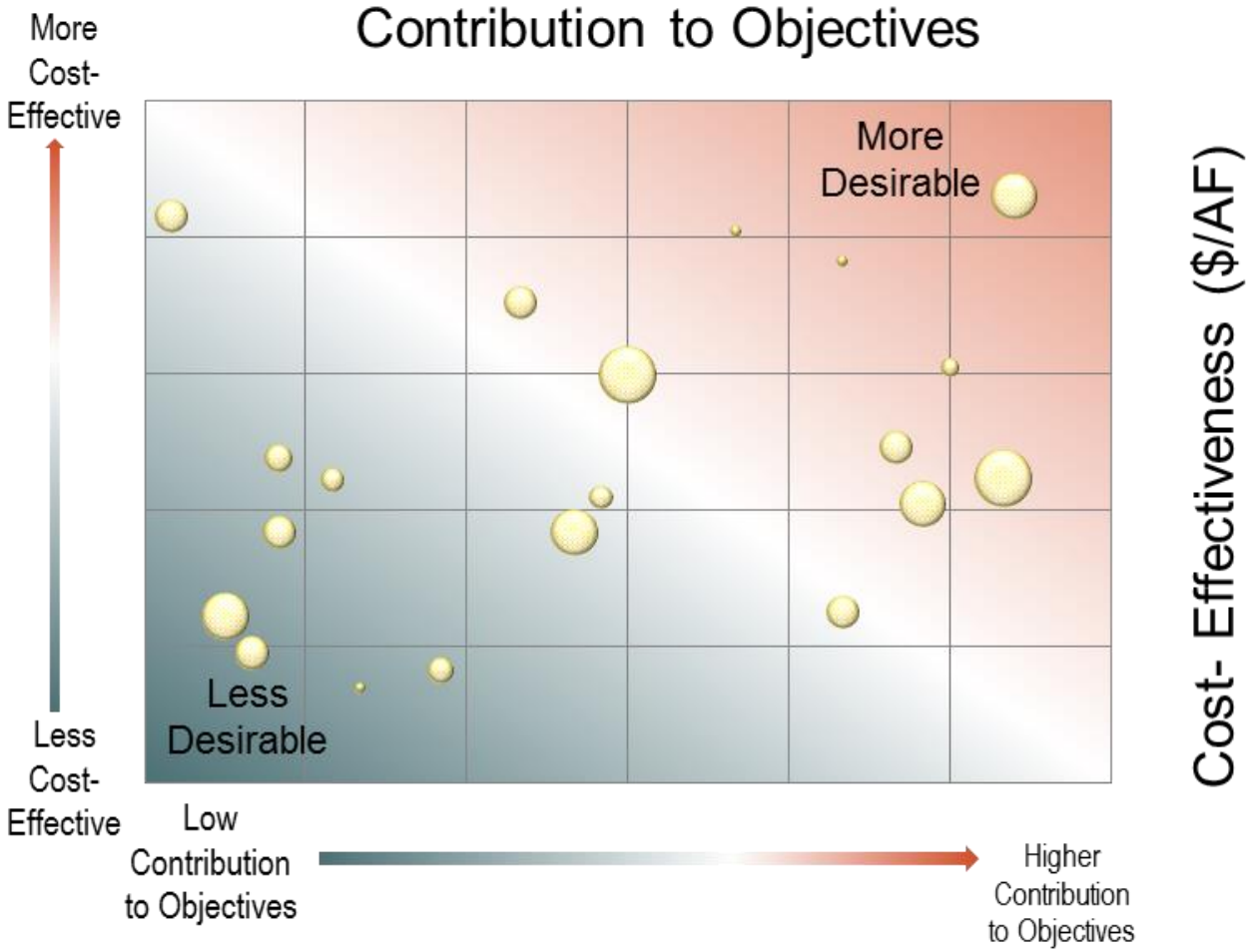
Project Name: Type:

CRITERIA / METRICS	ASSESSMENT/ VALUE	SCORE	NOTES
Cost-Effectiveness			
Yield - Long-term Average (TAF/year)	1.0	N/A	
Water Supply Source	Pre-1914 and appropriative water right	APPR	
Total Cost ($)	$ 6,000,000,000	N/A	*6 to 10 billion dollar estimate (Reclamation, 2013)*
Overall Cost-effectiveness ($/AF) (Total Cost / Yield)	$ 326,228	N/A	*Annualized, 3.5% discount rate over 30 year project life*
Contribution to Objectives			
Perfect Beneficial Use	Moderate Potential	💧💧	
Improve Dry Year Reliability	High Potential	💧💧💧	
Provide Financial Benefit	Low Potential	💧	
Implementation Complexity			
Environmental Compliance Requirements	Complex: Likely EIS/EIR	💧	
Permitting Requirements	Complex: Likely Individual Permit, Formal Section 7 Consultation	💧	
Water Rights / Contracts	Moderate: Likely Change to Point of Diversion/Place of Use	💧💧	
Institutional & Coordination	High: Partnerships Needed, Likely New Agreement	💧	
Land Acquisition	High: No Willing Seller Identified	💧	
Public Acceptance & Support	Low: Low Public Acceptance and Support	💧	
Schedule	Greater than 3 years to implement	💧	
Uncertainity			
Costs	Moderate: Cost Information, No Engineering Details	💧💧	
Yield & Reliability	Moderate: Confirmed Yield, Moderate Reliability	💧💧	

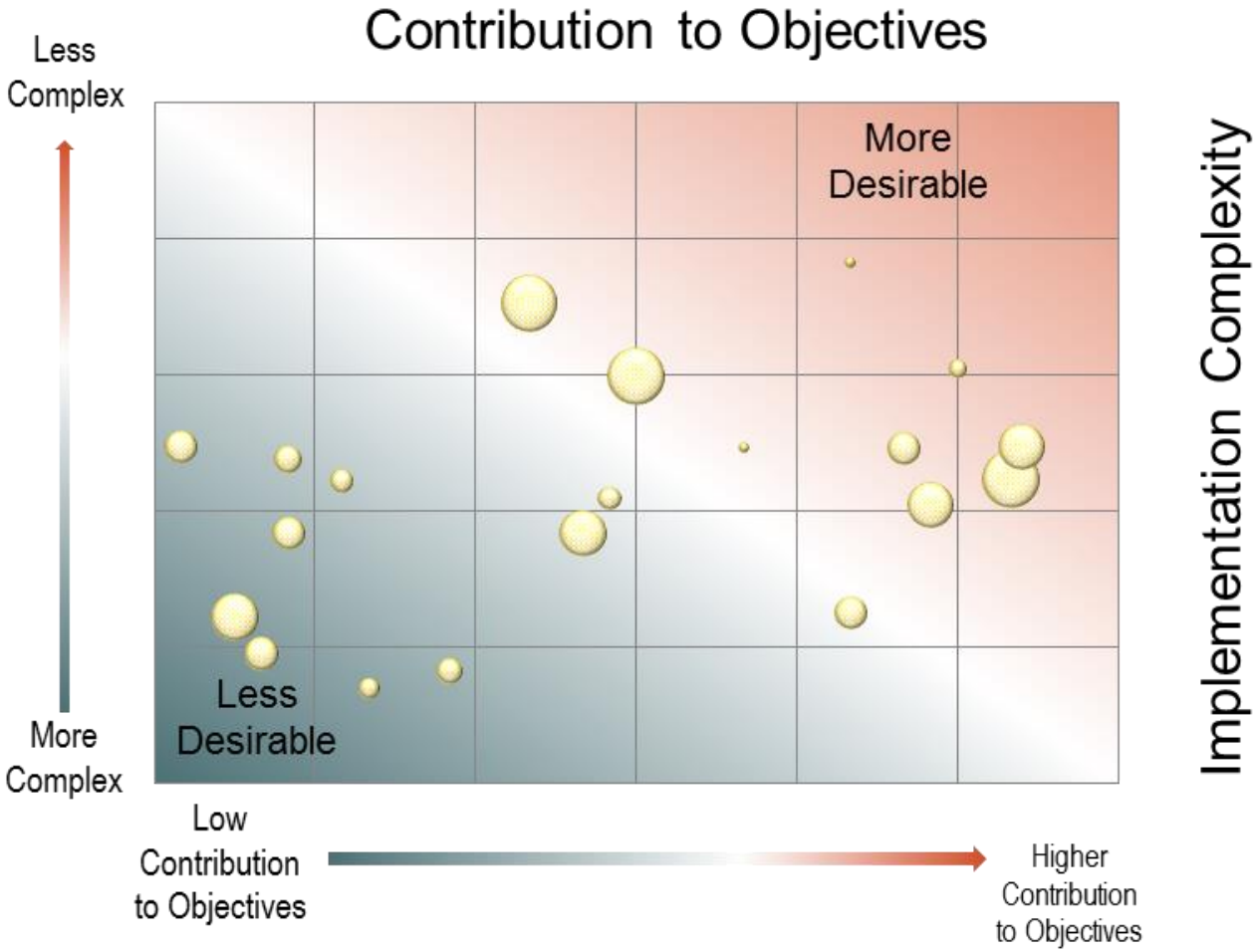
Evaluation of Water Management Options

Water Management Options	Evaluation Criteria			
	Contribution to Objectives	Cost-Effectiveness	Implementation Complexity	Uncertainty
1 …..	🟢🟢🟢	🟠🟠	🟠🟠	🔴
2 …..	🟢🟢🟢	🔴	🔴	🟠🟠
3 …..	🟠🟠	🟢🟢🟢	🟢🟢🟢	🟠🟠
4 …..	🟠🟠	🔴	🟠🟠	🟢🟢🟢
5 …..	🟢🟢🟢	🟠🟠	🟠🟠	🟢🟢🟢
6 …..	🔴	🟢🟢🟢	🟢🟢🟢	🟠🟠
7 …..	🟢🟢🟢	🔴	🟢🟢🟢	🟢🟢🟢
9 …..	🟢🟢🟢	🟠🟠	🟢🟢🟢	🔴

Trade-off Analysis



Trade-off Analysis



Preliminary Screening of Options

- Trade-off analyses will help identify options that consistently rank in desirable and in less desirable zones
- Group options into 3 groups:
  - High potential
  - Moderate potential
  - Low potential
- Input from Water Supply & Reliability Committee and Board

Refined Evaluation and Prioritization

- Refine evaluation of option, implementation requirements, and conceptual cost estimates
- Conduct trade-off analysis
- Develop an overall score to assist in prioritization:
  - Input from the WS&R Committee and Board on the relative importance of the four criteria
  - Sensitivity analysis of assigned weights
- Develop prioritized list, and potential recommendations for bundled actions

Next Steps

Wholesale Customer Agencies Status Meeting	Mar 14, 2016
Review Meeting with WS&R Committee	Apr 6, 2016 (tentative)
Presentation at District Board Meeting	Apr 20, 2016
TM4 High-Level Evaluation and Screening of Water Management Options	Apr/May 2016

R3 Water Federal Agenda

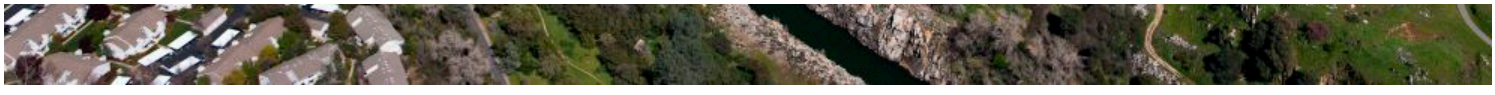
A strategy for current and future water supply sustainability and reliability at Folsom Lake Reservoir and on the Lower American River

CITY OF FOLSOM
DISTINCTIVE BY NATURE

CITY OF ROSEVILLE
CALIFORNIA

SAN JUAN WATER
SINCE 1854

2016



R3 Water Agencies

City of Folsom	City of Roseville	San Juan Water District
Steve Miklos *Mayor*	Carol Garcia *Mayor*	Pamela Tobin *President*
Jeff Starsky *Vice Mayor*	Susan Rohan *Vice Mayor*	Kenneth H. Miller *Vice President*
Kerri Howell *Councilmember*	Bonnie Gore *Councilmember*	Edward J. "Ted" Costa *Director*
Ernie Sheldon *Councilmember*	Tim Herman *Councilmember*	Dan Rich *Director*
Andy Morin *Councilmember*	Pauline Roccucci *Councilmember*	Bob Walters *Director*
***	***	***
Marcus Yasutake *Director of Environmental and Water Resources*	Richard D. Plecker, P.E. *Director of Environmental Utilities*	Shauna Lorance *General Manager*

R3 Water Federal Agenda

A strategy for current and future water supply sustainability and reliability at Folsom Lake Reservoir and on the Lower American River

WHO IS R3 WATER?

Together, the Cities of Roseville and Folsom and the San Juan Water District represent the three sole water purveyors who rely on Folsom Reservoir for municipal and industrial water supply needs. Combined, the three entities provide water to over 500,000 people in the Sacramento region. Casually, the group refers to itself as the R3 Water Partners.

PLATFORM PRIORITIES

Understanding the delicate balance between the multiple uses of Folsom Reservoir is critical to accomplishing the desired goals of local, regional, state, and federal agencies. Finding this balance is vital to the economic well-being of the region as well as the long-term viability of the environment downstream of the facility. Over the years, stakeholders have struggled to find a balance between operating Folsom Reservoir for flood control and water supply. This struggle is only compounded by recent system requirements placed on Folsom Reservoir to serve as the "first responder" to Delta water quality issues.

Water levels in Folsom Reservoir directly relate to the amount of water supply available for the Sacramento Region. If Folsom Reservoir drops too low, water for over a half a million people is at serious risk. This has been a major concern for several years, especially in 2015 and 2016, as we faced one of the most severe droughts on record. Folsom Reservoir water levels reached a historic low in December 2015, requiring the installation of emergency pump stations as a contingency to deliver water to our agencies. Although we are fortunate to see some precipitation this winter, it is too early to know if we will be facing similar water delivery challenges later in 2016. We recognize that changing climate will only lead to hotter, drier years ahead, which will provide significant operation challenges for Folsom Reservoir.

To achieve our goal of water supply sustainability and reliability at Folsom Lake Reservoir and within the American River Watershed, the R3 Water agencies vow to:

- Preserve water rights,
- Promote regional water supply reliability,
- Mitigate impacts of climate change, and
- Raise awareness of the American River region.

This federal agenda and platform supports these goals through critical initiatives and issues related to operations, the future, and awareness.

Operations

WATER RIGHTS AND CONTRACTS

The City of Roseville is a water-service contractor of Reclamation with a contract supply of 32,000 acre-feet delivered from Folsom Reservoir. In addition, Roseville holds a contract for 30,000 acre-feet of Middle Fork Project water from Placer County Water Agency under that agency's separate water rights. That supply, however, is only physically available to Roseville if Reclamation operates Folsom Reservoir so that the water-supply intake in the reservoir remains wet.

As the holder of appropriative water rights that date back to the 1850s, the City of Folsom holds some of the most senior water rights on the American River and, indeed, in the state. Those rights are the basis for the water-right settlement contracts with Reclamation that Folsom holds. Those contracts require Reclamation to operate Folsom Reservoir to deliver 27,000 acre-feet per year to Folsom under all conditions. Folsom expects Reclamation to support full delivery of the City's supplies under the City's settlement contracts. In addition, Folsom holds a 7,000 acre-feet per year Central valley Project water supply sub-contract from the Sacramento County Water Agency, subject to the CVP Municipal and Industrial Water Shortage Policy.

SJWD is the holder of appropriative water rights that date back to the 1850s and holds some of the most senior water rights on the American River and in the State. Based on these rights, SJWD holds a settlement contract with Reclamation under which SJWD is to receive 33,000 acre-feet of water per year without dry-year reductions. In addition, SJWD is a water-service contractor of Reclamation with a contract supply of 24,200 acre-feet of delivered from Folsom Reservoir.

It is important to note that Folsom and San Juan Water District (SJWD) hold water rights that predate the CVP and Reclamation recognized these rights in settlement contracts. Reclamation must operate Folsom Reservoir to satisfy those rights above all others. Water supply reliability is function of terms inserted in Reclamation's water–right permits for the reservoir. In Decision 893, the State Water Rights Board imposed Term 14 on Reclamation's permits in order to ensure that water agencies in this region would have their "present or prospective" needs "fully met" by Reclamation before Reclamation committed American River water to others.

As noted above, Reclamation's water-right terms, as well as public health and safety, require Reclamation to keep Folsom Reservoir storage above the water supply intake. Folsom Reservoir must be operated so that enough water is stored so the water supply intake can be operated without extraordinary measures. Reclamation's water-right permits also require Reclamation to satisfy Roseville's and San Juan Water District's Central Valley Project (CVP) contracts. When the State Water Rights Board granted Reclamation the water rights for Folsom Reservoir in 1958, it stated that Reclamation's use of stored water in Folsom "shall be limited to deliveries for beneficial use within Placer, Sacramento and San Joaquin Counties and shall not be made beyond the westerly or southerly boundaries thereof, except on a temporary basis, until the needs of those counties, present or prospective, are fully met." Roseville's and San Juan Water District's CVP contracts are covered by this requirement (Term 14) in Reclamation's permits. Reclamation must operate Folsom Reservoir, and the CVP as a whole, to satisfy the water rights.

FOLSOM OPERATIONS

Folsom Dam and Reservoir form a multipurpose water project, constructed by the US Army Corps of Engineers (USACE) in 1956 and operated by the US Bureau of Reclamation as an integral part of the Central Valley Project (CVP.) The facility reduces flood risk for the Sacramento area while serving other project purposes including water supply (agriculture, municipal, and industrial), hydropower, fish and wildlife protection, water quality (including water temperature), and recreation. Federal discussions are underway to re-operate Folsom Reservoir to increase flood protection; maintain environmental

concerns in the Lower American River; and, respond to additional Delta water quality requirements. Changes in how Folsom Reservoir operates could have direct impacts on local water customer's level of service if all stakeholders involved do not undertake a coordinated planning effort.

The Corps of Engineers and Bureau of Reclamation are currently in discussions regarding the operation of Folsom Reservoir. Local water purveyors who receive their water supply from Folsom Reservoir are concerned that significant operational changes may be considered without coordinating those efforts with all stakeholders involved.

If Folsom Reservoir levels drop below elevation 330 feet, water supply for over 500,000 people are at serious risk. Without a coordinated effort to evaluate the impacts of lower lake levels that occur either naturally or by responding to new criteria included in the Biological Opinions (BO) issued by US Fish and Wild Life Service and the National Marine Fisheries, lower lake levels will occur more frequently without the necessary facilities to continue to deliver contractual water supplies to the surrounding agencies.

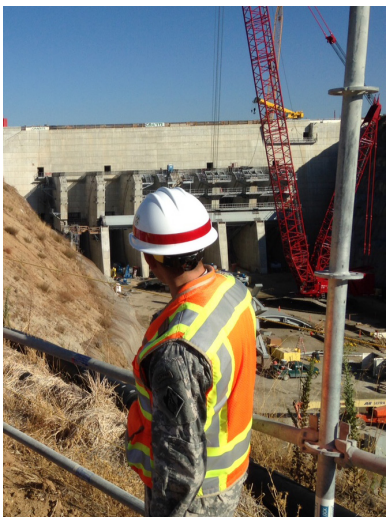
The following are examples where the management of Folsom Reservoir for flood control and Delta water quality issues could negatively impact local water supply:

American River Flow Releases –In recent years, the rain and snowpack events in the Sierras are far less productive in water yield than what we have been historically used to. In addition, the State of California is pressuring the U.S. Bureau of Reclamation to increase future flow releases from Folsom Reservoir to address water quality issues in the Delta. This continued pressure on Folsom Reservoir from decreasing natural flows coupled with man-made mandates for flows continues to create significant concern for the R3 agencies that rely on Folsom Reservoir for their water supply.

Implementation of OCAP – Implementation of Reclamation's Operation Criteria and Plan (OCAP) flow standards are expected to cause a re-operation of Folsom Reservoir as a "first responder" to water quality events in the Delta and will have an adverse impact on Folsom Reservoir water purveyors (Folsom, Roseville, San Juan Water District, El Dorado Irrigation District, and Placer County Water Agency) and on downstream American River water agencies (Sacramento Suburban Water District, Carmichael Water District, City of Sacramento, Sacramento Municipal Utility District, East Bay Municipal Utility District, and Golden State Water Company). Recent passage of state legislation will add yet another layer of complications to meeting contractual water supply obligations.

JOINT FEDERAL PROJECT AND WATER CONTROL MANUAL UPDATE

As directed by Congress, the USACE, in collaboration with the US Department of Interior Bureau of Reclamation, the State of California Central Valley Flood Protection Board, and the Sacramento Area Flood Control Agency are taking steps to reduce flood risk to the Sacramento area through a variety of authorized facilities. These steps also include the revision of operation rules and criteria for Folsom Dam and Reservoir. A key component to improved flood risk management is the Folsom Dam Joint Federal Project (JFP) currently under construction. Achieving the twin goals of the USACE's flood protection improvement and Reclamation's safety of dams, the JFP is the construction of a gated auxiliary spillway with a crest elevation 50 feet lower than the spillways on the existing main dam that will work in conjunction with the existing spillways to pass the probable maximum flood. In order to fully realize the benefits of the new spillway, the existing water control manual (WCM) is being updated.



R3 is actively engaged as a stakeholder in the WCM update process and is advocating for the use of National Weather Service forecasts into the new WCM flood operation rules. This "forecast-based" operation acknowledges the advancements in weather prediction technology and would enable Reclamation to manage storm events in real time rather than in accordance with a hardened rule curve, which could result in higher lake elevations more months of the year for water supply.

MODIFIED FLOW MANAGEMENT STANDARD

The lower American River has been the focus of a successful stakeholder effort, known as the Sacramento Water Forum, to improve conditions for fish and water supply. A central element of the 2000 Water Forum Agreement calls for developing and implementing a flow management standard on the lower American River.

Recently, the Water Forum stakeholders designed a new program for managing flows in the lower American River that is better for fish and local residents. This new flow proposal, called the Modified Flow Management Standard, not only helps the fish of the lower American River by better managing river water temperatures, it also sets forth end of year storage goals for Folsom Lake.

The proposed Modified Flow Management Standard:

- Lowers water temperatures in the lower American River during crucial rearing season for juvenile steelhead
- Provides more spawning habitat for fall-run Chinook salmon

- Creates the potential for better overall habitat conditions, particularly in the driest years
- Improves water supply reliability in the American River basin by proposing an end of December storage target range for Folsom Lake.
- Mitigates redirected temperature impacts to Sacramento River fisheries

Incorporating the Modified Flow Management Standard into federal operational regimes for Folsom Reservoir is important to the R3 agencies.

CAL WATER FIX

CalWaterFix, in its final approved form, must incorporate assurances that Folsom Reservoir not be operated in a way, including consideration of the future impacts of climate change, that compromises the R3 agencies ability to reliably provide water to the 500,000 people they serve. The proposed BDCP/California WaterFix project show that Folsom Reservoir will be operated in a manner that would violate several settlement contracts and water-right permits that apply to the water stored in the reservoir. This includes operations at Folsom reservoir that would not allow Reclamation to deliver water to our agencies through the existing intake infrastructure.

COORDINATED OPERATING AGREEMENT (COA)

The COA is the basis upon which the United States and the State shall coordinate the operations of the Central Valley Project and State Water Project facilities to meet Sacramento in-basin uses and maintain the respective annual water supplies. The agreement includes a formula for calculating the amount of in-basin water uses assigned to each of the project. Although it was likely a fair representative of actual conditions when developed in the 1980s, it now skews the water allocations between the two projects. For example, the CVP is required to pick up 75% of in-basin uses, while the SWP is only responsible for 25% of the uses. This results in the CVP having to provide 75% of the water used by SWP settlement contractors in the Sacramento Basin. This agreement must be revised to allow an equitable distribution of in-basin water uses without violating California's water rights system.

Future

WATER RIGHTS AND CONTRACTS

California's longstanding water right's system was developed based on a first come, first served priority, with assurances that the area of origin of the water supplies would retain access to adequate water supply as needed. As the region that is served by the R3 agencies continues to grow, an adequate and reliable water supply must be available for the economic growth in this region. The security of existing water rights and contracts must be protected for use in this region.

CONJUNCTIVE USE

Conjunctive use is the combined use of both groundwater and surface water in a manner that improves water availability and reliability. The City of Roseville and SJWD lie over the North American sub-basin of the Sacramento Valley Groundwater Basin. The North American sub-basin (DWR Groundwater Basin Number 5-21.64) is located in the eastern central portion of the Sacramento Groundwater Basin, encompassing portions of Sutter, Placer, and Sacramento Counties. The City of Roseville has invested in Aquifer Storage and Recovery (ASR) which allows the City to store excess surface water directly in the groundwater basin for use when surface water supplies are limited. SJWD wholesale has constructed groundwater wells and a pump back project to pump groundwater from SSWD into SJWD wholesale service area. . This infrastructure, coupled with robust interties with other agencies, allows the R3 agencies the opportunity to conjunctively use water. Studies have shown the North American sub-basin has significant storage capacity. The R3 agencies are working with other water agencies through the Regional Water Authority to evaluate the creation of a CVP groundwater bank. Investment in expanded regional groundwater/surface water modeling along with federal policies that expand the place of use for CVP water supplies during years where water is available will be necessary to establish a groundwater bank. Successful completion of a CVP groundwater bank will create greater water reliability for the R3 agencies and others.

INFRASTRUCTURE

Expanded and rehabilitated infrastructure combined with water efficiency advancements are essential to providing reliable and safe drinking water to our communities. Infrastructure investments supported by local, state and federal agencies must include:

- Investment in new surface water projects to reduce reliance on Folsom Reservoir and increase supply reliability;
- Investment in groundwater facilities and cleanup to support expanded conjunctive use programs;
- Investment in local and regional transmission and distribution systems to expand inter agency connections;
- Investment and expansion of recycled water systems to offset and reduce potable water supply needs;

These important projects are necessary to insure facilities are in place to meet future climate change challenges while meeting a grown region and

ensuring long-term economic prosperity.

CLIMATE CHANGE

The mission of the Bureau of Reclamation is to manage, develop and protect water resources for the American Public. Over the past decades, CVP water resources have been allocated to other public benefits, reducing water supply reliability for R3 agencies and other Reclamation contractors dependent on the CVP. In addition, the water storage of the snow pack in the Sierra Nevada Mountains is projected to decrease by 30% over the next 25 years. Reductions to water supplies, whether due to reallocation for other uses or due to climate change must be mitigated to bring the CVP back to a sustainable project.

USBR R&R

Roseville has historically relied upon its long-term water service contract with Reclamation for up to 32,000 acre-feet annually (AFA) of Central Valley Project (CVP) water as a mainstay of its surface water portfolio. The City consistently schedules and takes delivery of 100 percent of its annual CVP water allocation.

The sole point of diversion under the city's Reclamation contract is Folsom Dam and Reservoir. CVP supply from Folsom Reservoir has become increasingly less reliable over time due to additional regulatory requirements and recurring dry-year conditions.

Roseville also has contracts for 30,000 AFA with Placer County Water Agency's (PCWA) from their Middle Fork Project (MFP) and a normal/wet year contract with San Juan Water District (SJWD) for 4,000 AFA. SJWD also contracts with PCWA for 25,000 AF of MFP water. These additional supplies are stored in Folsom Reservoir, then conveyed through Folsom Dam and Reclamation facilities under long term Warren Act contracts to the City's and SJWD's Water Treatment Plants Plant in Granite Bay.

Any changes in contracting procedures or charges for use of excess capacity in Folsom Dam and Reservoir have a significant impact on the City's ability to economically meet critical water needs.

Directives and Standards issued by the Bureau of Reclamation, such as PEC 05-10 and PEC-11, cannot supersede the terms and conditions of the City's and SJWD's existing long term Warren Act Contract with Reclamation. Those contracts are duly executed and legally may not be amended without mutual consent by the parties.

Directives and Standards issued by the Bureau of Reclamation, such as PEC 05-10 and PEC-11, cannot supersede the Interim Central Valley Project Municipal and Industrial Ratesetting Policy (Interim CVP M&I Ratesetting Policy) which is the basis for our annual Warren Act contract rates pursuant to Article 5(a).

The majority of non-project water delivered through the CVP historically go to CVP contractors. Regardless of how they may be calculated, increasing charges exponentially in the midst of the current four year drought places an unfair and potentially crushing financial burden on cities, farms, and agencies that have long trusted in Reclamation's bedrock policy commitment to facilitate movement of water to where it is most needed. Based upon Reclamation's commitment, these cities, agencies and farms have developed long-term water management plans that absolutely depend upon extended use of CVP facilities.

We ask that you encourage Reclamation to continue its reconsideration of this untenable approach to aging infrastructure and instead engage with CVP contractors and partner agencies in a meaningful process to achieve our common interest of preserving safe, operationally reliable CVP facilities over the long term.

Awareness

CONSERVATION

The R3 partner agencies have planned and invested in drought resilient water programs and projects over many years. That investment has included the development and management of a robust portfolio of residential and business water conservation programs such as high efficiency rebates, cash for grass programs, water wise house and business calls and a wide range of high efficiency rebates for inside appliances as well as for outside irrigation efficiency.

In 2015, in the midst of a historic drought, the R3 partnering agencies utilized long-term water conservation program investments. However, doing so, did not come without negative impacts such as private property losses, utility revenue financial losses and impact to local economies. Comparing 2013 against 2015 water conservation performance over the June to December state mandated reporting period, each agency saw the following results:

- The City of Folsom was able to reduce its water use in 2015 by 32 percent.
- The City of Roseville was able to reduce its water use in 2015 by 33 percent.
- San Juan Water District was able to reduce its water use in 2015 by 36 percent.

The R3 partner agencies need to continue to share these conservation results and provide the overall context in which they happened – through a long-term and strategic investment in water conservation programming, coupled with a robust, proactive and sustained water efficiency public outreach program.

FOLSOM LAKE'S STORY

Folsom Reservoir is not only the primary water supply for a half million people in the region, but serves as a multi-use flood control facility, recreational lake, provides environmental protection for the lower American River, recreation and used as a resource to improve water quality in the Sacramento-San Joaquin Delta.

For the past several years, Folsom Reservoir was operated to historical lows in the lake level due to both constraints brought on by the drought and by how the reservoir has been operated in response to the drought by the U.S. Bureau of Reclamation. In fact, water levels and storage volume were so low that Reclamation installed temporary emergency pumps as a contingency to deliver minimum water supplies that are far less than our agencies' settlement agreements and contract water supplies.

The optics of Folsom Reservoir lends to a significant amount of attention from the public and the news media on how the reservoir is operated and the challenges faced by both climate and operations. The R3 partners will work with its communications resources to tell the local story of Folsom Reservoir, both its challenges and its successes, to help further the policy goals outlined in this document.

WATER SUPPLY DIVERSIFICATION

Over many years, the R3 partners have worked together to develop water supplies that are not solely dependent upon Folsom Reservoir, which has many demands placed upon it besides water supply. Investing in a diversified water supply portfolio has included investing in inter-agency water interties, conjunctive use of groundwater supplies, development of recycled water capacity and transmission and other strategic investments. The benefit of these past investments have been recognized in the regions ability to withstand the current historic drought in California. The work is not done, however. Additional investment in new surface water diversions and water storage projects is critical to meeting long-term water supply reliability within the grown region. Communicating past successes and the need for future capacity and transmission and other strategic investments is critical in conveying the R3 partners focus on long-term water supply reliability.

REGIONAL COOPERATION

The success of the R3 partners relies on regional cooperation between agencies and also through formal organizational partnerships and alliance. Critical to cooperation are these two key Sacramento regional organizations:

Regional Water Authority

The Regional Water Authority (RWA) is a joint powers authority that serves and represents the interests of 25 water providers and affiliated agencies in the greater Sacramento, Placer and El Dorado County region. The Authority's primary mission is to serve and represent regional supply interests and assist members with protecting and enhancing the reliability, availability, affordability and quality of water resources.

Formed in 2001 after two years of facilitated workshops with more than 60 water industry leaders, RWA consolidated several regional associations to promote collaboration and provide a unified voice on Northern California water issues. One of the great strengths of RWA is the diversity of its membership and its partnerships. RWA members include cities, water districts, mutual water companies, investor owned water utilities, and community services districts.

Water Forum

The Sacramento Water Forum is a diverse group of business and agricultural leaders, citizen groups, environmentalists, water managers, and local governments working together to balance two co-equal objectives:

- To provide a reliable and safe water supply for the Sacramento region's long-term growth and economic health; and
- To preserve the fishery, wildlife, recreational, and aesthetic values of the lower American River.

Through the signing of the landmark Agreement in 2000, the Water Forum represents diverse regional interests in Sacramento, El Dorado, and Placer Counties. All of the R3 partners are members of the Water Forum.

Now, more than 15 years later, the Sacramento region and Water Forum members have an impressive record of implementing progressive water management solutions that have served to protect the river and foster regional vitality. The most recent development is the near completion of the Modified Flow Management Standard.

FUNDING

Although the climate in Congress over the past few years has changed where direct federal funding or earmarks are no longer available, the R3 partners will continue to look for other funding opportunities that allow for the R3 partners to work with the federal government on projects that have a local benefit and a federal funding nexus. The R3 Water agencies fully support federal investment in local water supply initiatives and infrastructure.

Legal Affairs Committee Meeting
February 29, 2016
11:00 a.m.

Committee Members: Bob Walters (Chair)
Ted Costa, Director

District Staff: Shauna Lorance, General Manager
Keith Durkin, Assistant General Manager
Tony Barela, Operations Manager
Teri Hart, Board Secretary/Administrative Assistant
Josh Horowitz, Legal Counsel

Members of the Public: Tom Gray, Fair Oaks Water District
Bob Matteoli, Del Paso Manor Water District
Debra Sedwick, Del Paso Manor Water District
Paul R. Stanbrough, Customer

Topics: Review BKS Legal Services Agreement (W & R)
Legislative Strategy for Groundwater and Conserved Water Transfer (W)
Strategies related to SWRCB Conservation Requirements (W & R)
FO-40 Agreement on Payment Schedule (W)
Conflict of Interest Issues (W)
Los Lagos Tank CEQA Notice of Exemption (R)
Other Legal Affairs Matters
Public Comment
Closed Session
Open Session

1. Review BKS Legal Services Agreement (W & R)

Director Costa requested that this agenda item be tabled to the next committee meeting in light of the full agenda.

For information only; no action requested

2. Legislative Strategy for Groundwater and Conserved Water Transfer (W)

Ms. Lorance informed the committee that she would be reviewing a technical approach with agency staff, a state legislative approach, and a federal legislative approach for groundwater and conserved water transfers. She explained that Mr. Durkin has been working with Department of Water Resources (DWR) and Reclamation in order to develop a proposal to quantify the amount of water that is conserved and available for transfer. Since there is no clear whitepaper on how to proceed with a conserved water transfer, it is being required that an agency demonstrate that new water is being added to the system for this type of water transfer. In addition, there is no credit for water conserved from indoor use; therefore, an agency will need to demonstrate conservation through outdoor use. Furthermore, before the proposal can be submitted, Reclamation and DWR have indicated they will need approval of the transfer of conserved water in writing from the State Water Resources Control Board (State Board) in light of their mandatory conservation requirements.

The committee discussed the conserved water transfer attempt of the previous year, the pre-1914 water rights, the Governor's executive order, and the authority of the State Board regarding permission to use the District's water. Ms. Lorance informed the committee that Mr. Horowitz is communicating with the State Board regarding a conserved water transfer.

In response to Director Costa, Mr. Horowitz explained that he does not know the current status of the Byron-Bethany Irrigation District legal proceedings with the State Board. Mr. Bob Matteoli addressed the committee and commented on the subject and mentioned that the State Board's enforcement division has only been in existence for about ten years.

Ms. Lorance informed the committee that a groundwater substitution transfer with Fair Oaks Water District (FOWD) and Citrus Heights Water District (CHWD) is being discussed. There is approximately 5,000 acre feet of capacity between the two agencies. In addition, there might be some interest by Sacramento Suburban Water District to participate in the groundwater substitution transfer for an additional 5,000 acre feet of water. She explained that approvals need to be obtained from Sacramento Groundwater Authority (SGA) and Sacramento County before proceeding to the next step.

Ms. Lorance informed the committee that CHWD and FOWD were not given groundwater allocations under SGA; however, with the Water Forum agreement in place, there may be an exception during dry years. She commented that she has a meeting set later this week with John Woodling and Rob Roscoe to discuss the issue.

Ms. Lorance informed the committee that after the meeting she will work with Legal Counsel to draft an agreement for the groundwater substitution water transfer and will bring the agreement back to the committee. In addition, she, Mr. Durkin and Mr. Horowitz will be meeting with Santa Clara Valley Water District to discuss the conserved water transfer and the groundwater substitution transfer. Mr. Tom Gray commented that FOWD is committed to doing the transfer.

Director Costa voiced concern regarding the Aerojet groundwater contamination and the cone of depression in the water basin, especially in regard to potential risk of liability. The committee tabled the discussion.

Ms. Lorance commented that Andy Fecko will be conducting a presentation at the March 23rd Board meeting regarding the proposed modified Flow Management Standard and development of a regional Groundwater Bank.

Ms. Lorance commented that there have been requests from the Board to discuss the potential for some legislative actions regarding our conserved water transfer. Mr. Horowitz voiced concern that if the District presented legislation under special interest for conserved water transfers that there may be potential dangers for another bill to be submitted that would limit water per person per household or some other restriction. He recommends that the District talk to legislators about the law on the books and ask for their support. The committee discussed the pros and cons of pursuing legislative action.

Mr. Horowitz informed the committee that ACWA, led by Paul Bartkiewicz, is working on a bill to address conserved water transfers. The committee requested that Mr. Horowitz draft a paragraph for a bill. In addition, they would like talking points provided so that Board members can have discussions with legislators.

For information only; no action requested

3. Strategies related to SWRCB Conservation Requirements (W & R)

Ms. Lorance informed the committee that there have been flood control releases and conservation restrictions at the same time and she was able to voice this difficulty in Washington, D.C. last week. She commented that Reclamation will be issuing letters regarding CVP water and reducing allocations to Health & Safety levels for CVP water deliveries in March; however, she requested that Reclamation delay its letter to the District until the end of March, since the District is taking 3F water and not CVP water at this time.

Ms. Lorance informed the committee that the Water Supply and Reliability Committee will be discussing the strategies related to conservation.

For information only; no action requested

4. FO-40 Agreement on Payment Schedule (W)

Ms. Lorance informed the committee that FOWD Board would like to enter into an agreement for an alternate payment schedule for Phase 2 of the FO-40 project. Mr. Horowitz is working on the agreement and will have a draft ready this week.

For information only; no action requested

5. **Conflict of Interest Issues (W)**

Director Costa reported that he attended the Sacramento Suburban Water District (SSWD) meeting. He voiced concern that SSWD Director Neil Schild discussed the SJWD Water Management and Reliability Study and suggested that SSWD not consider proceeding with continuing the previous discussions with SJWD regarding a merger until the study is complete. Mr. Durkin informed the committee that he had another discussion with MWH regarding Director Schild and Vanessa Nishikawa, the project manager with MWH, confirmed that Director Schild is not working on the study.

For information only; no action requested

6. **Los Lagos Tank CEQA Notice of Exemption (R)**

Mr. Durkin informed the committee that the Los Lagos Tank Recoating Project is categorically exempt from CEQA. The project has the potential to create some noise, dust and fumes during the rehabilitation process; therefore, there are some concerns regarding public complaints. Mr. Durkin explained that public outreach will be performed with customers in the area near the project. Mr. Horowitz recommends that rather than staff filing the CEQA Notice of Exemption (NOE) with the County as an administrative action, that discussion and action be placed on an agenda for the Board to authorize staff to file the NOE. This will provide the public with proper notification and it will begin

the CEQA comment period. The committee did not voice any objection to placing the item on a future agenda.

For information only; no action requested

7. Other Legal Affairs Matters (W/R)

Director Walters requested copies of the Feinstein and the Garamendi water bills. Ms. Lorance will get the information to him.

Ms. Lorance informed the committee that a letter to David Murillo with the Bureau will be sent out on behalf of the District and several other CVP Contractors addressing California's WaterFix Cost Repayment Proposal Request.

For information only; no action requested

7.1 **Next Meeting Date**

The next meeting will be scheduled when needed.

8. Public Comment

There were no public comments.

Director Walters called for Closed Session at 12:37 pm.

9. Closed Session

Conference with legal counsel--anticipated litigation; Government Code sections 54954.5(c) and 54956.9(b); significant exposure to litigation involving state and federal administrative proceedings and programs affecting District water rights

Conference with real property negotiators involving the transfer of water conserved under the District's pre-1914 water right and by groundwater substitution. The Board will provide direction to District negotiators, General Manager Shauna Lorance and Assistant General Manager Keith Durkin, on the price, terms of payment or both for the transferred water. The specific buyers and their representatives with whom the District will negotiate have not yet been identified, but those buyers and representatives will be publicly identified at the Board meeting or as soon thereafter as possible. (See Government Code sections 54954.5(b) and 54956.8.)

10. Open Session

There was no report from Closed Session.

The meeting was adjourned at 12:50 p.m.

Water Supply & Reliability Committee Meeting Minutes
San Juan Water District
March 2, 2016
8:00 a.m.

Committee Members: Bob Walters, Chair
Dan Rich, Director

District Staff: Keith Durkin, Assistant General Manager
Lisa Brown, Customer Service Manager
Teri Grant, Board Secretary/Administrative Assistant

Members of the Public: Tom Gray, Fair Oaks Water District
Ted Costa, San Juan Water District
Pam Tobin, San Juan Water District
Pierceson York, Signature Business Consulting
9 Granite Bay High School Students

Topics: Water Management and Reliability Study Update (W)
Groundwater Reimbursement Status (W)
Strategy and Options to Address Various Conservation Requirement Scenarios This Year (R)
Other Matters
Public Comment

1. Water Management and Reliability Study Update (W)

Mr. Durkin informed the committee that MWH has provided three technical memorandums (TMs) for staff to review and comment on regarding the Water Management and Reliability Study. The TMs will be included in the Board packet for the March 9th Board meeting. MWH will be attending the Board meeting to provide an update to the Board.

Mr. Durkin informed the committee that MWH will hold its first meeting with the wholesale customer agencies (WCAs) staff on March 14th. In addition, a Joint Board meeting will be held at a later date. Mr. Durkin reported that MWH will attend the April 6th committee meeting to review TM4.

In response to Director Walters' comment, Mr. Durkin informed the committee that he has reiterated the conflict of interest issue to MWH regarding the SSWD Director. MWH has confirmed with Mr. Durkin that Director Schild is not participating in the study in any capacity.

For information only; no action requested.

2. Groundwater Reimbursement Update (W)

Mr. Durkin reported that a meeting with the City of Folsom and Orange Vale Water Company is scheduled for March 2nd to discuss the groundwater reimbursement issue. Mr. Durkin informed the committee that they will also discuss whether

interagency agreements are appropriate or if the charges should be placed in the wholesale rates.

Mr. Durkin reported that a timeline will be discussed in order to make a final decision. He will let the agencies know that he will be bringing this item back to the committee in April, as this will allow the agency representatives to report back to their Board and City Council.

For information only; no action requested.

3. Strategy and Options to Address Various Conservation Requirement Scenarios This Year (R)

Mr. Durkin informed the committee that the 36% conservation requirement was reduced to 33% through October 2016 by the State Water Resources Control Board (State Board). The State Board will review conditions in May and might revise the requirements or apply them differently in various regions. He expects that there will still be a significant conservation requirement for the District in any case.

Mr. Durkin informed the committee that based on input from the Drought Committee, staff recommends consideration of two strategies to meet the conservation requirements this year 1) implement a conservation program similar to last year's program but with some refinements, or 2) establish a water budget for each customer based on connection or lot size. He commented that the volunteer Drought Committee discussed the water budget option and it was not well received.

Mr. Durkin explained that implementing a water budget would be difficult and costly, as the District would need to read meters on a monthly basis and then be able to send the information to all customers. In addition, the Board would need to decide on whether to base the water budget on lot size or connection size, and then determine how to establish each budget for every customer. Educating customers on the requirements would also be challenging.

Mr. Durkin provided the committee with a handout, which will be attached to the meeting minutes. He explained that refinements to last year's conservation program would be needed such as:

- Increase FY15/16 budget by $16,000 and increase the FY16/17 budget by $36,000 to:
  - Maintain two 1,000 hour water waste patrol staff ($6,000)
  - Maintain contracted night patrol services (spring/summer/fall) ($10,000)
- Update Ordinance to incorporate progressive penalties for water waste (for example $100/$200/$500/shut off)
- Update ordinance to incorporate winter irrigation schedule. October 1-March 30 irrigation allowed 1 day per week. This should be applicable to Stages 2-4.
- Maintain drought rate surcharge

The committee discussed last year's program, including enforcement of the conservation restrictions, incentives for conservation such as rebates, and lack of penalties. Mr. Durkin commented that the largest number of customer complaints the District received were that there are no consequences for customers that don't comply with the conservation requirements, therefore why should they? Also, it's a matter of fairness. Director Walters suggested that if penalties are implemented then there needs to be a due process with an appeal option and possibly a water school option in lieu of paying the fine.

Mr. Durkin informed the committee that the public outreach should be discussed by the Public Information Committee. Ms. Brown observed that we spent a considerable amount more on public outreach compared to other agencies that achieved the same results, likely due to the heightened public awareness through the media and regional efforts of RWA and ACWA. Mr. Durkin commented that this indicates that a less expensive, but focused outreach effort could be effective and have less budget impact. Ms. Brown suggested that a telephone town hall be scheduled to start communicating the existing conditions. Director Walters suggested that information regarding the releases of water at Folsom Lake be communicated so that the public knows that it is not the District that is releasing the water. Director Rich commented that he would like to see last year's PI spending versus the effectiveness.

The committee recommends the Board consider providing direction to staff at the March 9th meeting to continue the 2015 conservation program through 2016 with refinements to including progressive penalties for water waste, a 1-day per week irrigation limitation in the winter for a Stage 4 Water Crisis, increasing the current budget as well as next year's budget to allow for continuing water waste patrols, and reviewing public outreach efforts and programs to maximize the return on expenditures.

The Water Supply and Reliability Committee recommends that the Board provide direction to staff regarding the 2016 conservation program.

4. Other Matters

4.1 Next Meeting Date

The next committee meeting is scheduled for April 6, 2016.

5. Public Comment

There were no public comments.

The meeting adjourned at 5:14 pm.

Water Year Scenarios

San Juan Water District has been operating under restricted water supply conditions due to the State of California's continued drought emergency orders. It is unknown if current El Nino weather projections will be enough for the Governor and/or SWRCB to remove mandatory water restrictions. It is prudent to plan for varied weather conditions.

Continued drought conditions

San Juan has responded to the State Water Resources Control Board's drought emergency water conservation regulations by implementing a Stage 4 drought condition. San Juan faced a mandatory 36% reduction requirement from the State last year, and is required to meet a 33% reduction through October 2016. To meet this reduction requirement, San Juan will likely need to remain in a Stage 4 water crisis. In addition, staff recommends the following:

-Increase FY15/16 budget by $16,000 and recommend 16/17 budget of $36,000

- Maintain 2-1,000 hour water waste patrol staff ($6,000)
- Maintain Paladin night patrol services (spring/summer/fall) ($10,000)

-Update Ordinance to incorporate progressive penalty for water waste ($100/$200/$500/shut off)

-Update ordinance to incorporate winter irrigation schedule. October 1-March 30 irrigation allowed 1 day per week. This should be applicable to Stages 2-4.

-Maintain drought rate surcharge

Wetter than normal conditions

If drought conditions improve ….

Escalating drought conditions

If drought conditions worsen prompting the State to require a greater than 36% reduction in water use, ….

2015/2016 Conservation Program

- Commit to mandatory 33% reduction target through October (unless revised)
- Maintain drought surcharge
- Promote SaveOurWaterRebates.com toilet & landscape conversion programs
- Target customers that consistently did not achieve reduction of 20% in 2015
- Target high use customers
- Market monthly workshops, WaterSmart Program, landscape audits, drought stage restrictions, water waste penalties
- Proactive leak detection
- Update conservation program ordinance

February

Promote SaveOurWaterRebates.com toilet & landscape conversion programs
Feb 27 workshop: Converting Thirsty Lawns to Beautiful Beds
Discuss updating Water Conservation Ordinance to include:

- Progressive penalty for water waste
    - Stage 1: $25/$100/$200/Disconnection
    - Stage 2: $25/$100/$200/Disconnection
    - Stage 3: $75/$150/$250/Disconnection
    - Stage 4: $100/$200/$500/Disconnection
    - Stage 5: Disconnection
- Stage 3:
    - May-November: up to 3 days per week irrigation
    - March-April up to 2 days per week irrigation
    - December-February: up to 1 day per week irrigation
    - Smart irrigation controllers to reduce evapotranspiration (ET) rate to 80%
    - Day of week watering exception for efficient drip irrigation systems
- Stage 4:
    - March-November up to 2 days per week irrigation
    - December-February: up to 1 day per week irrigation
    - Smart irrigation controllers to reduce evapotranspiration (ET) rate to 70%
    - Day of week watering exception for efficient drip irrigation systems

March

March 26 workshop: Plants, Soil & Other Useful Tips to Create a Beautiful Garden in a Dry Climate
Hire temporary employee for water waste patrol (May – October if drought persists)

May

Contract with night patrol service (June-September if drought persists)

Engineering Committee Meeting Minutes
San Juan Water District
March 3, 2016
4:00 p.m.

Committee Members: Dan Rich, Chair
Ken Miller, Director

District Staff: Keith Durkin, Assistant General Manager
Rob Watson, Engineering Services Manager
Teri Grant, Board Secretary/Administrative Assistant

Topics:
WTP Flocculation/Sedimentation Basin Improvements Project (W)
Update on construction bids and recommendation to award contract
WTP Flocculation/Sedimentation Basin Improvements Project (W)
Recommendation for construction management
Hinkle and Kokila Reservoir Condition Assessments Status Report (W & R)
Los Lagos Tank Recoating Project Status Update (R)
GIS (W and R)
Presentation on District's current capabilities, needs assessment, and recommendation for additional implementation
Other Engineering Matters
Public Comment

1. WTP Flocculation/Sedimentation Basins Improvements Project (W)

Mr. Durkin informed the committee that bids were received and opened for the WTP Flocculation/Sedimentation Basin Improvements Project on February 25th. The bid results are summarized as follows:

Myers & Sons Construction	$6,040,100
Gateway Pacific Contractors	$6,198,353
Anderson Pacific Engineering Construction	$6,368,000
Auburn Constructors	$6,425,300
Steve P. Rados	$6,456,000
KG Walters Construction	$6,810,000
Syblon Reid	$6,928,000
Mountain Cascade	$7,005,000
Western Water Constructors	$7,911,000

The engineer's estimate was $7,574,000.

Mr. Durkin reported that Myers & Sons Construction (Myers) submitted the lowest bid at $6,040,100. Mr. Durkin informed the committee that staff reviewed Myers bid

documents including license, insurance and bond, and found them to be in order. Mr. Durkin pointed out that Myers' specific experience on water treatment plant projects appears to be less than what was called for in the bid documents, although they have considerable construction experience. The committee reviewed Myers & Sons experience qualifications. The committee agreed that their experience is adequate provided they provide a highly qualified construction manager/superintendent. The committee also agreed with staff that it is appropriate to plan for a high level of construction management and inspection for the project.

The Engineering Committee recommends consideration of a motion to award a construction contract to Myers & Sons Construction, LP, for the amount of $6,040,100 and authorize a construction contingency of $604,010 (10%) for a total construction budget of $6,644,110 for the WTP Flocculation/Sedimentation Basins Improvements Project.

2. WTP Flocculation/Sedimentation Basins Improvements Project (W)

Mr. Durkin informed the committee that he requested proposals for construction management of the WTP Flocculation/Sedimentation Basin Improvements Project from Kennedy/Jenks Consultants (KJ), the design engineer for the project, and Inferrera Construction Management Group (ICM). He reviewed both proposals and is recommending that the work be split between ICM and KJ to best meet the needs of the District most cost effectively. ICM will be retained for the day-to-day construction management, inspection and contract administration. KJ will provide office engineering support to review contractor submittals, respond to requests for information relating to the design, provide clarifications, and provide periodic special inspections.

The committee reviewed proposal information and discussed staff's recommendation.

The Engineering Committee recommends consideration of a motion to award a construction management contract to ICM for the amount of $390,640, a construction engineering support contract to Kennedy/Jenks Consultants for the amount of $203,000, and authorize a 15% contingency of $90,000 for a total construction management budget of $683,640 for the WTP Flocculation/Sedimentation Basins 2016 Improvements Project.

3. Hinkle and Kokila Reservoir Condition Assessments Status Report (W & R)

Mr. Durkin informed the committee that he received the Hinkle and the Kokila Reservoir Condition Assessments Status Reports as discussed at the January 27th board meeting. A copy of each report will be attached to the meeting minutes.

Mr. Durkin reviewed the findings in the reports with the committee. The initial assessments indicate that the reservoir liners and covers are in good condition and they can be expected to last at least another ten years. However, material extraction and testing is recommended to confirm the site assessments. Staff initially considered conducting the material extraction, but based on workload and available resources this work will be contracted out. It is estimated that the cost will be about

$15,000 to complete the material extraction and testing, which is within the budgeted amount.

Mr. Durkin informed the committee that he will report back on the material testing to the committee. He commented that the results will help determine the next steps the District needs to consider to prepare for replacing the reservoirs.

For information only; no action requested.

4. **Los Lagos Tank Recoating Project Status Update (R)**
Mr. Durkin informed the committee that the Los Lagos Tank Recoating Project is in this year's retail CIP and staff is completing the bid documents. He explained that the project is categorically exempt from CEQA as discussed with the Legal Affairs Committee. However, the project may temporarily impact the neighbors because of potential noise and dust issues. The committee briefly discussed the project.

Mr. Durkin explained that public outreach will be performed for homeowners in the area near the project. In addition, staff will contact the Home Owners Association to discuss the project. In response to Director Rich, Mr. Durkin confirmed the homeowners are in the PCWA service area and are not customers of the District. Director Miller suggested that the Public Information Committee discuss the topic.

For information only; no action requested.

5. GIS (W and R)
Mr. Durkin informed the committee that as the District proceeds with the financial planning and budget process, there is a need to address a Geographical Information System (GIS). He explained that the District currently does not have functional GIS capabilities, even though GIS has been common in the industry for many years. He provided two recent examples where the District was requested to provide GIS data for the Water Management and Reliability Study and information for the proposed water transfer with Santa Clara Valley Water District where we could not provide the information as requested.

Mr. Rob Watson conducted a presentation on SJWD Geographical Information System Improvements. A copy of the presentation will be attached to the meeting minutes. Mr. Watson reviewed how GIS works, its benefits, and its uses. He explained how GIS works in collaboration with other agencies. In addition, he explained that SJWD staff currently performs GIS-related tasks using manual methods. He reviewed the current and long-term GIS needs of the District and explained engineering, field services, and customer services department needs for GIS data.

Mr. Durkin recommends that the District budget for a needs assessment performed by an outside consultant. He explained that the District's approach should be to contract with a specialized consultant who can assess SJWD's specific needs and potential benefits from GIS, and then identify solutions, including software, hardware, data input/conversion, staffing needs to implement, and ongoing O&M requirements (staffing & budget). He informed the committee that it is estimated to

cost approximately $20K - $30K and two months to complete the needs assessment. In addition, full GIS implementation is estimated to cost approximately $150,000 and take about nine months before operational.

The committee discussed the District's need for GIS, staffing concerns, and possible cost savings. Director Rich suggested that staff look at what other agencies are using for GIS. The committee agreed that a needs assessment should be performed and agreed that staff should place the needs assessment costs into the financial plan and budget for consideration by the Board. Mr. Durkin informed the committee that an RFP for the needs assessment would not be issued until after July, and only if it is included in the FY16-17 budget.

For information only; no action requested.

6. Other Engineering Matters

6.1 Next Meeting Date
The next committee meeting will be scheduled when needed.

7. Public Comment

There were no public comments.

The meeting was adjourned at 5:05 p.m.

R K FROBEL & ASSOCIATES
Consulting Engineers

Mr. Keith B. Durkin, P.E. January 15, 2016
Assistant General Manager
San Juan Water District
9935 Auburn Folsom Road
Granite Bay, CA 95746

RE: San Juan Water District, Granite Bay, CA
Hinkle Reservoir Floating Cover, Bottom Liner and Baffle
Site Inspection and Recommendations

Dear Mr. Durkin:

At the request of the San Juan Water District, a site visitation and floating cover inspection/evaluation of the Hinkle Reservoir was completed on December 29 and 30, 2015. In addition, observations of ROV inspection of the bottom liner system and baffle was completed and discussed with district personnel. The following is a summary of the site observations and recommendations related to the Hypalon floating cover, Bottom Liner System and Baffle Curtain.

Background

The Hinkle Reservoir floating cover, baffle and bottom lining system is now 35 years old. We inspected the cover system in 1999 and found it to be in good condition at that time and projected a minimum of 5 to 10 years additional life based on laboratory testing. The cover is composed of 45 mil thick Chlorosulfonated Polyethylene Reinforced (CSPE-R) or Hypalon. It consists of 5 plys, 2 plys of which are scrim reinforcement that are each 8 x 8, 250 denier leno weave polyester. The top surface ply is tan in color and the underside is black. It is understood that the bottom liner system and baffle are both 36 mil thick scrim reinforced Hypalon with a single ply 8 x 8, 250 denier scrim reinforcement. All materials were manufactured by Burke Rubber Company, San Jose, CA and then prefabricated into panels and installed on the reservoir. The original design engineer was Clendenen & Associates, Inc., Auburn, CA. The floating cover design is a tensioned plate Burke cover with defined sumps and rainwater collection by gravity drains from the sumps through the reservoir bottom.

Upon arrival at the San Juan Water District, I met with Mr. Keith Durkin, Assistant General Manager, Mr. Greg Turner, Water Treatment Plant Superintendent and Andrew Pierson, Engineering Services. We briefly discussed prior history, inspections and maintenance as well as observed potential problem areas. Underwater inspections by ROV were discussed and copies of two previous inspections were provided for review. Due to operations, the reservoir could not be drawn down for inspection of the liner at the top of slopes. The following evaluation is based on the December 29 visual inspection

and review of documentation and ROV video inspections under the cover. Photos are included in attachment 1 and are referenced in the following sections.

Floating Cover Evaluation

During the December 29 inspection, the reservoir was in operation and reservoir level was near capacity. The overall condition of the 45 mil tan Hypalon cover was again observed to be very good in consideration of 35 years of service. The upper tan surface exhibits discoloration and surface oxidation as well as surface crazing (minute cracking) which are aging characteristics typical of Hypalon. Additionally, the material is stiffer and the surface is harder than when new due to the fact that the Hypalon polymer continues to cross-link and increases in polymer strength with age. There are no surface areas that were observed to be deteriorating and no evidence of scrim surfacing due to wear or age. No major wrinkled areas within the plates of the cover were noticeable other than minor distortion/wrinkling in areas of ponded water. Areas of ponding water also are evident by a darker discoloration of the Hypalon surface due primary to standing water over time. Figure 1 is a general view of the Hinkle cover which shows standing water and discoloration due to ponding water

The upper perimeter mechanical connection is still in very good condition. There were no missing nuts or damage noted. The Sika Flex 1a caulk although exhibiting crazing and minor cracking is still in good condition with no delamination noted (Figure 2). The caulk may require replacement in 2 to 5 years and thus should be inspected routinely for disbonding and major cracking.

The minor patches over damaged areas that were observed around the perimeter and out on to the cover were in excellent condition with no disbonding or edge curl. All patches include requisite rounded corners or are circular and attached to the cover with bodied solvent chemical fusion methods in accordance with instructions in the maintenance manual (recommended Burke procedures).

Top of slope air vents although in good condition do not represent current technology and state of practice in vents and should be replaced with vents that do not allow surface water intrusion when the valve is inoperable. Additionally, air entrapped under the cover may not be venting due to inoperative vents. Figure 3 illustrates the current vent detail.

Factory fabricated seams and field seams are in very good condition with no evidence of delamination or stress. Although there is some distortion or channels formed over the water surface along the seams (probably due to standing water and temperature differentials), the seams on the upper slopes are flat with no distortion. Factory seams are a minimum 2.0 inch scrim to scrim thermal fusion bond and field seams are 2.5 to 3.0 inch width chemical fusion bonds. There was no blistering or loose edges noted. Figure 4 illustrates a typical seam that also shows accumulation of windblown dirt and sediments

The 12 - 30 x 36 inch hatch covers and associated float support system are in good condition and still functional. However, the old fiberglass covers are crazing or cracking

and should be replaced. The current hatch covers also are not vented. Figure 5 illustrates a typical hatch cover with supporting floatation.

The tensioned plate design and defined sump system appear to be functional and positioned as originally designed. There was some standing water on the cover due to recent rains, however the sumps appear to be draining at the time of inspection. Some sumps appear to have standing water which should be addressed during the next cleaning operation. Standing water may indicate blockage in the header drain pipes or exit piping. Underwater inspection videos for 2014 and 2015 show that the drain lines are not damaged and are properly connected to the bottom of the sumps and bottom of the reservoir. However, blockage could occur at the sump/drain line connection. Figure 6 illustrates a typical sump line with standing water.

The SE corner of the reservoir does have some damage to the ballast tubes and floats at the upper slope/sump line connection. This area is also distorted and should be repaired and re-aligned if at all possible (see Figure 7 and 8). Although considered minor and not functionally detrimental, the upper slope/sump intersection areas were observed to be distorted due primarily to wind movement over time. These areas require routine inspection and repair of damaged stress areas on floats.

Accumulated small debris, windblown silt, etc.was noted to be collecting in the seam channels that have formed on the reservoir surface. Additionally, discreet areas of the cover were observed to have wind blown silt and debris. Areas that routinely collect standing water are notably discolored to a dark surface color. These areas should be addressed during cleaning and detailed inspection. Figure 4 again illustrates areas of accumulated fine wind blown silt and debris.

The large patched areas for test sample location A1, B1, C1 and D1 taken in 1999 were identified and inspected. The patches and edge cover strips are still very tightly bonded to the cover and with no detrimental affects on cover operation. Figure 9 illustrates one of the sample areas and fully adhered patch with cover strips. Additional samples can be taken from the same seam area for testing as long as current repair/patching procedures are used. The new samples will be identified as A2, B2, C2 and D2.

The outlet structure and reconstructed float/ballast system with sump pumps appears to be operating successfully and is in very good condition at the time of inspection (Figure 10). Underwater ROV videos were also reviewed and no damage or areas of concern were noted at the outlet structure.

SUMMARY OBSERVATIONS AND RECOMMENDATIONS

Based on the December 29 inspection, document and video reviews and discussions with San Juan Water District personnel, the following are summary observations and recommendations:

1. General Condition. In consideration of over 35 years of service and exposure to the elements, the Hinkle floating cover is still in good condition and operating as originally designed. Dependent on test results from new samples extracted from the cover, the current Hypalon material, seams, mechanical connections may well last another 10 years.

Recommendation: Extract new samples from the cover at the approximate location and seam that samples were taken in 1999. Test results on the current physical/mechanical condition of the Hypalon and seams can be evaluated and compared to those taken 15 years ago as well as original data.

Test Program.

New samples should be taken approximately 3 ft from the old sample locations and along the same seam. Sampling was discussed with Mr. Greg Turner and locations were identified. Size of sample should be 20 inches in width and 36 inches in length with the seam centered along the 36 inch length. Samples will be numbered A2, B2, C2 and D2 to identify the same quadrants from which they are extracted. Each sample shall be cut into two equal pieces, each 20 inches in width by 18 inches in length. One sample shall be forwarded to Burke Industries, San Jose, CA for testing and the other to TRI Environmental Laboratory, Anaheim, CA. All samples should be identified by number, date taken and location on the reservoir. Mark Machine Direction (MD) in direction of seam.

The following tests should be carried out on the samples:

Thickness	ASTM D 1593/5199	5 replicates
Water Absorption	ASTM D 471*	3 replicates
Ply Adhesion	ASTM D 413A	3 replicates MD
Tensile Strength	ASTM D 7004/751**	2 replicates MD & CMD
Tensile Elongation	ASTM D 7004/751**	2 replicates MD & CMD
Seam Shear Strength	ASTM D 751/Grab	2 replicates
Hydrostatic Burst	ASTM D 751/NSF Mod	4 replicates
Surface Cracking	Photomicrograph	1 @ 30X
Cut Edge Section	Photomicrograph	1 @ 30X

* Measure as received moisture content
**Method A Procedure 1

Samples should be properly identified, photographed and packaged flat – protected in heavy plastic for shipment to the laboratories. Samples must be packaged immediately after extraction and protected in bags until specimen cutting and testing. Actual specimen layout and instructions for each lab will be coordinated by R. K. Frobel.

2. Cover Cleaning. The Hypalon cover is in generally clean condition with windblown debris noted to have collected at field seam locations and discreet areas on the cover. The current maintenance program is acceptable and repairs that were observed are in

excellent condition. Yearly underwater ROV inspections should be continued, especially as the cover, baffle and liner continue to age.

Recommendation: The cover is due for a detailed inspection and cleaning as well as repairs as needed by a specialty contractor experienced in floating covers. This could be completed at the same time as samples are taken and sample areas are repaired. The cover cleaning should include all sump lines, header pipes and connections.

3. Repair Patches. The Hypalon cover repair procedures appear to be excellent given the age of the cover. Patches that were inspected and tested for adhesion could not be uplifted or delaminated. No loose patches were evident. This is a reflection on excellent maintenance procedures by the San Juan Water District

4. Rainwater Sumps. As indicated in the attached photos, several of the rainwater collection sumps were noted to be full of water. Some minor algae growth was noted.

Recommendation: During the cleaning and inspection, the rainwater collection sumps will have to be cleaned, especially the header pipes which may have become clogged. Additionally, although sumps are draining, the standing water at the time of inspection indicates slow response time. Attachments of underwater drain lines to sumps must be inspected for blockage as well.

5. Top of Slope Air Vents. The original one-way air vents were inspected and all are intact. However, these vents are not state of practice in design and spacing is less than current design methods.

Recommendation: Replace current vents with prefabricated half tube PVC vents to prevent rainwater intrusion and comply with current industry standards. Additionally, the new vents should be spaced 50 ft OC around the upper slope perimeter.

6. Outlet Structure. The reconstructed outlet cover attachment with sump pumps is operating as re-designed and installed by Layfield. This was a much needed addition to the cover system and is functioning as re-designed.

7. Access Hatches. The 12 access hatches and supporting float system are in good condition with the exception of the old fiberglass dome which is cracking/crazing and in need of replacement. The hatches are not vented as is state of practice for current cover design.

Recommendation: Replace the hatch covers with new custom fabricated metal covers with vents and seals to hatch body.

8. Bottom Lining System. The bottom Hypalon lining system was reviewed by ROV videos where possible. No obvious holes or defects were noted and only one open seam area was reported in 2010 and repaired by underwater epoxy patch in 2011. It is not evident from discussions with San Juan personnel or review of ROV videos that the

seams or material are deteriorating. The open seam was discovered during cleaning operations and may have been damaged at that time. Sediment accumulation was noted on many areas of the lining system and reportedly varies from a dusting to approximately 8 inches. Sediments are removed when accumulations are noticeable.

Recommendation: The bottom lining system does not show significant stress or distress and deteriorated areas have not been observed. It is not recommended to take a sample for testing at this time. Additionally, it is recommended that sediment accumulation not be removed down to the liner. Sediment should be allowed to accumulate to a 4 to 6 inch depth and left in place to protect the liner for its remaining life. The next underwater ROV inspection (2016) should concentrate on viewing as much of the liner system as practical in addition to routine inspection.

9. Baffle Curtain. The Baffle Curtain is in fair condition and was reviewed by ROV video for both 2014 and 2015 inspections. Although damage and some possible delamination has occurred over the years, the Baffle Curtain is still functional and firmly attached to the bottom of the N-S sump line. Repairs are acceptable using the current plastic batten bars and bolts. Only one outstanding hole was noted in the videos (2015 ROV Report). The bottom of the Baffle Curtain is held in place with continuous sand tube weights which appears to be in good condition and maintaining alignment.

Recommendation: Continue yearly detailed inspection of Baffle Curtain by ROV and provide as needed repairs by mechanical batten bars and bolts. An approximate 12 x 18 in. hole is in need of repair as soon as practical (observed on 2015 ROV video)

This concludes the report on the San Juan Water District Hinkle Reservoir Cover, Liner and Baffle evaluation and recommendations. If you have any questions, please give me a call at 303-679-0285 or 720-289-0300.

Sincerely Yours,

R K Frobel

Ronald K. Frobel, MSCE, PE

Attachment 1 – Site Photographs

ATTACHMENT 1

SITE INSPECTION PHOTOGRAPHS

Figure 1. General View of thee Hinkle Cover showing standing water, some Discoloration, windblown silt/debris accumulation and minor air entrapment

Figure 2. Photo showing typical condition of the perimeter attachment.

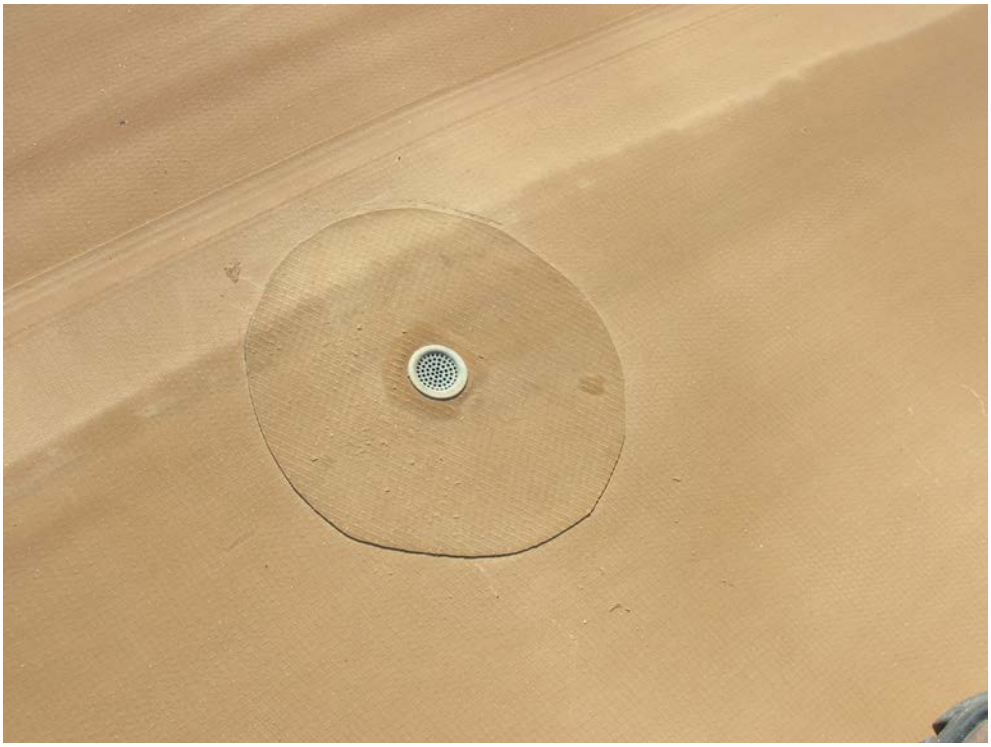


Figure 3. Photo showing typical current air vent detail with one-way valve.

Figure 4. Typical factory seam over water with accumulated windblown dirt and debris which should be removed during the next cleaning operation.

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Figure 5. Photo showing one of 12 typical hatches on the Hinkle Cover with deteriorating fiberglass dome lids and supporting floatation system.

Figure 6. Photo at NW corner showing both standing water on cover and in sump line. Note that cover water is not getting to the sump and requires additional surface ballast or replacement of PVC tubes with 6 inch sand tubes.

Figure 7. Photo showing the distortion, misalignment and damage at the SE Corner.

Figure 8. SE corner damage and repairs required due to high stress concentration.

Figure 9. Photo showing original patch over 1999 sample extraction (B-1)


Figure 10. Outlet Structure with re-designed and functioning float/ballast system.

R K FROBEL & ASSOCIATES
Consulting Engineers

Mr. Keith B. Durkin, P.E. January 20, 2016
Assistant General Manager
San Juan Water District
9935 Auburn Folsom Road
Granite Bay, CA 95746

RE: San Juan Water District, Granite Bay, CA
Kokila Reservoir Floating Cover
Site Inspection and Recommendations

Dear Mr. Durkin:

At the request of the San Juan Water District, a site visitation and floating cover inspection/evaluation of the Kokila Reservoir Floating Cover was completed on December 29, 2015. In addition, observations of ROV inspection of the bottom liner system and cover performed by Above & Below the H2O on June 3, 2015 was completed.. The following is a summary of the site observations and recommendations related to the Hypalon floating cover.

Background

The Kokila Reservoir floating cover and bottom lining system was installed in 1983 and is now approximately 32 years old. The cover is composed of 45 mil thick M-153 Chlorosulfonated Polyethylene Reinforced (CSPE-R) or Hypalon manufactured by Burke Industries, San Jose, CA. It consists of 5 plys, 2 plys of which are scrim reinforcement that are each 8 x 8, 250 denier leno weave polyester. The top surface ply is tan in color and the underside is black. It is further understood that the bottom liner system is 30 mil thick scrim reinforced Hypalon M-160 with a single ply 8 x 8, 250 denier scrim reinforcement All materials were manufactured by Burke Rubber Company, San Jose, CA and then prefabricated into panels and installed on the reservoir. The original design engineer was Clendenen & Associates, Inc., Auburn, CA (1983 Contract No. 8301). The floating cover design is a tensioned plate Burke cover with 6 defined sumps leading from the “corners” of the irregular shaped 6 sided 4.5 million gallon reservoir to central sumps for rainwater collection. Rainwater collection is by gravity drains from the sumps through the reservoir bottom. The bottom and sides of the reservoir is composed of wire reinforced shotcrete overlain with the 30 mil Hypalon. The depth is 35 ft from top of berm to bottom and slopes are very steep with sections at 1:1 and 0.5:1.

Upon arrival at the San Juan Water District, I met with Mr. Keith Durkin, Assistant General Manager, Mr. Greg Turner, Water Treatment Plant Superintendent and Andrew Pierson, Engineering Services. We briefly discussed prior history, inspections and maintenance as well as observed potential problem areas. Underwater inspections by

ROV were discussed and copies of previous inspections by Above & Below the H20 (June 3, 2015) and Layfield (February 11, 2008) were provided for review.. The following evaluation is based on the December 29 visual inspection and review of documentation and ROV video inspections under the cover. Photos are included in attachment 1 and are referenced in the following sections.

Kokila Floating Cover Evaluation

During the December 29 inspection, the reservoir was in operation and reservoir level was approximately 10 ft below capacity. The overall condition of the 45 mil tan Hypalon cover was observed to be fair to good in consideration of 32 years of service. The upper tan surface exhibits discoloration and surface oxidation as well as surface crazing (minute cracking) which are aging characteristics typical of Hypalon. Additionally, as with the Hinkle cover, the material is stiffer and the surface is harder than when new due to the fact that the Hypalon polymer continues to cross-link and increases in polymer strength with age. There are no surface areas that were observed to be deteriorating and no evidence of scrim surfacing due to wear or age. However, surface oxidation is much more pronounced than at Hinkle which indicates that the surface polymer is breaking down due to UV and oxidation. Some wrinkled areas within the plates of the cover were noticeable, especially in areas of ponded water. Areas of ponding water also are evident by a darker discoloration of the Hypalon surface due primarily to standing water over time. Algae growth was also observed. Figure 1 is a general view of the Kokila cover which shows some standing water and discoloration due to ponding water. Also evident is the surface mounted floats whereas the Hinkle Reservoir floats were attached under the cover.

The upper perimeter mechanical connection is still in very good condition as shown in Figure 2. There were no missing nuts or damage noted. The upper perimeter concrete curb was added after the 2008 inspection, cleaning and repair and effectively prevents the gravel road surface from entering the cover area.

The repair patches over damaged areas that were observed around the perimeter and out on to the cover were in fair condition with obvious disbonding or edge curl on many patches (Figures 3 and 4). All patches will have to be inspected and probably replaced with requisite rounded corners and attached to the cover with bodied solvent chemical fusion methods in accordance with instructions in the maintenance manual (recommended Burke procedures). The previous repair quality on this cover or current maintenance is less than observed on the Hinkle cover.

Top of slope air vents are relatively new and in good condition and represent current technology and state of practice in vents in that they do not allow surface water intrusion. Spacing appears to be approximately every 25 to 30 ft around the perimeter. Some of the vents were being used as “tie downs” for surface ballast tubes which should not be allowed due to potential for damage on the cover. Figure 5 illustrates a typical slope air vent.

Factory fabricated seams and field seams are in very good condition with no evidence of delamination or stress at the top of slope. Although there is some distortion or channels formed over the water surface along the seams similar to those observed on the Hinkle cover, the seams on the upper slopes are flat with no distortion. Factory seams are a minimum 2.0 inch scrim to scrim thermal fusion bond and field seams are 2.5 to 3.0 inch width chemical fusion bonds. There was no blistering or loose edges noted.

There is a single "T" vent on the cover surface that was a repair and retrofit in 2008 as shown in Figure 6. The vent and supporting floats appear to be in good condition

The single 36 X 36 inch aluminum hatch cover and associated float support system are reportedly in good condition and still functional. The hatch is vented and in general accordance with AWWA standards and state-of-practice in current cover design. It is understood that the hatch cover and support system were a retrofit in 2008. Figure 7 illustrates the hatch cover with supporting floatation.

Although extensive as regards rainwater sump linear dimensions, the tensioned plate design and defined sump system appear to be functional and positioned as originally designed. There was some minor accumulation of standing water on the cover due to recent rains, however the sumps appear to be draining well at the time of inspection. . Underwater inspection videos for 2015 show that the drain lines are not damaged and are properly connected to the bottom of the sumps and bottom of the reservoir. However, blockage could occur at the sump/drain line connection. It is understood that the cover system underwent extensive cleaning and repairs in 2008 which included the sump lines.
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The North slope corners of the reservoir have experienced some damage to the floats at the upper slope/sump line connection primarily due to the very steep side slopes and bending distortion that occurs when the level drops. This area should be repaired and re-aligned if at all possible (see Figures 8 and 9). Although considered minor and not functionally detrimental, the upper slope/sump intersection areas were observed to be distorted due primarily to wind movement over time. These areas require routine inspection and repair of damaged stress areas on floats. Figure 10 shows algae accumulation due to ponded water adjacent to the floats

One section of the cover in the NW has experienced extreme distortion and wrinkling and should be repaired on the next cleaning. Figure 11 shows the area of concern. This area is definitely not tensioned and may require an additional float/sump line to tighten the area and allow water to drain. Figure 12 illustrates extensive areas of discoloration due to standing waste and accumulation of windblown silts and debris. These areas should be thoroughly cleaned and washed down.

The overflow weir cover connections and condition appear to be in good condition with no holes or stress noted.

SUMMARY OBSERVATIONS AND RECOMMENDATIONS

Based on the December 29 inspection, document and video reviews and discussions with San Juan Water District personnel, the following are summary observations and recommendations:

1. General Condition. In consideration of over 32 years of service and exposure to the elements, the Kokila floating cover is still in relatively good condition and operating as originally designed. Maintenance is less than adequate and repairs that were observed are in poor condition. In order to evaluate life expectancy of the cover, a test program should be undertaken similar to Hinkle and using the same test methods and sample sizes.

Recommendation: Extract samples from the cover at 3 locations around the perimeter that are accessible in consideration of the very steep slopes. It is recommended that samples be taken from the approximate center of the South slope, NW slope and SE slope. Test results on the current physical/mechanical condition of the Hypalon and seams can be evaluated and compared to those taken in 2008 as well as original data. Due to the age and observed poor adhesion of patches, it is further recommended that confirmation of repair procedures used will be effective prior to extracting samples.

Test Program.

Size of sample should be 20 inches in width and 36 inches in length with a factory seam centered along the 36 inch length. Samples will be numbered to identify the slope areas from which they are extracted. Each sample shall be cut into two equal pieces, each 20 inches in width by 18 inches in length. One sample shall be forwarded to Burke Industries, San Jose, CA for testing and the other to TRI Environmental Laboratory, Anaheim, CA. All samples should be identified by number, date taken and location on the reservoir. Mark Machine Direction (MD) in direction of seam.

The following tests should be carried out on the samples:

Thickness	ASTM D 1593/5199	5 replicates
Water Absorption	ASTM D 471*	3 replicates
Ply Adhesion	ASTM D 413A	3 replicates MD
Tensile Strength	ASTM D 7004/751**	2 replicates MD & CMD
Tensile Elongation	ASTM D 7004/751**	2 replicates MD & CMD
Seam Shear Strength	ASTM D 751/Grab	2 replicates
Hydrostatic Burst	ASTM D 751/NSF Mod	4 replicates
Surface Cracking	Photomicrograph	1 @ 30X
Cut Edge Section	Photomicrograph	1 @ 30X

* Measure as received moisture content
**Method A Procedure 1

Samples should be properly identified, photographed and packaged flat – protected in heavy plastic for shipment to the laboratories. Samples must be packaged immediately after extraction and protected in bags until specimen cutting and testing. Actual specimen layout and instructions for each lab will be coordinated by R. K. Frobel.

2. Cover Cleaning. The Hypalon cover is in fair condition with windblown debris noted to have collected at discreet areas on the cover. Additionally, extensive discoloration due to standing water should be addressed. Surface oxidation is becoming more advanced than Hinkle and thus repairs may be difficult. The current maintenance program is less than adequate and repairs that were observed are in fair to poor condition. Yearly underwater ROV inspections should be continued, especially as the cover and liner continue to age.

Recommendation: The cover is due for a detailed inspection and cleaning as well as repairs to cover and floats by a specialty contractor experienced in floating covers. This could be completed at the same time as samples are taken and sample areas are repaired. The cover cleaning should include all sump lines, header pipes and connections.

3. Repair Patches. The Hypalon cover repair procedures are less than adequate. Patches that were accessible were inspected and tested for adhesion and could be uplifted or delaminated. Loose patches were evident.

Recommendation: During the next inspection, repair and cleaning, all patches should be removed as determined on site and repaired using Burke Industries recommended procedures which should have been the same as used on Hinkle. However, patch delamination may be an indication of advanced ageing/surface deterioration.

4. Rainwater Sumps. As indicated in the attached photos, several of the rainwater collection sumps had standing water, although most sump lines were fully drained.

Recommendation: During the cleaning and inspection, the rainwater collection sumps will have to be cleaned, especially the header pipes which may have become clogged. Additionally, although sumps are draining, the standing water at the time of inspection indicates slow response time. Attachments of underwater drain lines to sumps must be inspected for blockage as well.

5. Top of Slope Air Vents. The original one-way air vents were replaced after 2008 with state of practice PVC half tube vents spaced approximately 25 to 30 ft at top of slope around the perimeter.

Recommendation: Remove rope tie-downs attached to the air vents

6. Overflow Structure. The Hypalon cover and attachments at the overflow weir are in good condition with no obvious damage or excessive stress.

7. Access Hatch and Vent. The one access hatch, vent and supporting float system are in good condition and in general accordance with AWWA standards. Additionally, the one cover vent and supporting float system appear to be in good condition. Again, it is understood that the hatch and vent were upgrades during repair and cleaning operations in 2008.

8. Bottom Lining System. Some discrete areas of the bottom Hypalon lining system were reviewed by ROV videos where possible. No obvious holes or defects were noted. It is not evident from discussions with San Juan personnel or review of ROV videos that the seams or material are deteriorating. Sediment accumulation is minor.

Recommendation: Based on limited information, the bottom lining system does not show significant stress or distress and deteriorated areas have not been observed. It is not recommended to take a sample for testing at this time. As with Hinkle and in place of taking samples, the next underwater ROV inspection (2016) should concentrate on viewing as much of the liner system as practical in addition to routine inspection.

This concludes the report on the San Juan Water District Kokila Reservoir Cover evaluation and recommendations. If you have any questions, please give me a call at 303-679-0285 or 720-289-0300.

Sincerely Yours,

R K Frobel

Ronald K. Frobel, MSCE, PE

Attachment 1 – Site Photographs

ATTACHMENT 1

SITE INSPECTION PHOTOGRAPHS

Figure 1. General View of the Kokila Cover showing minor surface water, discoloration, windblown silt/debris as well as surface ballast tubes. Note surface bonded floats

Figure 2. Photo showing typical condition of the perimeter attachment and concrete curb.

Figure 3. Photo showing poorly adhered patch with blistering.

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Figure 4. Photo showing poor quality adhesion and irregular patches.

Figure 5. Photo showing typical prefabricated side slope air vent with ½ PVC tube and hole with screen under the tube.

Figure 6. Photo showing the single “T” vent on the Kokila Cover.

Figure 7. Photo showing the single 36 X 36 inch Hatch with vent and floatation System. Note distorted and wrinkled cover lower left of photo.

Figure 8. Photo illustrating distortion of floats due to steep side slopes and Lower water elevation. These areas are prone to damage due to stress.

Figure 9. Photo showing damage to floats at side slope – North slope.

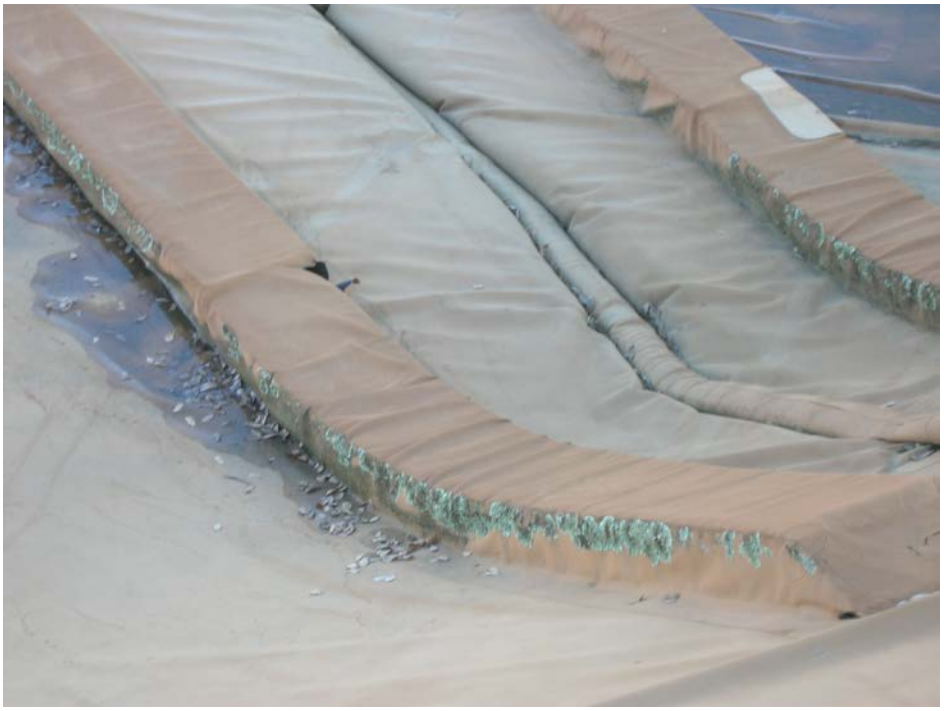


Figure 10. NE slope showing algae accumulation due to standing water.

Figure 11. Excessive distortion and wrinkling of the cover which is impeding the flow of rainwater to the sump as illustrated by the dark coloration to the left of the wrinkle.

Figure 12. SE quadrant section showing very dark discoloration (due to standing water) as well as windblown silt and debris.

SJWD Geographical Information System Improvements

March 2, 2016

San Juan Water

WHAT IS GIS?

- GIS = “Geographical Information System”.
- GIS is an “Integrating Technology”.

WHAT IS GIS?

- GIS is:
  - A powerful data management and analysis tool used to capture, store, manipulate, analyze, edit, manage, integrate, and present all types of spatial and/or geographical data.
  - Integrates diverse sources of information (spatial data) tied to a location on the earth's surface.
  - Allows users to create interactive queries (user-created searches), analyze spatial information, edit data, and present the results of all these operations in a "user friendly" graphical format.

WHAT ARE THE BENEFITS OF GIS?

- Relates information from different sources.
- Adds a visual dimension to the data.
- Assists significantly with decision making.
- Used across multiple departments.
- Saves time and budget:
  - Many of the GIS-related tasks are already performed in multiple departments manually, but with GIS the departments will be able to perform these tasks more efficiently, in colaboration.
- Improved support for regional projects.

WHAT IS GIS USED FOR IN THE WATER INDUSTRY?

- Used for planning, resource allocation, asset management, and collaborations.
- How do our partners and other agencies use it?
  - SSWD, PCWA, and other purveyors, as well as counties and regulatory agencies commonly use GIS, and work together using GIS.
- The implementation is driven by each agency's purpose, or application requirements, and is typically custom-designed for an organization, based on its needs.

WHAT ARE THE CURRENT CAPABILITIES OF SJWD's GIS?

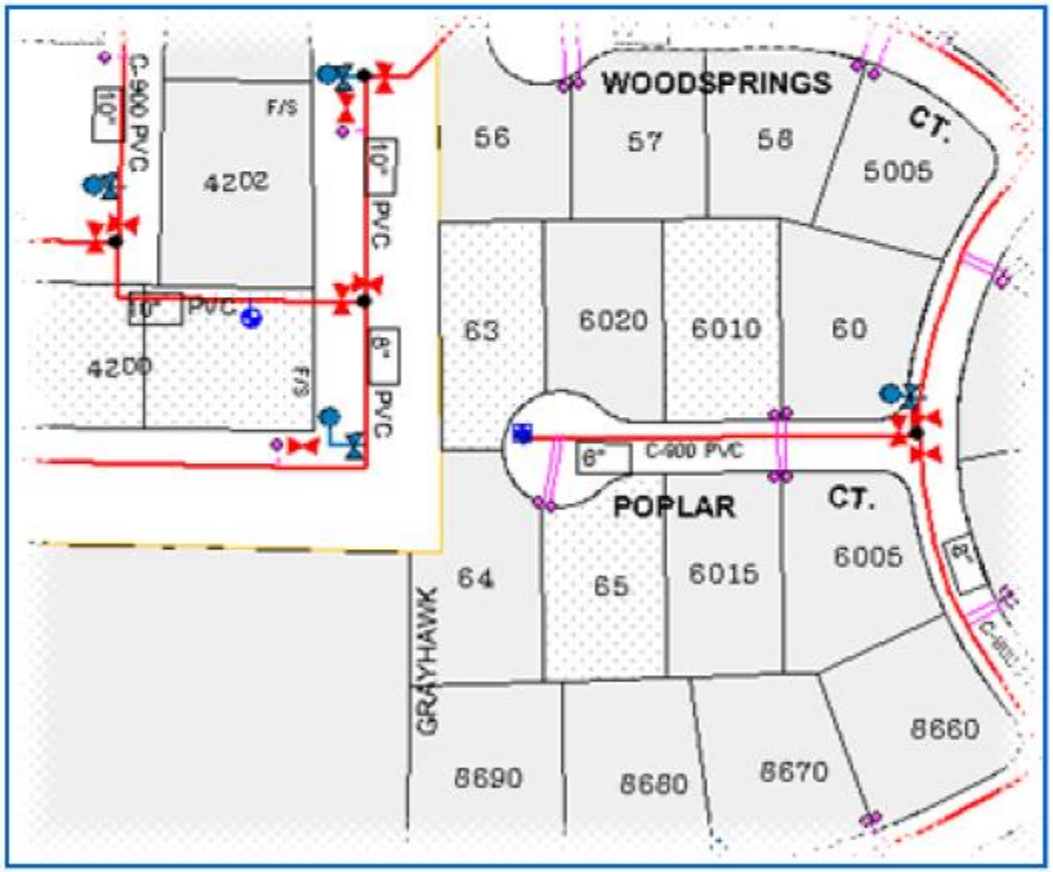
- How does SJWD use it?
  - SJWD currently has no operational GIS at this time.
  - SJWD had a fully functioning GIS from the early 2000's. (Beta version working in 2001)
  - SJWD's prior GIS was discontinued in ±2011.
  - Multiple SJWD departments used the prior GIS.

- SJWD staff currently perform GIS-related tasks using manual methods.

San Juan Water GIS Server

Home | What's New | Help Page | SCADA | Engineering Files | Will Serve | Enter GIS

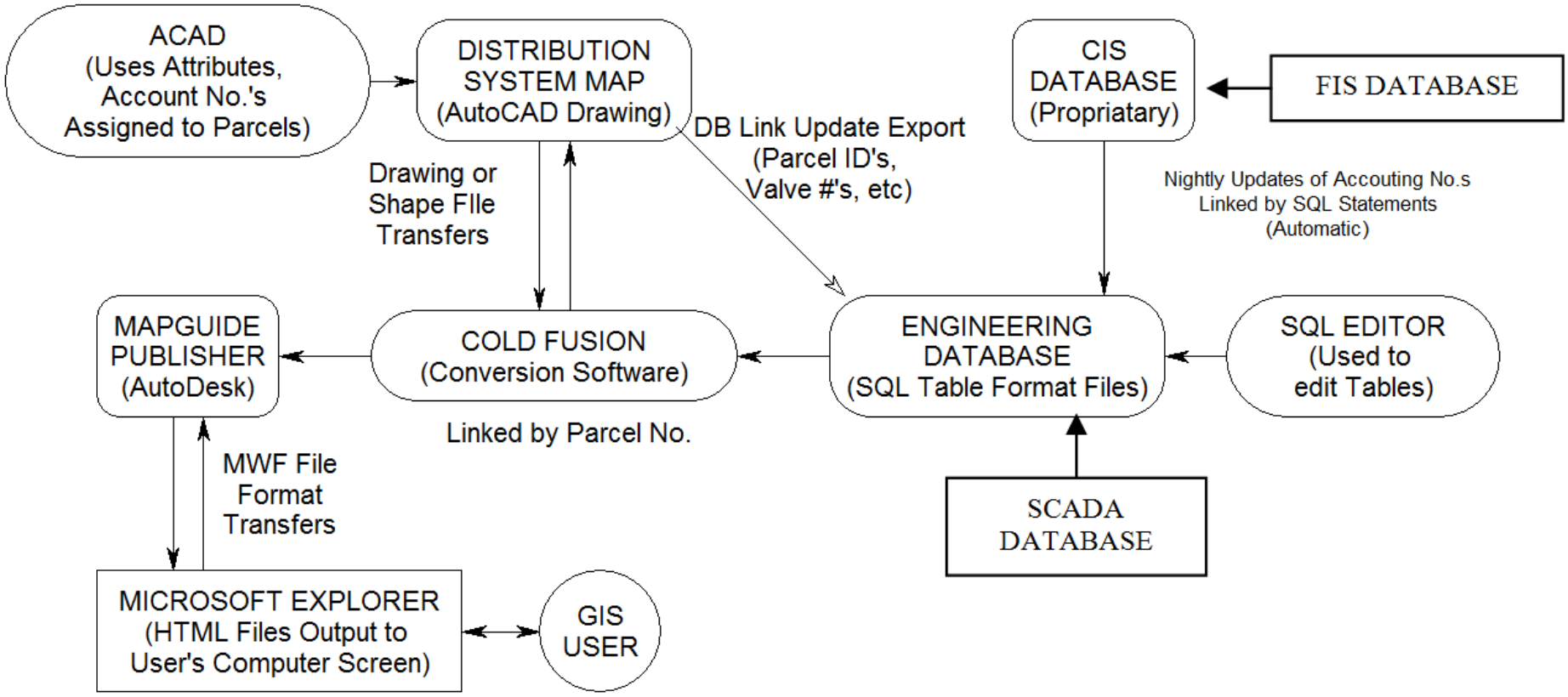
Welcome to the SJWD Geographic Information System.



(Click the Map to Enter the GIS.)

The Engineering department here at San Juan Water has created a web based Mapping application powered by Autodesk Mapguide. This system provides the most up-to-date mapping information of your Retail Area. This system coupled by other information technologies also provides database information to you directly off the map itself. Check out the Help Page for assistance in useing the navigation tools.

SJWD's Original GIS Configuration



WHAT ARE THE IMMEDIATE AND LONG-TERM GIS NEEDS OF SJWD?

- Perform a “Needs Assessment”.
  - The Needs Assessment should initially be high level or general as necessary to define the specific needs and benefits for SJWD.
  - Initially there is a need to take care of general and specific engineering, field services, and customer services department needs.
  - SJWD’s GIS should be able to “talk” to SJWD’s existing CIS and CMMS to have integrated capabilities.

WHAT ARE THE IMMEDIATE AND LONG-TERM GIS NEEDS OF SJWD?

- Examples of Needs:
  - Tracking leaks and other maintenance items.
  - Development projects.
  - New service requests (“Will Serve” Processing)
  - Planning, regulatory, and grants.
  - Integration with CMMS and CIS.
  - Working with Member Agencies and regional partners.
  - Recent information requests, and data needs for the water transfer project.

WHAT ARE THE IMPLEMENTATION REQUIREMENTS FOR SJWD's GIS?

- Consulting support needs.
  - SJWD's approach should be to contract with a specialized consultant who can assess SJWD's specific needs and then identify solutions, including software, hardware, data input/conversion, staffing needs to implement, and ongoing O&M requirements (staffing & budget).
- Prepare a budget level cost estimate.
- Develop a reasonable schedule.

RECOMMENDATIONS

- Staff is recommending
  - Completion of a Needs Assessment
  - Implementation of a new GIS

Cost and Schedule

- Initial Needs Assessment
  - Estimated at between $20K to $30K
  - About 2 months to complete
- GIS Implementation
  - Estimated at about $150K (Shared Wholesale/Retail)
  - About 9 months to be operational

QUESTIONS

DRAFT

Finance Committee Meeting Minutes
San Juan Water District
March 8, 2016
4:00 p.m.

Committee Members: Ted Costa, Director (Chair)
Pam Tobin

District Staff: Shauna Lorance, General Manager
Keith Durkin, Assistant General Manager
Donna Silva, Director of Finance
Tony Barela, Operations Manager
Teri Grant, Board Secretary/Administrative Assistant

Topics: Review and Pay Bills (W & R)
Financial Plan Update (W & R)
FY 2016-17 Budget Update (W)
Quarterly Treasurer's Report – Quarter Ending December 31, 2015
Quarterly Financial Report – Quarter Ending December 31, 2015
Other Finance Matters
Public Comment

1. Review and Pay Bills (W & R)

The committee reviewed the presented bills and claims. Ms. Silva advised the committee that they should be reviewing, for consideration of approval by the Board, any direct reimbursements to the General Manager but need not specifically approve credit card purchases by the General Manager since the Board has previously delegated spending authority to the General Manager. The reviewed bills and claims were found to be in order.

Staff update: the total amount of bills and claims provided for approval for February payables is $1,030,084.37.

Staff recommends a motion for consideration of approval of Resolution 16-03.

2. Financial Plan Update (W & R)

Ms. Silva reported on the financial plans under Agenda Item 3.

3. FY 2016-17 Budget Update (W)

Ms. Silva informed the committee that a Strategic Planning Workshop will be set for the end of April. This workshop will assist in setting the Board's goals for the future as well as be incorporated into the financial plans that The Reed Group will be updating. In addition, assuming he is available, Bob Reed will be presenting the financial plans on May 24th or 25th with a budget workshop planned for May 25th or 26th.

Ms. Silva explained that staff will be preparing both the wholesale and retail budgets at the same time, with the intent to provide the Board with information on what is essential to provide water to customers, what is needed and what is necessary to completely meet the mission of the District and the Board of Director's strategic goals In response to Director Costa's comment, Ms. Silva informed the committee that the Board should discuss the PERS unfunded liability at the Strategic Planning Workshop so that the Board can consider placing payment of the liability in the financial plans and future budgets.

The committee discussed the budget schedule, the Prop. 218 notice and hearing, and the anticipated adoption date of the budget in August. Last year the adoption was November, so improvements are being made. Next year the budget should be on schedule to adopt in June. In addition, the committee discussed considering that the Prop. 218 notice cover 3 years in order to help reduce staff time in preparing several notices as well as being a cost savings measure.

For information only; no action requested.

4. Quarterly Treasurer's Report – Quarter Ending December 31, 2015

Ms. Silva provided the committee with the Quarterly Treasurer's Report for the quarter ending December 31, 2015. A copy of the report was provided in the Board packet and will be attached to the original meeting minutes.

Ms. Silva informed the committee that she will be reviewing the investment portfolio and anticipates investing less money in the Local Agency Investment Fund (LAIF) and more in the PFM Managed Investment Portfolio sometime in the future in order to receive a higher return. In addition, she reported that bank account reconciliations are almost complete for fiscal year 2015-16.

For information only; no action requested.

5. Quarterly Financial Report – Quarter Ending December 31, 2015

Ms. Silva provided the committee with a system generated Income Statement for the period ending December 31, 2015. A copy of the report was provided in the Board packet and will be attached to the original meeting minutes. She explained that the CIP budgets have not been entered into the Tyler accounting system, so those budgets were pulled from the adopted budget documents and not through the accounting system.

Ms. Silva informed the committee that the Income Statement shows the activity for each account and, as the report is reviewed, there are some accounts that will get moved in order to correctly show the activity. She explained that while the project accounting system is operational, staff still needs to enter project budgets and do some clean-up.

Ms. Silva informed the committee that the reports are still a work in progress as they are not configured to provide meaningful summary financial information to the Board. She will be working with Tyler to create system generated reports that meet the needs of the Board. She also advised the committee that staff will work

towards a project report that only shows the current CIP budget, as opposed to multi-year project budgets.

She informed the committee that she will have better information once the mid-year review of the FY 2015-16 budget is completed in the next few weeks. However, she reported that revenue in the retail budget appears to be coming in below the budget while expenses appear to be in alignment with the budget. She will provide the wholesale summary budget information at the Board meeting on Wednesday.

In response to Director Costa's comment, Ms. Silva will refine the reports for the Board in order to provide them with consistent information that they need in a summary format.

For information only; no action requested.

6. Other Finance Matters (W or R)

Ms. Silva reported that she contacted US Bank, as requested by President Tobin, and was informed that two authorized signers on the District bank accounts could withdraw money at a branch location. Having two authorized signers required is supposed to be a control against fraud, as collusion would need to occur to perpetrate fraud against the District. However, even with two authorized signers present, the bank would most likely contact the District to confirm a high dollar transaction since it is highly unlikely that this would occur.

Ms. Silva reminded the committee of the workshop recommendations, some of which require an ordinance change, such as paying bills for purchases already authorized without a Board resolution. The committee recommends that staff come forward with all requested ordinance changes at one time, as soon as they are ready.

In response to Director Costa's comment, Ms. Lorance explained that she mentioned at the workshop that CHWD has provided their board members with tablets to use instead of receiving paper copies of the board packets. She explained that this was for information and not for implementation for SJWD Board. She informed the committee that she is looking into the Board members having District email addresses.

Ms. Lorance updated the Finance Committee on the Honda Pilot coming to the end of its useful life. She will obtain quotes on a comparable car by an American manufacturer, such as the Ford Explorer, and bring to the Finance Committee.

For information only; no action requested.

7. Public Comment

There were no public comments.

The meeting was adjourned at 5:02 p.m.

San Juan Water District

RESOLUTION 16-03
PAYMENT OF BILLS AND CLAIMS

WHEREAS, the Finance Committee of the Board of Directors has reviewed the bills and claims in the amount of $1,030,084.37; and

WHEREAS, the Finance Committee of the Board of Directors has found the bills and claims to be in order.

NOW, THEREFORE, BE IT RESOLVED by the Board of Directors of the San Juan Water District as follows:

1. The bills and claims attached hereto totaling $1,030,084.37 are hereby approved.

2. That the depositary be and the same is hereby authorized to pay said bills and claims in the total sum of $1,030,084.37 of the General Fund Account.

PASSED AND ADOPTED by the Board of Directors of the San Juan Water District on the 9th day of March 2016, by the following vote:

AYES: DIRECTORS:
NOES: DIRECTORS:
ABSENT: DIRECTORS:

PAMELA TOBIN
President, Board of Directors
San Juan Water District

TERI GRANT
Secretary, Board of Directors

March 2016 Payment Register

Paid in Advance:

Check Date:	Vendor:			Amount:
2/29/2016	Payroll			460,170.32
3/7/2016	Bureau of Reclamation-MPR - Water Purchase	EFT	404431	40,288.20
2/23/2016	Bureau of Reclamation-MPR - Water Purchase	EFT	404430	19,416.00
2/19/2016	AFLAC - Payroll	CK	49693	1,154.68
3/7/2016	AFLAC - Payroll	CK	49729	1,154.68
2/23/2016	Galic Disbursing Company - Payroll	CK	49724	400.00
3/7/2016	Galic Disbursing Company - Payroll	CK	49729	400.00
2/19/2016	Franchise Tax Board - Payroll	CK	49694	295.00
2/29/2016	Franchise Tax Board - Payroll	CK	49727	295.00
2/23/2016	CalPERS - Long Term Care	CK	49723	167.39
2/29/2016	ACWA / JPIA - Employee Assistance Program	CK	49726	108.10
2/23/2016	SWRCB - R Potter Exam Fee	CK	49725	65.00
	Total Paid in Advance			**523,914.37**

Checks:

** Checks cut from approved Open Payable List and Pending Payables. **- See Attached Check Register**

Regular Checks	301,315.23
EFT's	163,704.30
Total Check Register	**465,019.53**

Pending Payables:

Invoice No.:	Vendor - Description:	Invoice Amount	Vendor Total
February Statement	US Bank - CalCards	13,187.17	13,187.17
February Invoice	PG&E - February Electricty & Gas Invoice - *Estimate*	9,500.00	9,510.00
March Invoice	PG&E - COTP Invoice - *Estimate*	10.00	
February Invoice	SMUD - Electricty Invoice - *Estimate*	9,000.00	9,000.00
1706406	MWH Americas, Inc. - Professional Services - Jan 2016	6,316.72	6,316.72
AR63497	City of Roseville - Water from other Agencies	3,045.49	3,045.49
February Invoice	MCI - Long Distance	91.09	91.09
	Total Pending Payables		**41,150.47**

REPORTED TO FINANCE COMMITTEE AS PAID AND PAYABLE	**1,030,084.37**
Adjustments: *None*	
TOTAL PAID AND PAYABLE	**1,030,084.37**

Signature_____

Signature_____

Check Register

San Juan Water District, CA

Packet: APPKT00828 - 2016-03-09 March Board Approved AP- MS

By Check Number

Vendor Number	Vendor Name	Payment Date	Payment Type	Discount Amount	Payment Amount	Number
Bank Code: APBNK-APBNK						
03091	Ace Hardware - Auburn Folsom Act#2(	03/09/2016	Regular	0.00	177.64	49730
01041	Afman, Todd R	03/09/2016	Regular	0.00	700.58	49731
01068	Alpha Des Security - Glenn Walker	03/09/2016	Regular	0.00	993.00	49732
01073	Amarjeet Singh Garcha	03/09/2016	Regular	0.00	3,000.00	49733
01026	American River Ace Hardware, Inc.	03/09/2016	Regular	0.00	108.80	49734
02463	AnswerNet	03/09/2016	Regular	0.00	192.60	49735
01027	Association of California Water Agenci	03/09/2016	Regular	0.00	1,000.00	49736
01138	AT&T Mobility II LLC	03/09/2016	Regular	0.00	61.51	49737
02617	Barela, Tony	03/09/2016	Regular	0.00	400.00	49738
03283	Bauer Compressors, Inc	03/09/2016	Regular	0.00	6,625.36	49739
03316	Brown, Lisa	03/09/2016	Regular	0.00	39.20	49740
01250	C & D Contractors, Inc.	03/09/2016	Regular	0.00	45,262.10	49741
01372	City of Folsom	03/09/2016	Regular	0.00	58.24	49742
02214	County of Placer Engineering & Survey	03/09/2016	Regular	0.00	234.00	49743
01423	County of Sacramento	03/09/2016	Regular	0.00	365.75	49744
03318	Credit Bureau of Placer County, Inc.	03/09/2016	Regular	0.00	160.04	49745
02616	Darr, Toni	03/09/2016	Regular	0.00	341.80	49746
03336	Daulton, Donna	03/09/2016	Regular	0.00	4.67	49747
01494	Dewey Services Inc.	03/09/2016	Regular	0.00	82.00	49748
01055	Divers, Alan Richard	03/09/2016	Regular	0.00	140.00	49749
01505	DMV Renewal	03/09/2016	Regular	0.00	114.00	49750
03338	EcoLandscape California	03/09/2016	Regular	0.00	950.00	49751
03335	EMS, LP	03/09/2016	Regular	0.00	81.76	49752
01609	Federal Express Corporation	03/09/2016	Regular	0.00	33.62	49753
01634	Folsom Lake Ford, Inc.	03/09/2016	Regular	0.00	395.80	49754
01659	Gary Webb Trucking	03/09/2016	Regular	0.00	339.00	49755
01681	Golden State Flow Measurements, Inc	03/09/2016	Regular	0.00	462.21	49756
02567	Grant, Teri	03/09/2016	Regular	0.00	43.20	49757
03330	Harris, Mark	03/09/2016	Regular	0.00	94.00	49758
01736	Hasler/MailFinance/Neopost	03/09/2016	Regular	0.00	490.27	49759
03235	HD Supply Construction Supply LTD	03/09/2016	Regular	0.00	1,680.97	49760
01741	HDR Engineering, Inc.	03/09/2016	Regular	0.00	14,505.03	49761
01835	Hoffman, Jason	03/09/2016	Regular	0.00	184.00	49762
03331	Hudson, Hobart	03/09/2016	Regular	0.00	162.28	49763
01796	Insomniac Productions Inc.	03/09/2016	Regular	0.00	411.73	49764
01775	International Student Tours, Inc.	03/09/2016	Regular	0.00	3,295.00	49765
01890	Johnson Petroleum Construction, Inc.	03/09/2016	Regular	0.00	684.87	49766
03333	Kenney, Grant	03/09/2016	Regular	0.00	80.72	49767
01939	L. N. Curtis & Sons	03/09/2016	Regular	0.00	1,355.88	49768
03300	Meyers Fozi, LLP	03/09/2016	Regular	0.00	275.48	49769
03332	Nelson, Larry	03/09/2016	Regular	0.00	101.08	49770
02320	Nush, Robert	03/09/2016	Regular	0.00	200.00	49771
02131	Office Depot, Inc.	03/09/2016	Regular	0.00	1,796.05	49772
	Void	03/09/2016	Regular	0.00	0.00	49773
	Void	03/09/2016	Regular	0.00	0.00	49774
02150	Pace Supply Corp	03/09/2016	Regular	0.00	791.20	49775
03303	Paulson, Rachael	03/09/2016	Regular	0.00	23.62	49776
03026	PFM Asset Management	03/09/2016	Regular	0.00	1,804.24	49777
02216	Placer County Public Works	03/09/2016	Regular	0.00	75.00	49778
03150	PROFESSIONAL ID CARDS INC	03/09/2016	Regular	0.00	24.35	49779
02283	Recology Auburn Placer	03/09/2016	Regular	0.00	640.70	49780
02223	Rexel Inc (Platt - Rancho Cordova)	03/09/2016	Regular	0.00	120.29	49781
02293	RFI Enterprises, Inc	03/09/2016	Regular	0.00	2,084.02	49782
03334	Riverland Homes	03/09/2016	Regular	0.00	400.00	49783

Vendor Number	Vendor Name	Payment Date	Payment Type	Discount Amount	Payment Amount	Number
02328	Rocklin Windustrial Co	03/09/2016	Regular	0.00	50.02	49784
02361	Sac City Blue, Inc.	03/09/2016	Regular	0.00	368.02	49785
02698	Sacksteder, Victoria L	03/09/2016	Regular	0.00	69.81	49786
02446	Sierra Chemical Co	03/09/2016	Regular	0.00	3,664.57	49787
03267	Silva, Donna	03/09/2016	Regular	0.00	775.74	49788
03337	Simon, Marlene	03/09/2016	Regular	0.00	350.00	49789
02049	Stemple, Mike	03/09/2016	Regular	0.00	108.00	49790
01411	SureWest Telephone	03/09/2016	Regular	0.00	1,602.68	49791
02544	Syblon Reid	03/09/2016	Regular	0.00	173,171.41	49792
02580	The Eidam Corporation	03/09/2016	Regular	0.00	22,907.29	49793
02581	The Ferguson Group, LLC	03/09/2016	Regular	0.00	924.00	49794
02651	United Parcel Service Inc	03/09/2016	Regular	0.00	69.13	49795
03284	Vavrinek, Trine, Day & Co, LLP	03/09/2016	Regular	0.00	910.00	49796
02690	Verizon Wireless	03/09/2016	Regular	0.00	571.17	49797
02700	Viking Shred LLC	03/09/2016	Regular	0.00	75.00	49798
01687	W. W. Grainger, Inc.	03/09/2016	Regular	0.00	938.73	49799
02766	Youngdahl Consulting Group, Inc.	03/09/2016	Regular	0.00	1,112.00	49800
01048	Airgas, Inc	03/09/2016	EFT	0.00	275.78	404432
01081	American Messaging Services, LLC	03/09/2016	EFT	0.00	52.02	404433
01898	Association of California Water Agenci	03/09/2016	EFT	0.00	48,211.00	404434
01199	Bentley Systems, Incorporated	03/09/2016	EFT	0.00	254.00	404435
01232	Brower Mechanical, Inc.	03/09/2016	EFT	0.00	421.00	404436
03221	Chemtrade Chemicals Corporation	03/09/2016	EFT	0.00	8,069.78	404437
01378	Clark Pest Control	03/09/2016	EFT	0.00	1,780.00	404438
01521	DataProse, LLC	03/09/2016	EFT	0.00	9,243.73	404439
01486	Department of Energy	03/09/2016	EFT	0.00	4,919.38	404440
01509	Domenichelli & Associates, Inc.	03/09/2016	EFT	0.00	3,060.00	404441
01589	Eurofins Eaton Analytical, Inc	03/09/2016	EFT	0.00	1,689.00	404442
01611	Ferguson Enterprises, Inc	03/09/2016	EFT	0.00	25.80	404443
01631	Folsom Chevrolet / Geo Inc	03/09/2016	EFT	0.00	589.51	404444
03237	GM Construction & Developers, Inc	03/09/2016	EFT	0.00	241.25	404445
01819	J. Richard Eichman, CPA	03/09/2016	EFT	0.00	254.40	404446
01917	Kennedy/Jenks Consultants, Inc.	03/09/2016	EFT	0.00	61,557.51	404447
01938	Kyle Yates, Inc.	03/09/2016	EFT	0.00	1,308.43	404448
02367	McClatchy Newspapers, Inc.	03/09/2016	EFT	0.00	736.50	404449
02027	Mcmaster-Carr Supply Company	03/09/2016	EFT	0.00	244.72	404450
01472	Mel Dawson, Inc.	03/09/2016	EFT	0.00	2,722.10	404451
03236	Modesto Industrial Electrical Co., Inc.	03/09/2016	EFT	0.00	9,849.00	404452
02069	Motion Industries	03/09/2016	EFT	0.00	90.09	404453
02314	Robert Half International, Inc	03/09/2016	EFT	0.00	3,366.72	404454
02466	Silvers HR, LLC	03/09/2016	EFT	0.00	871.00	404455
02504	Starr Consulting	03/09/2016	EFT	0.00	1,400.00	404456
03269	Surveillance Systems Integration, Inc	03/09/2016	EFT	0.00	147.77	404457
02162	Tobin, Pamela	03/09/2016	EFT	0.00	90.03	404458
02710	Wageworks, Inc	03/09/2016	EFT	0.00	98.00	404459
02730	Western Area Power Admin	03/09/2016	EFT	0.00	2,135.78	404460

Bank Code APBNK Summary

Payment Type	Payable Count	Payment Count	Discount	Payment
Regular Checks	114	69	0.00	301,315.23
Manual Checks	0	0	0.00	0.00
Voided Checks	0	2	0.00	0.00
Bank Drafts	0	0	0.00	0.00
EFT's	49	29	0.00	163,704.30
	163	**100**	**0.00**	**465,019.53**

Fund Summary

Fund	Name	Period	Amount
999	INTERCOMPANY	3/2016	465,019.53
			465,019.53

STAFF REPORT

To: Board of Directors

From: Donna Silva, Director of Finance

Date: March 9, 2016

Subject: Treasurer's Report – Quarter Ending December 31, 2015

RECOMMENDED ACTION
This report is for information only and will be filed with the meeting minutes.

BACKGROUND
The purpose of the treasurer's report is to update the Board and the public on the status of the District's cash balances and investments, and highlight material changes from one period to another. The scope of this report covers the fourth quarter of calendar year 2015, ending December 31, 2015.

The District's investment objectives are established by the Board approved Investment Policy. The Investment Policy is guided and constrained by the California Government Code. The Board periodically reviews and adjusts the Investment Policy to ensure ongoing compliance with the government code and to maximize investment flexibility as permitted. The current Investment Policy has the following objectives for the portfolio:

1. Safety
2. Liquidity
3. Yield

Attached is the quarterly Treasurer's Report for the three months ended December 31, 2015.

At September 30, 2015, the end of the previous quarter, the value of the District's total portfolio was $28.4 million. Since that time, the balance decreased by $4.6 million for an ending balance of $23.8 million as of December 31, 2015. Cash and short-term investments decreased by $3.9 million and long-term investments increased by $701,000. The funds are currently held as follows:

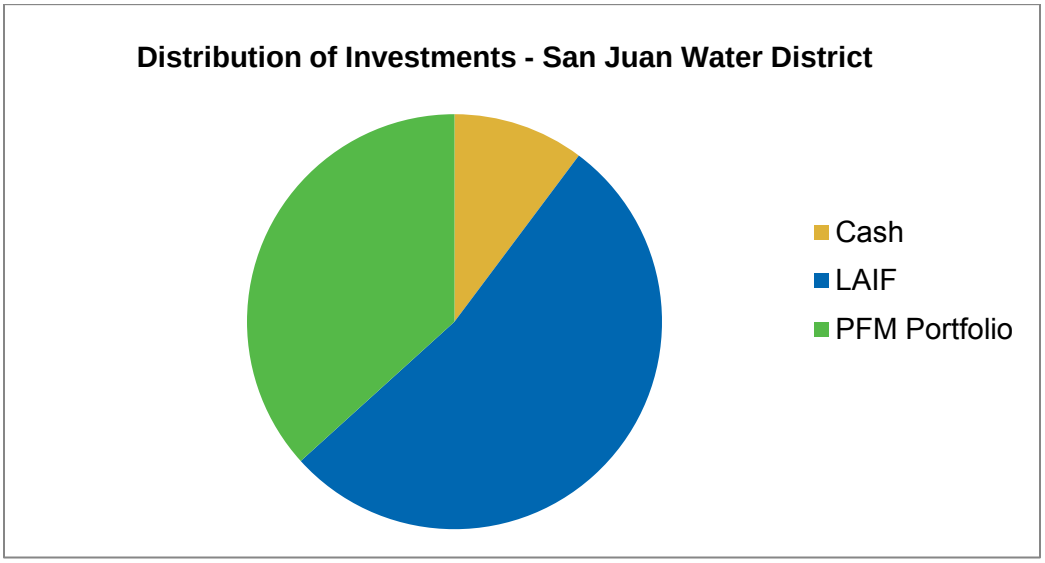
Cash at Banking Institutions	$ 2,431,575
Local Agency Investment Fund (LAIF)	12,612,953
PFM Managed Investment Portfolio	8,728,207
	$ 23,772,735

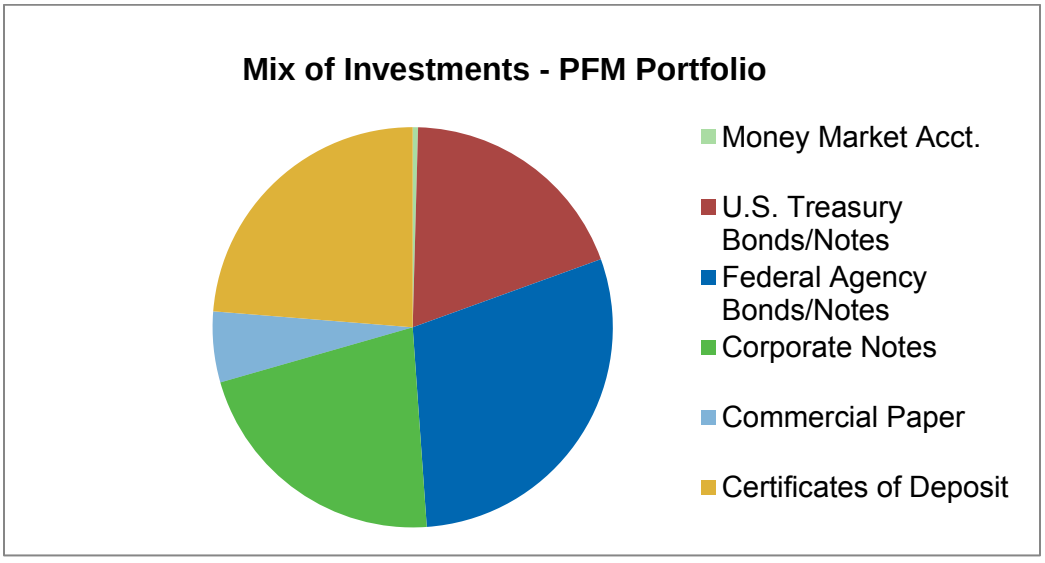
The overall portfolio is diversified with 37% invested in marketable securities, 53% invested in short-term investments that are considered liquid (LAIF) and 10% on deposit with US Bank. Staff, in conjunction with your financial advisors, periodically reviews the

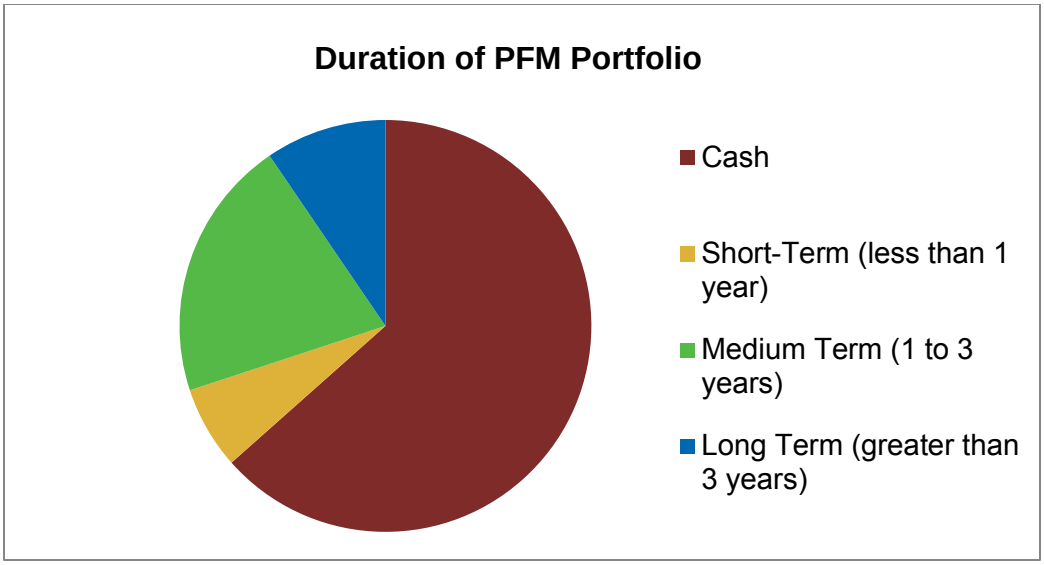
mix of liquid and long-term investments and adjusts the portfolio according to the market conditions and the District's short term cash needs.

All securities held are in conformance with those permitted by the District's Investment Policy. There are sufficient funds to meet the City's expenditure requirements for the next six months.

The distribution, mix and duration of investments is displayed in the following charts:







Interest rates have been at historically low levels. Due to the low interest rate environment, the managed portfolio is concentrated in the medium term duration category. This increases our interest earnings while providing an opportunity to secure higher yield investments when interest rates begin to rise.

The managed portfolio (excludes LAIF and checking accounts) is performing well and continues to outperform the benchmark (Bank of America Merrill Lynch "BAML" 0-50 year Treasury Index) on a current and historical basis.

Total Returns – period ending December 31, 2015

	Duration (years)	Quarter Ending 9/30/2015	Past Year	Since Inception
San Juan Water District	2.18	-.37%	1.15%	1.30%
BAML 0-5 Year Treasury Index	2.14	-.53%	.81%	.95%

San Juan Water District
Treasurer's Reprt
December 31,2015

	Yield %	Par Value	Cost	Current Market Value	Maturity Date
CASH & DEMAND DEPOSITS - US Bank:	na	$ 2,431,575.34	$ 2,431,575.34	$ 2,431,575.34	na
LOCAL AGENCY INVESTMENT FUND (LAIF)	0.4%	$ 12,612,952.68	$ 12,612,952.68	$ 12,612,952.68	na
PFM MONEY MARKET ACCOUNT	na	$ 37,563.32	$ 37,563.32	$ 37,563.32	na
LONG-TERM INVESTMENTS (PFM Investment Portfolio):					
U.S. Treasury Bonds/Notes:					
US Treasury Notes	1.63%	$ 325,000.00	$ 330,789.06	$ 327,031.25	3/31/2019
US Treasury Notes	1.75%	195,000.00	197,940.23	196,317.81	9/30/2019
US Treasury Notes	1.00%	500,000.00	493,437.50	489,492.00	9/30/2019
US Treasury Notes	1.88%	325,000.00	330,649.41	327,272.40	6/30/2020
US Treasury Notes	2.63%	310,000.00	327,316.41	322,024.59	8/15/2020
Federal Agency Bonds/Notes:					
FHLB Notes	0.63%	470,000.00	470,267.90	468,969.75	12/18/2016
FHLB Global Notes (Callable)	0.84%	175,000.00	175,000.00	174,742.40	3/24/2017
FNMA Notes (Ex-Callable)	1.05%	1,000,000.00	1,000,000.00	997,329.00	2/27/2018
FNMA Notes	1.75%	595,000.00	596,511.30	599,558.30	6/20/2019
FNMA Benchmark Notes	1.50%	330,000.00	330,287.10	325,890.84	4/27/2015
Corporate Notes:					
Apple Inc. Corp Note	90.00%	110,000.00	109,924.10	109,659.88	5/12/2017
Chevron Corp Note	1.35%	100,000.00	100,000.00	99,685.30	11/15/2017
Wells Fargo & Company Global Notes	1.50%	1,000,000.00	999,000.00	999,579.37	1/16/2018
IBM Corp Notes	1.13%	225,000.00	224,313.75	223,493.40	2/6/2018
Bank of New York Mellon Corp	1.60%	175,000.00	174,984.25	174,345.50	5/22/2018
CISCO Systems Inc Corp Note	1.65%	185,000.00	184,968.55	185,773.12	6/15/2018
Toyota Motor Credit Corp	1.55%	100,000.00	99,915.00	99,763.80	7/13/2018
Commercial Paper:					
Bank of Tokyo Mitsubishi UFJ	0.00%	500,000.00	498,660.28	498,852.00	5/5/2016
Certificate of Deposit:					
General Capital Retail Bank LT CD	1.35%	250,000.00	250,000.00	250,948.00	8/17/2016
Canadian Imperial Bank NY YCD	1.01%	250,000.00	250,000.00	248,793.75	4/6/2017
BMO Harris Bank NA CD	1.00%	215,000.00	215,000.00	214,413.05	4/24/2017
Nordea Bank Finland NY CD	1.15%	250,000.00	250,000.00	248,575.00	5/26/2017
Toronto Dominion Bank NY YCD	1.24%	250,000.00	250,000.00	249,432.50	6/16/2017
Svenska Handelsbanken NY CD	0.83%	215,000.00	215,000.00	214,874.23	8/24/2017
Bank of Nova Scoita Houston CD	1.56%	215,000.00	215,000.00	214,723.73	11/6/2017
Skandinaviska Enskilda Banken NY CD	1.48%	215,000.00	215,000.00	214,155.00	11/16/2017
HSBC Bank USA NA Floating CD	0.95%	215,000.00	215,000.00	214,947.33	11/17/2017
TOTAL LONG TERM INVESTMENTS		$ 8,695,000.00	$ 8,718,964.84	$ 8,690,643.30	
TOTAL CASH & INVESTMENTS AT 9/30/2015		**$ 23,777,091.34**	**$ 23,801,056.18**	**$ 23,772,734.64**	

Income Statement

San Juan Water District, CA

Group Summary

For Fiscal: 2015-2016 Period Ending: 12/31/2015

Object	Original Total Budget	Current Total Budget	MTD Activity	YTD Activity	Budget Remaining
Fund: 010 - WHOLESALE					
41010 - Service Area Consumption	6,232,583.00	6,232,583.00	535,818.66	3,426,938.72	2,805,644.28
42020 - Non Service Area Service Charges	7,742.00	7,742.00	0.00	0.00	7,742.00
46000 - Rebates	385,000.00	385,000.00	0.00	147,274.12	237,725.88
48000 - Miscellaneous Operational Revenue	156,000.00	156,000.00	0.00	100,000.00	56,000.00
49020 - CTP Cost Share	15,001.00	15,001.00	0.00	0.00	15,001.00
49030 - Cost Recovery	25,000.00	25,000.00	484.20	9,120.95	15,879.05
49900 - Capital Contributions	568,350.00	568,350.00	0.00	480,491.74	87,858.26
50010 - Salaries and Wages	2,122,806.48	2,122,806.48	204,396.41	900,113.53	1,222,692.95
50220 - Benefit - Uniforms	1,936.00	1,936.00	327.06	3,179.92	-1,243.92
50230 - Benefit - Misc	0.00	0.00	88.43	570.27	-570.27
50240 - Recruitment / Return to Work - Screening	0.00	0.00	0.00	863.08	-863.08
50310 - Payroll Taxes - Government and Deductions	180,023.90	180,023.90	12,195.86	60,450.21	119,573.69
50420 - Benefit - Medical	581,808.52	581,808.52	29,479.48	175,280.37	406,528.15
50430 - Benefit - Vision	29,879.32	29,879.32	0.00	457.00	29,422.32
50440 - Workers Compensation	43,414.98	43,414.98	8,568.12	17,574.92	25,840.06
50510 - Benefits - PERS Retirement	327,594.39	327,594.39	19,566.90	87,739.68	239,854.71
50520 - Benefit - Retiree Medical	125,000.00	125,000.00	0.00	30,700.04	94,299.96
50530 - Benefit - OPEB	200,000.00	200,000.00	0.00	0.00	200,000.00
51010 - Water Rights	19,225.00	19,225.00	0.00	19,420.05	-195.05
51020 - Bureau Reclamation CVP Water	60,827.00	60,827.00	0.00	0.00	60,827.00
51040 - PCWA Water	176,025.00	176,025.00	0.00	-34,650.00	210,675.00
51050 - PCWA & CHWD Wheeling Charges	187,817.00	187,817.00	2,216.52	44,072.11	143,744.89
51070 - Bureau Pumping (WAPA Energy)	100,204.00	100,204.00	7,055.16	50,422.38	49,781.62
51080 - Energy Assessments/COT	547.00	547.00	357.20	407.20	139.80
51090 - Water Forum	54,201.00	54,201.00	0.00	3,421.25	50,779.75
51120 - Permitting & Inspections	24,500.00	24,500.00	0.00	0.00	24,500.00
52000 - Materials and Supplies	21,060.00	20,560.00	486.34	5,118.29	15,441.71
52010 - Materials and Supplies - Furniture	5,850.00	5,850.00	0.00	7,314.07	-1,464.07
52020 - Material and Supplies - Safety	17,900.00	17,900.00	907.26	4,917.27	12,982.73
52040 - Materials and Supplies - Tools	15,100.00	15,100.00	326.23	8,286.77	6,813.23
52050 - Materials and Supplies - Office and Printing	26,150.00	26,150.00	852.18	6,944.25	19,205.75
52060 - Materials and Supplies - Postage and Shipping	18,000.00	18,000.00	44.70	2,222.56	15,777.44
52110 - Training - Meetings, Education & Training	35,292.00	35,792.00	3,651.77	16,573.38	19,218.62
52130 - Membership - Dues / Certificates	23,633.00	23,633.00	1,983.50	60,037.00	-36,404.00
52140 - Membership - Conference/Convention	26,000.00	26,000.00	1,908.52	7,827.91	18,172.09
52210 - Telephone	8,280.00	8,280.00	803.93	4,509.11	3,770.89
52410 - Subscriptions	2,540.00	2,540.00	0.00	1,418.00	1,122.00
52510 - Fees - Bank Charges	20,000.00	20,000.00	822.75	5,440.44	14,559.56
52610 - Laboratory	17,000.00	17,000.00	113.15	6,489.18	10,510.82
53110 - Public Outreach - Materials	5,340.00	5,340.00	0.00	0.00	5,340.00
53120 - Public Outreach - Services	99,975.00	99,975.00	6,562.36	61,704.09	38,270.91
53210 - Public Notices	0.00	0.00	0.00	126.00	-126.00
54020 - Hardware / Software Maintenance	65,836.00	65,836.00	765.87	28,350.66	37,485.34
54110 - Professional Services - Legal	130,000.00	130,000.00	13,018.01	81,507.35	48,492.65
54120 - Professional Services - Other	347,000.00	571,000.00	26,923.43	105,086.16	465,913.84
54130 - Professional Services - Temporary Personell Servic	58,240.00	58,240.00	2,930.45	22,220.79	36,019.21
54160 - Professional Services - Fiscal Agent	0.00	0.00	0.00	3,000.00	-3,000.00
54210 - Insurance - Liability & Property	87,000.00	87,000.00	0.00	0.00	87,000.00
55010 - Utilities - Energy Costs	41,050.00	41,050.00	566.79	3,300.55	37,749.45
55020 - Utilities - Disposal	9,000.00	9,000.00	288.32	1,729.92	7,270.08
56010 - Operating Chemicals	250,000.00	250,000.00	18,212.80	157,300.18	92,699.82
56210 - Hazardous Waste Removal	2,000.00	2,000.00	0.00	305.61	1,694.39

Object	Original Total Budget	Current Total Budget	MTD Activity	YTD Activity	Budget Remaining
56310 - Regulatory Compliance / Sampling	36,500.00	36,500.00	817.00	15,234.51	21,265.49
57010 - Lease Expense - Land and Bldg	100.00	100.00	0.00	0.00	100.00
57030 - Lease Expense - Equipment	4,750.00	4,750.00	462.35	2,524.99	2,225.01
57120 - Maintenance - Facility	214,500.00	214,500.00	11,629.79	71,021.56	143,478.44
57130 - Maintenance - Vehicle	10,400.00	10,400.00	0.00	744.76	9,655.24
57140 - Maintenance - Equipment	3,250.00	3,250.00	1,439.61	5,739.43	-2,489.43
57150 - Maintenance - Other	1,828.00	1,828.00	166.10	166.10	1,661.90
57160 - Fuel	4,100.00	4,100.00	668.60	4,355.62	-255.62
57310 - Security Monitoring	3,050.00	3,050.00	532.40	3,205.40	-155.40
58110 - Director - Stippen	32,500.00	32,500.00	1,875.00	8,187.50	24,312.50
58120 - Director - Expenses Direct	2,000.00	2,000.00	0.00	8.49	1,991.51
59010 - Miscellaneous	4,000.00	4,000.00	0.00	182.88	3,817.12
70110 - Communications Site Rental	62,282.00	62,282.00	16,502.53	16,502.53	45,779.47
70120 - COTP SMUD Lease Payment	38,592.00	38,592.00	0.00	0.00	38,592.00
70150 - Investment/Interest Revenue	50,000.00	50,000.00	0.00	-2,221.93	52,221.93
70170 - Taxes & Assessments	995,000.00	995,000.00	0.00	44,862.03	950,137.97
70200 - Tapping & Connection	45,180.00	45,180.00	7,596.88	35,284.94	9,895.06
70210 - COP Pymts from Other Agency	85,661.00	85,661.00	0.00	0.00	85,661.00
74022 - Debt/Interest Expense EDA	0.00	0.00	0.00	919.32	-919.32
74024 - Debt/Interest Expense 2009 COP	1,065,176.00	1,065,176.00	535,168.00	890,226.68	174,949.32
74026 - Debt/Interest Expense 2012 COP	392,843.00	392,843.00	0.00	115,297.00	277,546.00
74040 - Financing Corp Expense	3,250.00	3,250.00	0.00	802.50	2,447.50
74050 - Amortization Expense	0.00	0.00	0.00	-20,382.96	20,382.96
74070 - SGA/RWA/Water Forum	40,566.00	40,566.00	0.00	0.00	40,566.00
74080 - Assessments - Non OP	3,100.00	3,100.00	0.00	1,591.00	1,509.00
74090 - Contributions to Others	0.00	0.00	0.00	2,178,540.20	-2,178,540.20
79999 - Gain/Loss on Sale of Asset	0.00	0.00	52.17	52.17	-52.17
Fund: 010 - WHOLESALE Surplus (Deficit):	**1,276,422.41**	**1,052,422.41**	**-357,723.91**	**-981,811.26**	**2,034,233.67**
Fund: 050 - RETAIL					
40110 - Residential Consumption	7,565,300.00	7,565,300.00	1,072,099.28	3,374,184.13	4,191,115.87
40120 - Commercial Consumption	1,130,500.00	1,130,500.00	149,501.64	513,317.98	617,182.02
40260 - Fire Services Service Charges	26,000.00	26,000.00	4,644.10	13,397.00	12,603.00
40600 - Meter Rental / Permits / Const Wtr	10,000.00	10,000.00	0.00	1,310.00	8,690.00
44060 - Engineering Service Fees	9,000.00	9,000.00	1,040.00	13,240.00	-4,240.00
44130 - Interest - Payment Plans	1,500.00	1,500.00	0.00	167.95	1,332.05
45000 - Grant Revenue	0.00	0.00	0.00	3,700.00	-3,700.00
46000 - Rebates	0.00	0.00	31,631.00	7,213.70	-7,213.70
49020 - CTP Cost Share	0.00	0.00	11,078.99	11,078.99	-11,078.99
49030 - Cost Recovery	10,000.00	10,000.00	284.21	12,068.57	-2,068.57
49060 - Pumping Surcharge	65,000.00	65,000.00	35,089.27	35,089.27	29,910.73
49900 - Capital Contributions	0.00	0.00	0.00	-174,242.52	174,242.52
50010 - Salaries and Wages	3,721,900.00	3,721,900.00	330,020.06	1,332,852.39	2,389,047.61
50015 - Salaries and Wages - Temporary	0.00	0.00	2,749.76	20,908.12	-20,908.12
50220 - Benefit - Uniforms	0.00	0.00	441.15	5,222.20	-5,222.20
50230 - Benefit - Misc	0.00	0.00	65.32	506.58	-506.58
50240 - Recruitment / Return to Work - Screening	0.00	0.00	0.00	1,929.93	-1,929.93
50310 - Payroll Taxes - Government and Deductions	0.00	0.00	19,820.88	98,162.88	-98,162.88
50420 - Benefit - Medical	0.00	0.00	49,332.14	290,468.05	-290,468.05
50430 - Benefit - Vision	0.00	0.00	0.00	1,262.96	-1,262.96
50440 - Workers Compensation	0.00	0.00	10,904.88	22,368.08	-22,368.08
50510 - Benefits - PERS Retirement	0.00	0.00	29,841.04	130,056.94	-130,056.94
50520 - Benefit - Retiree Medical	110,000.00	110,000.00	0.00	30,700.04	79,299.96
50530 - Benefit - OPEB	200,000.00	200,000.00	0.00	0.00	200,000.00
51051 - Purchase Treated Water SJWD WH	1,500,000.00	1,500,000.00	168,994.08	1,125,476.74	374,523.26
51053 - Capital Contribution Expense	550,900.00	550,900.00	0.00	224,899.99	326,000.01
51120 - Permitting & Inspections	29,300.00	29,300.00	2,417.00	12,135.52	17,164.48
52000 - Materials and Supplies	18,600.00	18,600.00	8,746.93	59,210.97	-40,610.97
52010 - Materials and Supplies - Furniture	300.00	300.00	0.00	6,157.19	-5,857.19
52020 - Material and Supplies - Safety	18,200.00	18,200.00	506.31	4,633.68	13,566.32

Object	Original Total Budget	Current Total Budget	MTD Activity	YTD Activity	Budget Remaining
52040 - Materials and Supplies - Tools	14,900.00	14,900.00	657.70	7,349.42	7,550.58
52050 - Materials and Supplies - Office and Printing	27,300.00	27,300.00	1,070.46	8,560.98	18,739.02
52060 - Materials and Supplies - Postage and Shipping	37,800.00	37,800.00	2,684.87	17,206.93	20,593.07
52110 - Training - Meetings, Education & Training	68,900.00	68,900.00	4,225.34	23,289.77	45,610.23
52120 - Training - Education Reimbursement	200.00	200.00	0.00	113.68	86.32
52130 - Membership - Dues / Certificates	47,300.00	47,300.00	51.50	52,228.86	-4,928.86
52140 - Membership - Conference/Convention	0.00	0.00	212.06	2,820.66	-2,820.66
52210 - Telephone	22,300.00	22,300.00	1,731.25	10,127.54	12,172.46
52410 - Subscriptions	5,000.00	5,000.00	0.00	1,913.95	3,086.05
52510 - Fees - Bank Charges	38,600.00	38,600.00	3,997.89	24,492.07	14,107.93
53010 - Conservation Rebate	66,500.00	66,500.00	33,663.25	37,590.67	28,909.33
53020 - Conservation Programs	6,900.00	6,900.00	0.00	2,133.31	4,766.69
53110 - Public Outreach - Materials	800.00	800.00	0.00	0.00	800.00
53120 - Public Outreach - Services	63,300.00	63,300.00	4,897.55	38,878.55	24,421.45
53210 - Public Notices	22,600.00	22,600.00	0.00	69.63	22,530.37
54020 - Hardware / Software Maintenance	65,900.00	65,900.00	970.13	69,616.20	-3,716.20
54110 - Professional Services - Legal	41,600.00	41,600.00	1,897.25	15,949.04	25,650.96
54120 - Professional Services - Other	323,200.00	426,200.00	15,335.09	78,472.82	347,727.18
54130 - Professional Services - Temporary Personell Servic	202,300.00	202,300.00	2,930.45	47,298.05	155,001.95
54150 - Professional Services - Service Area Maint	278,000.00	278,000.00	0.00	53,906.07	224,093.93
54160 - Professional Services - Fiscal Agent	6,000.00	6,000.00	0.00	3,000.00	3,000.00
54210 - Insurance - Liability & Property	70,000.00	70,000.00	0.00	0.00	70,000.00
54310 - Fines and Penalties	0.00	0.00	0.00	12.90	-12.90
55010 - Utilities - Energy Costs	252,000.00	252,000.00	10,381.50	110,524.10	141,475.90
55020 - Utilities - Disposal	4,700.00	4,700.00	352.38	2,114.28	2,585.72
56210 - Hazardous Waste Removal	6,000.00	6,000.00	841.48	3,502.86	2,497.14
56310 - Regulatory Compliance / Sampling	25,000.00	25,000.00	2,064.88	18,106.07	6,893.93
57020 - Lease Expense - Vehicle	6,500.00	6,500.00	5,800.88	5,800.88	699.12
57030 - Lease Expense - Equipment	5,100.00	5,100.00	462.35	1,204.60	3,895.40
57120 - Maintenance - Facility	241,700.00	241,700.00	3,021.06	22,435.48	219,264.52
57130 - Maintenance - Vehicle	22,400.00	22,400.00	209.18	15,546.72	6,853.28
57140 - Maintenance - Equipment	12,200.00	12,200.00	3,367.41	22,152.79	-9,952.79
57150 - Maintenance - Other	1,800.00	1,800.00	166.10	166.10	1,633.90
57160 - Fuel	40,500.00	40,500.00	3,553.41	19,676.34	20,823.66
57310 - Security Monitoring	2,800.00	2,800.00	484.00	2,915.00	-115.00
58110 - Director - Stippen	32,500.00	32,500.00	1,875.00	8,187.50	24,312.50
58120 - Director - Expenses Direct	2,000.00	2,000.00	0.00	8.49	1,991.51
59010 - Miscellaneous	5,200.00	5,200.00	0.00	54.39	5,145.61
70150 - Investment/Interest Revenue	5,000.00	5,000.00	0.00	-2,221.93	7,221.93
70170 - Taxes & Assessments	948,000.00	948,000.00	0.00	44,862.03	903,137.97
70200 - Tapping & Connection	350,000.00	350,000.00	29,041.12	312,123.17	37,876.83
70210 - COP Pymts from Other Agency	0.00	0.00	0.00	46,150.50	-46,150.50
70250 - Cost Recovery - Cavitt Stalman	1,000.00	1,000.00	230.23	690.69	309.31
74020 - Debt/Interest Expense	6,500.00	6,500.00	0.00	0.00	6,500.00
74024 - Debt/Interest Expense 2009 COP	935,700.00	935,700.00	301,032.00	500,752.52	434,947.48
74026 - Debt/Interest Expense 2012 COP	244,000.00	244,000.00	0.00	62,603.00	181,397.00
74050 - Amortization Expense	0.00	0.00	0.00	-11,134.76	11,134.76
74060 - Sales Tax	3,000.00	3,000.00	0.00	0.00	3,000.00
74080 - Assessments - Non OP	0.00	0.00	0.00	1,591.00	-1,591.00
79999 - Gain/Loss on Sale of Asset	0.00	0.00	52.17	52.17	-52.17
Fund: 050 - RETAIL Surplus (Deficit):	**713,100.00**	**610,100.00**	**302,916.04**	**-436,009.02**	**1,046,109.02**
Total Surplus (Deficit):	**1,989,522.41**	**1,662,522.41**	**-54,807.87**	**-1,417,820.28**	**3,080,342.69**

Fund Summary

Fund	Original Total Budget	Current Total Budget	MTD Activity	YTD Activity	Budget Remaining
010 - WHOLESALE	1,276,422.41	1,052,422.41	-357,723.91	-981,811.26	2,034,233.67
050 - RETAIL	713,100.00	610,100.00	302,916.04	-436,009.02	1,046,109.02
Total Surplus (Deficit):	**1,989,522.41**	**1,662,522.41**	**-54,807.87**	**-1,417,820.28**	**4,005,937.45**

Capital Improvement Program - Wholesale

Wholesale Capital Improvement Program

	2015-2016			2016-2017		
	CIP	Connections	Hinkle	CIP	Connections	Hinkle
Water Treatment Plant						
Building-Storage Roof/Walls				475,000		
Chemical Feed Systems-Polymer	112,000					
New Settled Water Channel	500,000			2,430,000		
Settling Tube Cleaning System						
Rapid Mix Process Improvements	25,000			235,000		
Replace Flocculators, Modift Basins	250,000			2,700,000		
Replace Sludge Collection System	50,000			588,000		
Hinkle Reservior Cover Testing/Repairs	224,000					
Hinkle Overflow Channel Lining						
Hinkle Resvoir Groundwater Monitoring Wells				59,000		
Backwash Hood and Pumps Rehabilitation	52,000					
Washdown Piping Improvements	22,000					
Lime System Control & Feeder System				64,000		
Vehicals	60,000					
Clarifier Wall Lining & Leakage Repairs				477,000		
Water Supply Reliability Projects						
SSWD-SJWD Pump Back Projects	700,000					
Control Valve Stations	600,000					
Miscellaneous Projects						
ARC flash Assessment and Improvements	100,000					
FO40 Transmission Pipeline Re-Lining						
Solar Site Access Culvert replacement				212,000		
Whsl Meter Comm Antenna Improvements	12,000			6,000		
Plant Piping and Recoating Program				11,000		
Hinkle Reservoir Overflow Apron Drains	15,000					
Security Improvements (at WTP and Bacon)	100,000					
In-Plant Pump Station Improvements	56,000					
Articulating Boom Lift	30,000					
	2,908,000	-	-	7,257,000	-	-
Total Projects	2,908,000	-	-	7,257,000	-	-

CIP Budget – Retail

		FY 2015-2016 General
Funding Sources:		
Estimated Beginning Balance	**$**	**7,778,417**
Estimated Revenue and Transfers		353,496
Estimated Funds Available for CIP Projects	**$**	**8,131,913**
Projects:		
District-Wide		
Vehicle Replacement	$	214,000
Field Services		
Pump Station-Upper Granite Bay	$	1,100,000
Transmission Pipelines-AFR North		680,000
Los Lagos Tank - Recoating		628,000
Pump Station-Lower Granite Bay		350,000
Mainline Replacements-Main		335,000
Mainline Replacements-Oak Avenue		310,000
Mainline Replacements-Telegraph Avenue		239,000
Pressure Reducing Station-Oak Ave		200,000
Water Supply Reliability - Barton Rd		176,700
Sample Stations		175,000
Pressure Reducing Station-Canyon Falls		155,000
Transmission Pipelines-Eureka		150,000
Distribution System Improvements		123,000
Mainline Replacements-Oak/Cardwell		104,400
Kokila Resevoir Condition Assessment		103,000
Mooney Ridge Hydro-Tank Recoating		103,000
Mainline Replacements-Erwin Avenue		69,800
Los Lagos Tank - Mixing System		58,000
Pump/Motor R&R		50,000
Mainline Replacements-Peerless Avenue		43,400
Mainline Replacements-Sierra/Douglas		27,300
Update OITs and & PLC Prgramming		9,000
Total Projects	$	5,403,600
Estimated Ending Balance	**$**	**2,728,313**

Summary

Project Summary

Project Number	Project Name	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Ending Balance	Budget Remaining
061700	Redundant Folsom Outlet/USBR	0.00	0.00	0.00	0.00	0.00	0.00
081845	FO 40-Inch T-Main Rehab	0.00	0.00	3,118,700.38	0.00	3,118,700.38	-3,118,700.38
081848	Wholesale Meters	0.00	0.00	0.00	0.00	0.00	0.00
101925	Auburn Folsom Rd North	0.00	0.00	858,325.93	677,936.64	1,536,262.57	-1,536,262.57
121961	Erwin Ave Main Replacement	0.00	0.00	128,946.39	84,306.65	213,253.04	-213,253.04
121962	Peerless Ave Main Replacement	0.00	0.00	289,610.19	57,773.06	347,383.25	-347,383.25
121966	Design and Construct Lower Granite Bay..	2,975,960.00	0.00	3,175,206.34	354,005.89	3,529,212.23	-553,252.23
121967	Design and Construct Rehab Upper Gran..	1,620,040.00	0.00	646,015.91	732,541.03	1,378,556.94	241,483.06
121986	Fair Oaks 40 Pipeline ARC Rep	0.00	0.00	886,257.49	0.00	886,257.49	-886,257.49
121987	Fair Oaks 40 Cathodic Prot Pro	0.00	0.00	337,803.80	0.00	337,803.80	-337,803.80
131009	Telegraph Ave Main Replacement	0.00	0.00	16,212.82	238,086.46	254,299.28	-254,299.28
131010	Oak Ave 12-inch Main Replacement	0.00	0.00	113,948.29	138,893.55	252,841.84	-252,841.84
135021	Water Supply Reliability - Barton Road	0.00	0.00	0.00	0.00	0.00	0.00
135022	SSWD Pump Back Evaluation - Expense ...	0.00	0.00	1,449.65	0.00	1,449.65	-1,449.65
141034	FO 40 Pipeline Relining	0.00	0.00	830.85	0.00	830.85	-830.85
141043	2014 Drought Response - SSWD Antelo...	50,000.00	0.00	717,923.43	2,178,997.01	2,896,920.44	-2,846,920.44
141048	Douglas Steel Main Replacement	0.00	0.00	182,465.26	30,517.18	212,982.44	-212,982.44
141999	Tyler Software Purchase and Implemen...	0.00	0.00	124,272.00	18,868.57	143,140.57	-143,140.57
145041	Park Place & Auburn Folsom Rd PSV Stat..	0.00	0.00	16,406.68	0.00	16,406.68	-16,406.68
151409	WaterSmart Software Implementation	84,000.00	55,500.00	28,500.00	55,500.00	84,000.00	0.00
151412	Truck-mounted Valve Actuator	16,800.00	16,800.00	15,046.25	2,510.00	17,556.25	-756.25
151414	Replace WTP Programable Logic Control...	15,000.00	0.00	5,734.82	0.00	5,734.82	9,265.18
151422	EIM Electric Accuator Replacement at Fi...	6,000.00	6,000.00	0.00	5,875.61	5,875.61	124.39
151423	South Basin Transfer Pump	10,000.00	0.00	0.00	0.00	0.00	10,000.00
151428	Sewer Lift Pump Replacement	7,000.00	0.00	4,020.18	0.00	4,020.18	2,979.82
161100	WTP Floc-Sed Basins 2015 Improvemen...	0.00	0.00	0.00	369,227.47	369,227.47	-369,227.47
161101	Security Improvements (WTP & Bacon)	0.00	0.00	0.00	9,752.53	9,752.53	-9,752.53
161102	Solar Improvement Project (NEMA Proj...	0.00	0.00	0.00	106,730.00	106,730.00	-106,730.00
161103	Control Valve Stations Water Supply Rel...	710,717.00	700,000.00	26,381.52	589,984.45	616,365.97	94,351.03
161104	Hinkle Reservoir Overflow Apron Drains	7,000.00	7,000.00	0.00	2,835.00	2,835.00	4,165.00
165101	Mainline Replacements - Main Avenue	335,000.00	335,000.00	0.00	4,000.00	4,000.00	331,000.00
165102	Mainline Replacements - Oak Avenue	310,000.00	310,000.00	0.00	5,360.00	5,360.00	304,640.00
165103	Los Lagos Tank Recoring and New Mixin...	686,000.00	686,000.00	0.00	0.00	0.00	686,000.00
165104	Mooney Ridge Hydro-Tank Recoating	103,000.00	103,000.00	0.00	0.00	0.00	103,000.00
165105	Sample Stations Various Locations	175,000.00	175,000.00	0.00	0.00	0.00	175,000.00
	Report Total:	**7,111,517.00**	**2,394,300.00**	**10,694,058.18**	**5,663,701.10**	**16,357,759.28**	**-9,246,242.28**

San Juan Water District, CA

Project Activity vs Budget Report

By Project Number

Date Range: 07/01/2015 - 06/30/2016

Project Number	Project Name	Group	Type	Status
061700	Redundant Folsom Outlet/USBR	Wholesale - General CIP Reserve	Transmission and M...	Complete

Expenses

Account Key	Account Name	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Ending Balance	Budget Remaining
0617001000	Labor - CAP	0.00	0.00	47,548.26	0.00	47,548.26	-47,548.26
0617002000	Materials - CAP	0.00	0.00	4,611.81	0.00	4,611.81	-4,611.81
0617003000	OH - CAP	0.00	0.00	10,748.17	0.00	10,748.17	-10,748.17
0617005000	Services - CAP	0.00	0.00	7,404,917.30	0.00	7,404,917.30	-7,404,917.30
0617009999	Close	0.00	0.00	-7,467,825.54	0.00	-7,467,825.54	7,467,825.54
	Total Expenses:	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**
	061700 Total:	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**

Project Number	Project Name	Group	Type	Status
081845	FO 40-Inch T-Main Rehab	Construction	Transmission and M...	Complete

Expenses

Account Key	Account Name	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Ending Balance	Budget Remaining
0818459999	Close	0.00	0.00	3,118,700.38	0.00	3,118,700.38	-3,118,700.38
	Total Expenses:	**0.00**	**0.00**	**3,118,700.38**	**0.00**	**3,118,700.38**	**-3,118,700.38**
	081845 Total:	**0.00**	**0.00**	**3,118,700.38**	**0.00**	**3,118,700.38**	**-3,118,700.38**

Project Number	Project Name	Group	Type	Status
081848	Wholesale Meters	Construction	Transmission and M...	Complete

Expenses

Account Key	Account Name	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Ending Balance	Budget Remaining
0818481000	Labor - CAP	0.00	0.00	280,613.21	0.00	280,613.21	-280,613.21
0818482000	Materials - CAP	0.00	0.00	372,912.19	0.00	372,912.19	-372,912.19
0818483000	OH - CAP	0.00	0.00	112,728.74	0.00	112,728.74	-112,728.74
0818484000	Other - CAP	0.00	0.00	325.98	0.00	325.98	-325.98
0818485000	Services - CAP	0.00	0.00	4,810,191.98	0.00	4,810,191.98	-4,810,191.98
0818489999	Close	0.00	0.00	-5,576,772.10	0.00	-5,576,772.10	5,576,772.10
	Total Expenses:	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**
	081848 Total:	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**

Project Number	Project Name	Group	Type	Status
101925	Auburn Folsom Rd North	Retail - General CIP Reserve	Distribution System	Active

Expenses

Account Key	Account Name	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Ending Balance	Budget Remaining
1019251000	Labor - CAP	0.00	0.00	129,915.65	1,426.77	131,342.42	-131,342.42

GL Account Number	GL Account Name	Activity
050-15000	Capital - Work In Progress	1,426.77

Project Number	Project Name	Group		Type	Status			
1019252000	Materials - CAP		0.00	0.00	609,070.73	1,376.81	610,447.54	-610,447.54
	GL Account Number	**GL Account Name**				**Activity**		
	050-15000	Capital - Work In Progress				1,376.81		
1019253000	OH - CAP		0.00	0.00	101,952.45	0.00	101,952.45	-101,952.45
1019255000	Services - CAP		0.00	0.00	17,387.10	675,133.06	692,520.16	-692,520.16
	GL Account Number	**GL Account Name**				**Activity**		
	050-15000	Capital - Work In Progress				675,133.06		
		Total Expenses:	**0.00**	**0.00**	**858,325.93**	**677,936.64**	**1,536,262.57**	**-1,536,262.57**
		101925 Total:	**0.00**	**0.00**	**858,325.93**	**677,936.64**	**1,536,262.57**	**-1,536,262.57**

121961	Erwin Ave Main Replacement	Planning		Distribution System	Active			
Expenses Account Key	**Account Name**		**Total Budget**	**Date Range Budget**	**Beginning Balance**	**Total Activity**	**Ending Balance**	**Budget Remaining**
1219611000	Labor - CAP		0.00	0.00	14,112.51	1,045.20	15,157.71	-15,157.71
	GL Account Number	**GL Account Name**				**Activity**		
	050-15000	Capital - Work In Progress				1,045.20		
1219612000	Materials - CAP		0.00	0.00	127.93	0.00	127.93	-127.93
1219613000	OH - CAP		0.00	0.00	1,156.27	0.00	1,156.27	-1,156.27
1219615000	Services - CAP		0.00	0.00	119,324.43	74,254.25	193,578.68	-193,578.68
	GL Account Number	**GL Account Name**				**Activity**		
	050-15000	Capital - Work In Progress				77,486.70		
	050-20030	Retentions Payable				-3,232.45		
1219616000	Retention - CAP		0.00	0.00	-5,774.75	9,007.20	3,232.45	-3,232.45
	GL Account Number	**GL Account Name**				**Activity**		
	050-15000	Capital - Work In Progress				-631.94		
	050-20030	Retentions Payable				9,639.14		
		Total Expenses:	**0.00**	**0.00**	**128,946.39**	**84,306.65**	**213,253.04**	**-213,253.04**
		121961 Total:	**0.00**	**0.00**	**128,946.39**	**84,306.65**	**213,253.04**	**-213,253.04**

121962	Peerless Ave Main Replacement	Planning		Distribution System	Active			
Expenses Account Key	**Account Name**		**Total Budget**	**Date Range Budget**	**Beginning Balance**	**Total Activity**	**Ending Balance**	**Budget Remaining**
1219621000	Labor - CAP		0.00	0.00	17,327.14	172.81	17,499.95	-17,499.95
	GL Account Number	**GL Account Name**				**Activity**		
	050-15000	Capital - Work In Progress				172.81		
1219622000	Materials - CAP		0.00	0.00	124.94	0.00	124.94	-124.94
1219623000	OH - CAP		0.00	0.00	1,098.34	0.00	1,098.34	-1,098.34
1219625000	Services - CAP		0.00	0.00	284,642.27	42,310.84	326,953.11	-326,953.11
	GL Account Number	**GL Account Name**				**Activity**		

Project Number	Project Name	Group	Type	Status				
	050-15000	Capital - Work In Progress			42,959.36			
	050-20030	Retentions Payable			-648.52			
1219626000	Retention - CAP		0.00	0.00	-13,582.50	15,289.41	1,706.91	-1,706.91
	GL Account Number	**GL Account Name**				**Activity**		
	050-15000	Capital - Work In Progress				-487.35		
	050-20030	Retentions Payable				15,776.76		
		Total Expenses:	**0.00**	**0.00**	**289,610.19**	**57,773.06**	**347,383.25**	**-347,383.25**
		121962 Total:	**0.00**	**0.00**	**289,610.19**	**57,773.06**	**347,383.25**	**-347,383.25**

121966	Design and Construct Lower Grani...	Retail - General CIP Reserve		Pump Stations	Active			
Expenses Account Key	**Account Name**		**Total Budget**	**Date Range Budget**	**Beginning Balance**	**Total Activity**	**Ending Balance**	**Budget Remaining**
1219661000	Labor - CAP		0.00	0.00	62,896.04	2,617.46	65,513.50	-65,513.50
	GL Account Number	**GL Account Name**				**Activity**		
	050-15000	Capital - Work In Progress				2,617.46		
1219662000	Materials - CAP		0.00	0.00	32,601.40	23.31	32,624.71	-32,624.71
	GL Account Number	**GL Account Name**				**Activity**		
	050-15000	Capital - Work In Progress				23.31		
1219663000	OH - CAP		0.00	0.00	2,395.14	0.00	2,395.14	-2,395.14
1219665000	Services - CAP		2,975,960.00	0.00	3,235,609.97	353,487.52	3,589,097.49	-613,137.49
	GL Account Number	**GL Account Name**				**Activity**		
	050-15000	Capital - Work In Progress				353,487.52		
1219666000	Retention - CAP		0.00	0.00	-158,296.21	-2,122.40	-160,418.61	160,418.61
	GL Account Number	**GL Account Name**				**Activity**		
	050-20030	Retentions Payable				-2,122.40		
		Total Expenses:	**2,975,960.00**	**0.00**	**3,175,206.34**	**354,005.89**	**3,529,212.23**	**-553,252.23**
		121966 Total:	**2,975,960.00**	**0.00**	**3,175,206.34**	**354,005.89**	**3,529,212.23**	**-553,252.23**

121967	Design and Construct Rehab Uppe...	Construction		Pump Stations	Active			
Expenses Account Key	**Account Name**		**Total Budget**	**Date Range Budget**	**Beginning Balance**	**Total Activity**	**Ending Balance**	**Budget Remaining**
1219671000	Labor - CAP		0.00	0.00	39,552.00	1,287.92	40,839.92	-40,839.92
	GL Account Number	**GL Account Name**				**Activity**		
	050-15000	Capital - Work In Progress				1,287.92		
1219672000	Materials - CAP		0.00	0.00	30,406.68	4,846.11	35,252.79	-35,252.79
	GL Account Number	**GL Account Name**				**Activity**		
	050-15000	Capital - Work In Progress				4,846.11		
1219673000	OH - CAP		0.00	0.00	2,446.42	0.00	2,446.42	-2,446.42

Project Number	Project Name	Group		Type	Status			
1219675000	Services - CAP		1,620,040.00	0.00	602,370.83	760,131.34	1,362,502.17	257,537.83
	GL Account Number	**GL Account Name**				**Activity**		
	010-300-56310	Reg Compliance / Sampling / Inspection				6.00		
	050-15000	Capital - Work In Progress				760,095.34		
	050-300-56310	Reg Compliance / Sampling / Inspection				30.00		
1219676000	Retention - CAP		0.00	0.00	-28,760.02	-33,724.34	-62,484.36	62,484.36
	GL Account Number	**GL Account Name**				**Activity**		
	010-20030	Retentions Payable				-25,868.06		
	050-20030	Retentions Payable				-7,856.28		
		Total Expenses:	**1,620,040.00**	**0.00**	**646,015.91**	**732,541.03**	**1,378,556.94**	**241,483.06**
		121967 Total:	**1,620,040.00**	**0.00**	**646,015.91**	**732,541.03**	**1,378,556.94**	**241,483.06**
121986	Fair Oaks 40 Pipeline ARC Rep	Construction		Transmission and M...	Complete			
Expenses Account Key	**Account Name**		**Total Budget**	**Date Range Budget**	**Beginning Balance**	**Total Activity**	**Ending Balance**	**Budget Remaining**
1219869999	Close		0.00	0.00	886,257.49	0.00	886,257.49	-886,257.49
		Total Expenses:	**0.00**	**0.00**	**886,257.49**	**0.00**	**886,257.49**	**-886,257.49**
		121986 Total:	**0.00**	**0.00**	**886,257.49**	**0.00**	**886,257.49**	**-886,257.49**
121987	Fair Oaks 40 Cathodic Prot Pro	Construction		Transmission and M...	Complete			
Expenses Account Key	**Account Name**		**Total Budget**	**Date Range Budget**	**Beginning Balance**	**Total Activity**	**Ending Balance**	**Budget Remaining**
1219871000	Labor - CAP		0.00	0.00	337,803.80	0.00	337,803.80	-337,803.80
		Total Expenses:	**0.00**	**0.00**	**337,803.80**	**0.00**	**337,803.80**	**-337,803.80**
		121987 Total:	**0.00**	**0.00**	**337,803.80**	**0.00**	**337,803.80**	**-337,803.80**
131009	Telegraph Ave Main Replacement	Construction		Distribution System	Active			
Expenses Account Key	**Account Name**		**Total Budget**	**Date Range Budget**	**Beginning Balance**	**Total Activity**	**Ending Balance**	**Budget Remaining**
1310091000	Labor - CAP		0.00	0.00	12,036.49	1,824.50	13,860.99	-13,860.99
	GL Account Number	**GL Account Name**				**Activity**		
	050-15000	Capital - Work In Progress				1,824.50		
1310092000	Materials - CAP		0.00	0.00	0.00	154.94	154.94	-154.94
	GL Account Number	**GL Account Name**				**Activity**		
	050-15000	Capital - Work In Progress				154.94		
1310093000	OH - CAP		0.00	0.00	1,105.49	0.00	1,105.49	-1,105.49
1310095000	Services - CAP		0.00	0.00	3,070.84	225,821.09	228,891.93	-228,891.93
	GL Account Number	**GL Account Name**				**Activity**		
	010-300-56310	Reg Compliance / Sampling / Inspection				6.00		
	050-15000	Capital - Work In Progress				234,623.94		

Project Number	Project Name	Group	Type	Status				
	050-20030	Retentions Payable			-8,814.85			
	050-300-51120	Permitting / Health Inspections			0.00			
	050-300-56310	Reg Compliance / Sampling / Inspection			6.00			
1310096000	Retention - CAP		0.00	0.00	0.00	10,285.93	10,285.93	-10,285.93
	GL Account Number	**GL Account Name**				**Activity**		
	050-15000	Capital - Work In Progress				-1,311.38		
	050-20030	Retentions Payable				11,597.31		
	Total Expenses:		**0.00**	**0.00**	**16,212.82**	**238,086.46**	**254,299.28**	**-254,299.28**
	131009 Total:		**0.00**	**0.00**	**16,212.82**	**238,086.46**	**254,299.28**	**-254,299.28**
131010	Oak Ave 12-inch Main Replaceme...	Construction		Distribution System	Active			
Expenses Account Key	**Account Name**		**Total Budget**	**Date Range Budget**	**Beginning Balance**	**Total Activity**	**Ending Balance**	**Budget Remaining**
1310101000	Labor - CAP		0.00	0.00	13,002.21	1,862.68	14,864.89	-14,864.89
	GL Account Number	**GL Account Name**				**Activity**		
	050-15000	Capital - Work In Progress				1,862.68		
1310102000	Materials - CAP		0.00	0.00	430.57	268.07	698.64	-698.64
	GL Account Number	**GL Account Name**				**Activity**		
	050-15000	Capital - Work In Progress				268.07		
1310103000	OH - CAP		0.00	0.00	1,274.32	0.00	1,274.32	-1,274.32
1310105000	Services - CAP		0.00	0.00	104,213.44	126,587.49	230,800.93	-230,800.93
	GL Account Number	**GL Account Name**				**Activity**		
	050-15000	Capital - Work In Progress				130,576.10		
	050-20030	Retentions Payable				-3,988.61		
1310106000	Retention - CAP		0.00	0.00	-4,972.25	10,175.31	5,203.06	-5,203.06
	GL Account Number	**GL Account Name**				**Activity**		
	050-15000	Capital - Work In Progress				-1,323.48		
	050-20030	Retentions Payable				11,498.79		
	Total Expenses:		**0.00**	**0.00**	**113,948.29**	**138,893.55**	**252,841.84**	**-252,841.84**
	131010 Total:		**0.00**	**0.00**	**113,948.29**	**138,893.55**	**252,841.84**	**-252,841.84**
135021	Water Supply Reliability - Barton ...	Retail - General CIP Reserve		Distribution System	Suspended			
Expenses Account Key	**Account Name**		**Total Budget**	**Date Range Budget**	**Beginning Balance**	**Total Activity**	**Ending Balance**	**Budget Remaining**
1350211500	Labor - NC		0.00	0.00	16,425.00	0.00	16,425.00	-16,425.00
1350212500	Materials - NC		0.00	0.00	12,020.00	0.00	12,020.00	-12,020.00
1350215500	Services - NC		0.00	0.00	-28,445.00	0.00	-28,445.00	28,445.00
	Total Expenses:		**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**

Project Number	Project Name	Group	Type	Status				
		135021 Total:	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**
135022	SSWD Pump Back Evaluation - Exp...	Wholesale - General CIP Reserve		Pump Stations	Complete			
Expenses Account Key	**Account Name**		**Total Budget**	**Date Range Budget**	**Beginning Balance**	**Total Activity**	**Ending Balance**	**Budget Remaining**
1350221500	Labor - NC		0.00	0.00	1,199.22	0.00	1,199.22	-1,199.22
1350223500	OH - NC		0.00	0.00	250.43	0.00	250.43	-250.43
	Total Expenses:		**0.00**	**0.00**	**1,449.65**	**0.00**	**1,449.65**	**-1,449.65**
	135022 Total:		**0.00**	**0.00**	**1,449.65**	**0.00**	**1,449.65**	**-1,449.65**
141034	FO 40 Pipeline Relining	Wholesale - General CIP Reserve		Transmission and M...	Complete			
Expenses Account Key	**Account Name**		**Total Budget**	**Date Range Budget**	**Beginning Balance**	**Total Activity**	**Ending Balance**	**Budget Remaining**
1410341000	Labor - CAP		0.00	0.00	1,148.49	0.00	1,148.49	-1,148.49
1410341500	Labor - NC		0.00	0.00	-375.07	0.00	-375.07	375.07
1410343000	OH - CAP		0.00	0.00	57.43	0.00	57.43	-57.43
	Total Expenses:		**0.00**	**0.00**	**830.85**	**0.00**	**830.85**	**-830.85**
	141034 Total:		**0.00**	**0.00**	**830.85**	**0.00**	**830.85**	**-830.85**
141043	2014 Drought Response - SSWD A...	Wholesale - General CIP Reserve		Pump Stations	Active			
Expenses Account Key	**Account Name**		**Total Budget**	**Date Range Budget**	**Beginning Balance**	**Total Activity**	**Ending Balance**	**Budget Remaining**
1410431000	Labor - CAP		0.00	0.00	0.00	456.81	456.81	-456.81
	GL Account Number	**GL Account Name**				**Activity**		
	010-15000	Capital - Work In Progress				456.81		
1410434500	Other - NC		0.00	0.00	710,602.00	2,178,540.20	2,889,142.20	-2,889,142.20
	GL Account Number	**GL Account Name**				**Activity**		
	010-700-74090	Contributions to Others				2,178,540.20		
1410435000	Services - CAP		50,000.00	0.00	0.00	0.00	0.00	50,000.00
1450431500	Labor - NC		0.00	0.00	7,321.43	0.00	7,321.43	-7,321.43
	Total Expenses:		**50,000.00**	**0.00**	**717,923.43**	**2,178,997.01**	**2,896,920.44**	**-2,846,920.44**
	141043 Total:		**50,000.00**	**0.00**	**717,923.43**	**2,178,997.01**	**2,896,920.44**	**-2,846,920.44**
141048	Douglas Steel Main Replacement	Construction		Distribution System	Active			
Expenses Account Key	**Account Name**		**Total Budget**	**Date Range Budget**	**Beginning Balance**	**Total Activity**	**Ending Balance**	**Budget Remaining**
1410481000	Labor - NC		0.00	0.00	18,525.99	137.07	18,663.06	-18,663.06
	GL Account Number	**GL Account Name**				**Activity**		
	050-15000	Capital - Work In Progress				137.07		
1410482000	Materials - CAP		0.00	0.00	2,736.36	120.51	2,856.87	-2,856.87
	GL Account Number	**GL Account Name**				**Activity**		

Project Number	Project Name	Group		Type	Status				
	050-210-52000	Materials and Supplies				120.51			
1410485000	Services - CAP		0.00	0.00	169,241.91	21,186.42	190,428.33	-190,428.33	
	GL Account Number	**GL Account Name**				**Activity**			
	010-15000	Capital - Work In Progress				1,537.00			
	050-15000	Capital - Work In Progress				20,683.60			
	050-20030	Retentions Payable				-1,034.18			
1410486000	Retention - CAP		0.00	0.00	-8,039.00	9,073.18	1,034.18	-1,034.18	
	GL Account Number	**GL Account Name**				**Activity**			
	050-20030	Retentions Payable				9,073.18			
	Total Expenses:		**0.00**	**0.00**	**182,465.26**	**30,517.18**	**212,982.44**	**-212,982.44**	
	141048 Total:		**0.00**	**0.00**	**182,465.26**	**30,517.18**	**212,982.44**	**-212,982.44**	
141999	Tyler Software Purchase and Impl...	Information Technology		Information Techno...	Active				
Expenses Account Key	**Account Name**		**Total Budget**	**Date Range Budget**	**Beginning Balance**	**Total Activity**	**Ending Balance**	**Budget Remaining**	
1419995000	Services - CAP		0.00	0.00	88,567.00	9,537.50	98,104.50	-98,104.50	
	GL Account Number	**GL Account Name**				**Activity**			
	010-040-54120	Professional Services - Other				437.50			
	010-15000	Capital - Work In Progress				6,725.00			
	050-040-54120	Professional Services - Other				2,375.00			
1419995500	Services - NC		0.00	0.00	35,705.00	9,331.07	45,036.07	-45,036.07	
	GL Account Number	**GL Account Name**				**Activity**			
	010-040-54120	Professional Services - Other				4,837.41			
	010-15000	Capital - Work In Progress				1,593.75			
	050-040-54120	Professional Services - Other				2,899.91			
	Total Expenses:		**0.00**	**0.00**	**124,272.00**	**18,868.57**	**143,140.57**	**-143,140.57**	
	141999 Total:		**0.00**	**0.00**	**124,272.00**	**18,868.57**	**143,140.57**	**-143,140.57**	
145041	Park Place & Auburn Folsom Rd P...	Construction		Distribution System	Inactive				
Expenses Account Key	**Account Name**		**Total Budget**	**Date Range Budget**	**Beginning Balance**	**Total Activity**	**Ending Balance**	**Budget Remaining**	
1450411500	Labor - NC		0.00	0.00	10,315.74	0.00	10,315.74	-10,315.74	
1450412500	Materials - NC		0.00	0.00	6,072.54	0.00	6,072.54	-6,072.54	
1450415500	Services - NC		0.00	0.00	18.40	0.00	18.40	-18.40	
	Total Expenses:		**0.00**	**0.00**	**16,406.68**	**0.00**	**16,406.68**	**-16,406.68**	
	145041 Total:		**0.00**	**0.00**	**16,406.68**	**0.00**	**16,406.68**	**-16,406.68**	
151409	WaterSmart Software Implementa..	Information Technology		Information Techno...	Active				

Project Number	Project Name	Group	Type	Status
151409	Replace Valve Actuator	Maintenance	Water Treatment Pl...	Active

Expenses Account Key	Account Name	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Ending Balance	Budget Remaining
1514095000	Services - CAP	84,000.00	55,500.00	28,500.00	55,500.00	84,000.00	0.00

GL Account Number	GL Account Name	Activity
050-15000	Capital - Work In Progress	55,500.00

	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Ending Balance	Budget Remaining
Total Expenses:	**84,000.00**	**55,500.00**	**28,500.00**	**55,500.00**	**84,000.00**	**0.00**
151409 Total:	**84,000.00**	**55,500.00**	**28,500.00**	**55,500.00**	**84,000.00**	**0.00**

Project Number	Project Name	Group	Type	Status
151412	Truck-mounted Valve Actuator	Construction	Water Treatment Pl...	Active

Expenses Account Key	Account Name	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Ending Balance	Budget Remaining
1514122000	Materials - CAP	16,800.00	16,800.00	15,046.25	2,510.00	17,556.25	-756.25

GL Account Number	GL Account Name	Activity
010-15000	Capital - Work In Progress	2,510.00

	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Ending Balance	Budget Remaining
Total Expenses:	**16,800.00**	**16,800.00**	**15,046.25**	**2,510.00**	**17,556.25**	**-756.25**
151412 Total:	**16,800.00**	**16,800.00**	**15,046.25**	**2,510.00**	**17,556.25**	**-756.25**

Project Number	Project Name	Group	Type	Status
151414	Replace WTP Programable Logic C...	Maintenance	Water Treatment Pl...	Complete

Expenses Account Key	Account Name	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Ending Balance	Budget Remaining
1514142000	Materials - CAP	15,000.00	0.00	5,734.82	0.00	5,734.82	9,265.18
Total Expenses:	**15,000.00**	**0.00**	**5,734.82**	**0.00**	**5,734.82**	**9,265.18**	
151414 Total:	**15,000.00**	**0.00**	**5,734.82**	**0.00**	**5,734.82**	**9,265.18**	

Project Number	Project Name	Group	Type	Status
151422	EIM Electric Accuator Replacemen...	Maintenance	Water Treatment Pl...	Active

Expenses Account Key	Account Name	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Ending Balance	Budget Remaining
1514222000	Materials - CAP	6,000.00	6,000.00	0.00	5,875.61	5,875.61	124.39

GL Account Number	GL Account Name	Activity
010-15000	Capital - Work In Progress	5,875.61

	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Ending Balance	Budget Remaining
Total Expenses:	**6,000.00**	**6,000.00**	**0.00**	**5,875.61**	**5,875.61**	**124.39**
151422 Total:	**6,000.00**	**6,000.00**	**0.00**	**5,875.61**	**5,875.61**	**124.39**

Project Number	Project Name	Group	Type	Status
151423	South Basin Transfer Pump	Maintenance	Water Treatment Pl...	Inactive

Expenses Account Key	Account Name	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Ending Balance	Budget Remaining
1514232000	Materials - CAP	10,000.00	0.00	0.00	0.00	0.00	10,000.00
Total Expenses:	**10,000.00**	**0.00**	**0.00**	**0.00**	**0.00**	**10,000.00**	
151423 Total:	**10,000.00**	**0.00**	**0.00**	**0.00**	**0.00**	**10,000.00**	

Project Number	Project Name	Group	Type	Status
151428	Sewer Lift Pump Replacement	Maintenance	Water Treatment Pl...	Complete

Expenses Account Key	Account Name	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Ending Balance	Budget Remaining
1514282000	Materials - CAP	7,000.00	0.00	4,020.18	0.00	4,020.18	2,979.82
	Total Expenses:	**7,000.00**	**0.00**	**4,020.18**	**0.00**	**4,020.18**	**2,979.82**
	151428 Total:	**7,000.00**	**0.00**	**4,020.18**	**0.00**	**4,020.18**	**2,979.82**

Project Number	Project Name	Group	Type	Status
161100	WTP Floc-Sed Basins 2015 Improv...	Wholesale - General CIP Reserve	Water Treatment Pl...	Active

Expenses Account Key	Account Name	GL Account Number	GL Account Name	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Activity	Ending Balance	Budget Remaining
1611001000	Labor - CAP			0.00	0.00	0.00	2,708.03		2,708.03	-2,708.03
		010-15000	Capital - Work In Progress					2,708.03		
1611005000	Services - CAP			0.00	0.00	0.00	366,519.44		366,519.44	-366,519.44
		010-15000	Capital - Work In Progress					366,519.44		
	Total Expenses:			**0.00**	**0.00**	**0.00**	**369,227.47**		**369,227.47**	**-369,227.47**
	161100 Total:			**0.00**	**0.00**	**0.00**	**369,227.47**		**369,227.47**	**-369,227.47**

Project Number	Project Name	Group	Type	Status
161101	Security Improvements (WTP & B...	Wholesale - General CIP Reserve	Buildings and Groun...	Active

Expenses Account Key	Account Name	GL Account Number	GL Account Name	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Activity	Ending Balance	Budget Remaining
1611012000	Materials - CAP			0.00	0.00	0.00	6,002.53		6,002.53	-6,002.53
		010-15000	Capital - Work In Progress					6,002.53		
1611015000	Services - CAP			0.00	0.00	0.00	3,750.00		3,750.00	-3,750.00
		010-220-54120	Professional Services - Other					3,750.00		
	Total Expenses:			**0.00**	**0.00**	**0.00**	**9,752.53**		**9,752.53**	**-9,752.53**
	161101 Total:			**0.00**	**0.00**	**0.00**	**9,752.53**		**9,752.53**	**-9,752.53**

Project Number	Project Name	Group	Type	Status
161102	Solar Improvement Project (NEMA..	Wholesale - General CIP Reserve	Buildings and Groun...	Active

Expenses Account Key	Account Name	GL Account Number	GL Account Name	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Activity	Ending Balance	Budget Remaining
1611022000	Materials - CAP			0.00	0.00	0.00	1,730.00		1,730.00	-1,730.00
		010-15000	Capital - Work In Progress					1,730.00		
1611025000	Services - CAP			0.00	0.00	0.00	105,000.00		105,000.00	-105,000.00
	GL Account Number	**GL Account Name**						**Activity**		

Project Number	Project Name	Group	Type	Status					
	010-15000	Capital - Work In Progress			105,000.00				
	Total Expenses:				**0.00**	**0.00**	**0.00**	**106,730.00**	**106,730.00**	**-106,730.00**
	161102 Total:				**0.00**	**0.00**	**0.00**	**106,730.00**	**106,730.00**	**-106,730.00**
161103	Control Valve Stations Water Supp..	Wholesale - General CIP Reserve	Transmission and M...	Active					
Expenses Account Key	**Account Name**				**Total Budget**	**Date Range Budget**	**Beginning Balance**	**Total Activity**	**Ending Balance**	**Budget Remaining**
1611032000	Materials - CAP				0.00	0.00	0.00	583.96	583.96	-583.96
	GL Account Number	**GL Account Name**						**Activity**		
	010-15000	Capital - Work In Progress						583.96		
1611035000	Services - CAP				710,717.00	700,000.00	26,381.52	589,400.49	615,782.01	94,934.99
	GL Account Number	**GL Account Name**						**Activity**		
	010-15000	Capital - Work In Progress						620,397.16		
	010-20030	Retentions Payable						-31,008.67		
	050-300-56310	Reg Compliance / Sampling / Inspection						12.00		
	Total Expenses:				**710,717.00**	**700,000.00**	**26,381.52**	**589,984.45**	**616,365.97**	**94,351.03**
	161103 Total:				**710,717.00**	**700,000.00**	**26,381.52**	**589,984.45**	**616,365.97**	**94,351.03**
161104	Hinkle Reservoir Overflow Apron ...	Wholesale - General CIP Reserve	Water Treatment Pl...	Active					
Expenses Account Key	**Account Name**				**Total Budget**	**Date Range Budget**	**Beginning Balance**	**Total Activity**	**Ending Balance**	**Budget Remaining**
1611045000	Services - CAP				0.00	0.00	0.00	2,835.00	2,835.00	-2,835.00
	GL Account Number	**GL Account Name**						**Activity**		
	010-15000	Capital - Work In Progress						2,835.00		
1615045500	Services - NC				7,000.00	7,000.00	0.00	0.00	0.00	7,000.00
	Total Expenses:				**7,000.00**	**7,000.00**	**0.00**	**2,835.00**	**2,835.00**	**4,165.00**
	161104 Total:				**7,000.00**	**7,000.00**	**0.00**	**2,835.00**	**2,835.00**	**4,165.00**
165101	Mainline Replacements - Main Av...	Retail - General CIP Reserve	Distribution System	Active					
Expenses Account Key	**Account Name**				**Total Budget**	**Date Range Budget**	**Beginning Balance**	**Total Activity**	**Ending Balance**	**Budget Remaining**
1651015000	Services - CAP				335,000.00	335,000.00	0.00	4,000.00	4,000.00	331,000.00
	GL Account Number	**GL Account Name**						**Activity**		
	050-15000	Capital - Work In Progress						4,000.00		
	050-300-54150	Professional Services - Service Area Maint						0.00		
	Total Expenses:				**335,000.00**	**335,000.00**	**0.00**	**4,000.00**	**4,000.00**	**331,000.00**
	165101 Total:				**335,000.00**	**335,000.00**	**0.00**	**4,000.00**	**4,000.00**	**331,000.00**
165102	Mainline Replacements - Oak Ave...	Retail - General CIP Reserve	Distribution System	Active					

Project Number	Project Name	Group	Type	Status
165102	Los Lagos Tank Recoring and New...	Retail - General CIP Reserve	Storage Reservoirs ...	Active

Expenses Account Key	Account Name	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Ending Balance	Budget Remaining
1651025000	Services - CAP	310,000.00	310,000.00	0.00	5,360.00	5,360.00	304,640.00

GL Account Number	GL Account Name	Activity
050-15000	Capital - Work In Progress	5,360.00

Total Expenses:	**310,000.00**	**310,000.00**	**0.00**	**5,360.00**	**5,360.00**	**304,640.00**
165102 Total:	**310,000.00**	**310,000.00**	**0.00**	**5,360.00**	**5,360.00**	**304,640.00**

Project Number	Project Name	Group	Type	Status
165103	Los Lagos Tank Recoring and New...	Retail - General CIP Reserve	Storage Reservoirs ...	Active

Expenses Account Key	Account Name	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Ending Balance	Budget Remaining
1651035000	Services - CAP	686,000.00	686,000.00	0.00	0.00	0.00	686,000.00
Total Expenses:		**686,000.00**	**686,000.00**	**0.00**	**0.00**	**0.00**	**686,000.00**
165103 Total:		**686,000.00**	**686,000.00**	**0.00**	**0.00**	**0.00**	**686,000.00**

Project Number	Project Name	Group	Type	Status
165104	Mooney Ridge Hydro-Tank Recoat...	Retail - General CIP Reserve	Storage Reservoirs ...	Active

Expenses Account Key	Account Name	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Ending Balance	Budget Remaining
1651045000	Services - CAP	103,000.00	103,000.00	0.00	0.00	0.00	103,000.00
Total Expenses:		**103,000.00**	**103,000.00**	**0.00**	**0.00**	**0.00**	**103,000.00**
165104 Total:		**103,000.00**	**103,000.00**	**0.00**	**0.00**	**0.00**	**103,000.00**

Project Number	Project Name	Group	Type	Status
165105	Sample Stations Various Locations	Retail - General CIP Reserve	Distribution System	Active

Expenses Account Key	Account Name	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Ending Balance	Budget Remaining
1651052000	Materials - CAP	0.00	0.00	0.00	0.00	0.00	0.00
1651055000	Services - CAP	175,000.00	175,000.00	0.00	0.00	0.00	175,000.00
Total Expenses:		**175,000.00**	**175,000.00**	**0.00**	**0.00**	**0.00**	**175,000.00**
165105 Total:		**175,000.00**	**175,000.00**	**0.00**	**0.00**	**0.00**	**175,000.00**

Group Summary

Group	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Ending Balance	Budget Remaining
Construction	1,636,840.00	16,800.00	5,332,856.88	1,142,548.22	6,475,405.10	-4,838,565.10
Information Technology	84,000.00	55,500.00	152,772.00	74,368.57	227,140.57	-143,140.57
Maintenance	38,000.00	6,000.00	9,755.00	5,875.61	15,630.61	22,369.39
Planning	0.00	0.00	418,556.58	142,079.71	560,636.29	-560,636.29
Retail - General CIP Reserve	4,584,960.00	1,609,000.00	4,033,532.27	1,041,302.53	5,074,834.80	-489,874.80
Wholesale - General CIP Reserve	767,717.00	707,000.00	746,585.45	3,257,526.46	4,004,111.91	-3,236,394.91
Report Total:	**7,111,517.00**	**2,394,300.00**	**10,694,058.18**	**5,663,701.10**	**16,357,759.28**	**-9,246,242.28**

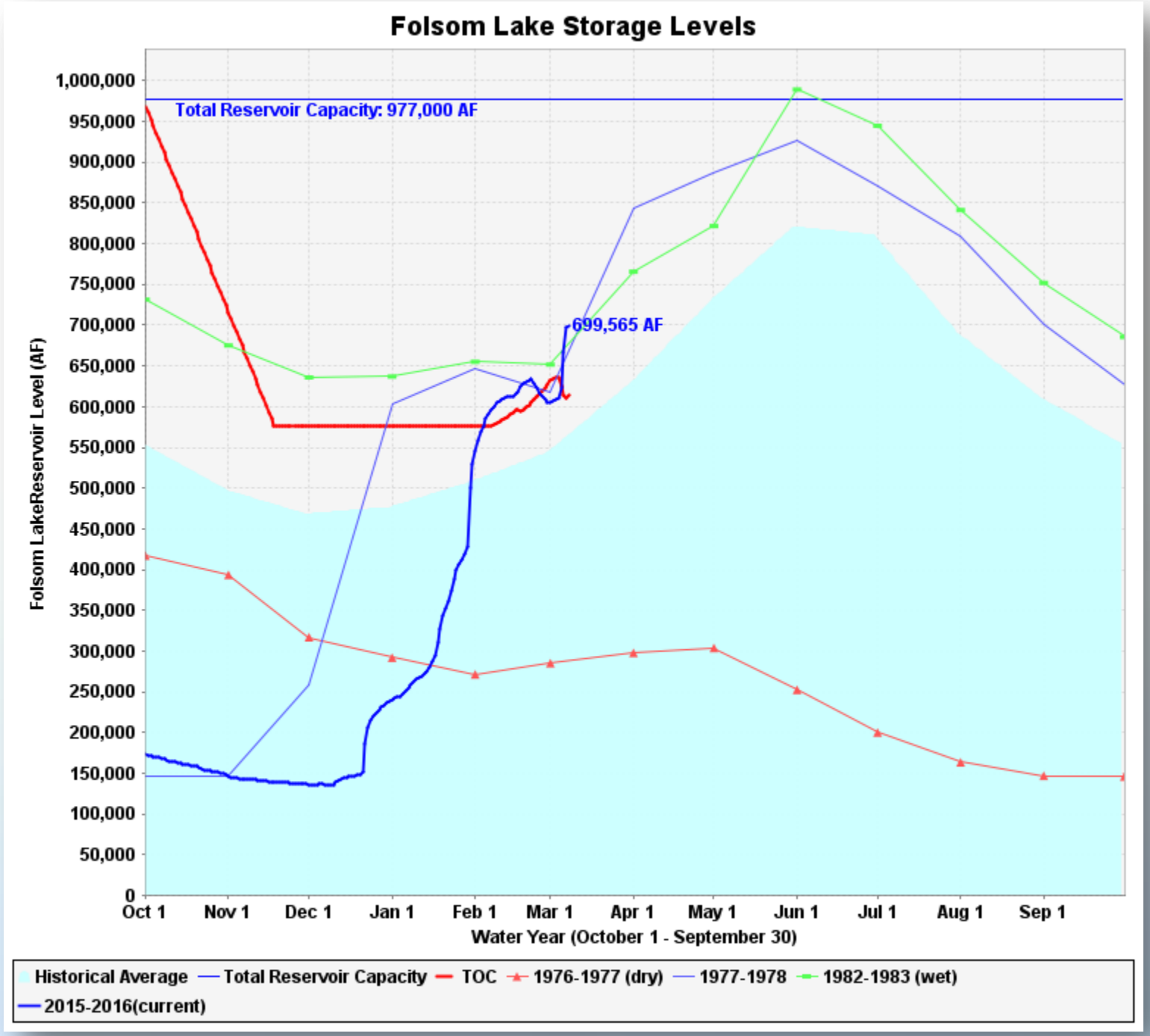
Type Summary

Group	Total Budget	Date Range Budget	Beginning Balance	Total Activity	Ending Balance	Budget Remaining
Buildings and Grounds	0.00	0.00	0.00	116,482.53	116,482.53	-116,482.53
Distribution System	820,000.00	820,000.00	1,605,915.56	1,236,873.54	2,842,789.10	-2,022,789.10
Information Technology - Hardward and...	84,000.00	55,500.00	152,772.00	74,368.57	227,140.57	-143,140.57
Pump Stations	4,646,000.00	0.00	4,540,595.33	3,265,543.93	7,806,139.26	-3,160,139.26
Storage Reservoirs and Tanks	789,000.00	789,000.00	0.00	0.00	0.00	789,000.00
Transmission and Metering	710,717.00	700,000.00	4,369,974.04	589,984.45	4,959,958.49	-4,249,241.49
Water Treatment Plant	61,800.00	29,800.00	24,801.25	380,448.08	405,249.33	-343,449.33
Report Total:	**7,111,517.00**	**2,394,300.00**	**10,694,058.18**	**5,663,701.10**	**16,357,759.28**	**-9,246,242.28**

Water Supply Update

March 9, 2016

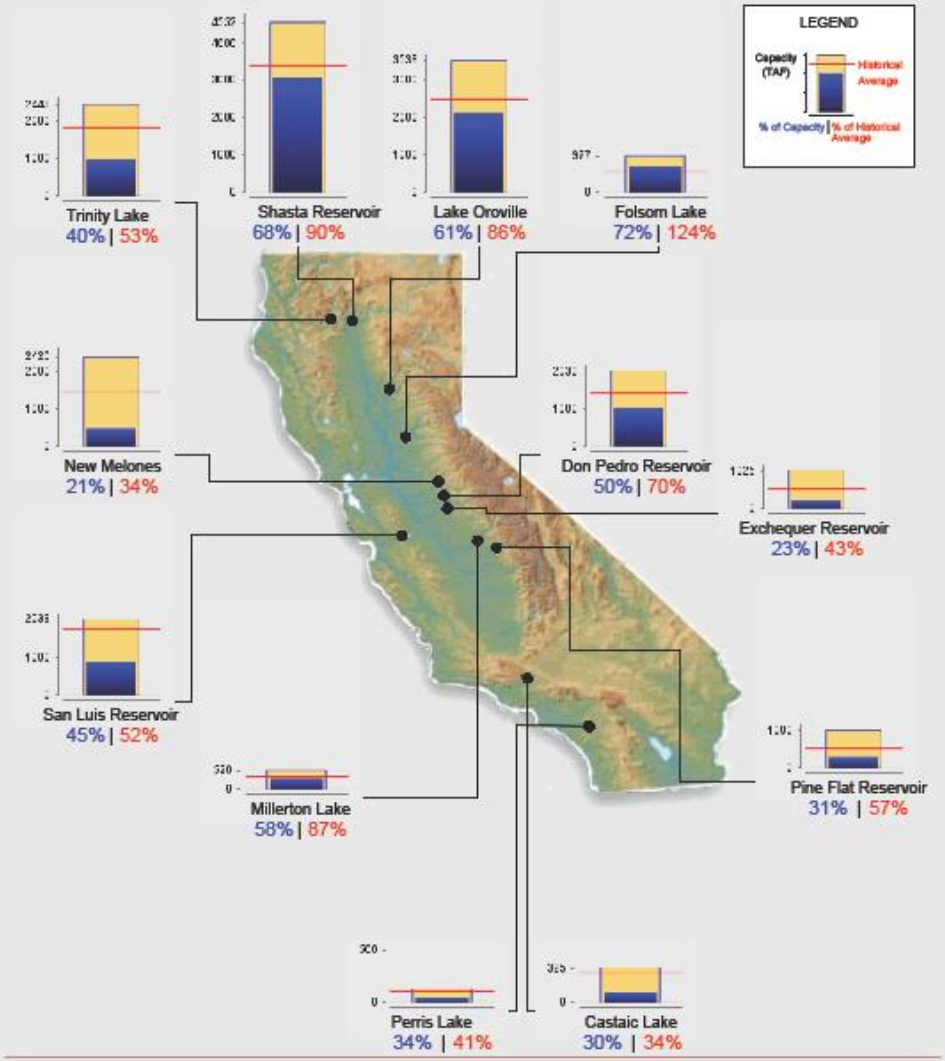
Shauna Lorance
General Manager


Folsom Lake Storage Levels
Total Reservoir Capacity: 977,000 AF
699,565 AF
Folsom LakeReservoir Level (AF)
1,000,000
950,000
900,000
850,000
800,000
750,000
700,000
650,000
600,000
550,000
500,000
450,000
400,000
350,000
300,000
250,000
200,000
150,000
100,000
50,000
0
Oct 1
Nov 1
Dec 1
Jan 1
Feb 1
Mar 1
Apr 1
May 1
Jun 1
Jul 1
Aug 1
Sep 1
Water Year (October 1 - September 30)
Historical Average
Total Reservoir Capacity
TOC
1976-1977 (dry)
1977-1978
1982-1983 (wet)
2015-2016(current)

Reservoir Conditions

Ending At Midnight - March 8, 2016

CURRENT RESERVOIR CONDITIONS



Graph Updated 03/09/2016 02:15 PM

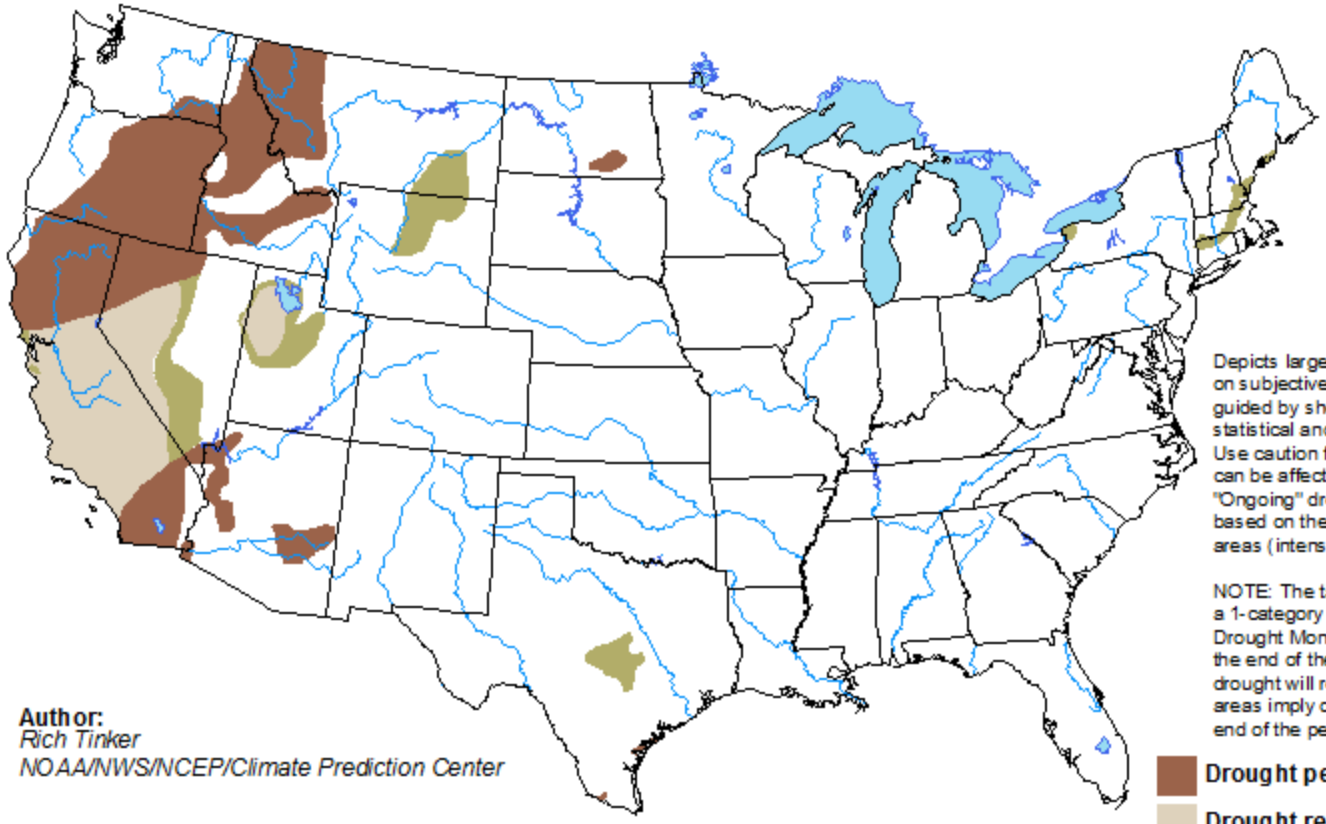
abc10 DAY PLANNER

WED	THU	FRI	SAT	SUN	MON	TUE	WED	THU	FRI
61° 40°	65° 40°	65° 46°	61° 51°	61° 53°	60° 45°	63° 48°	64° 49°	65° 46°	66° 44°
DRY	SHOWERS	RAIN	RAIN		SHOWERS	RAIN		CLEARING	

U.S. Seasonal Drought Outlook

Drought Tendency During the Valid Period

Valid for February 18 - May 31, 2016
Released February 18, 2016



Depicts large-scale trends based on subjectively derived probabilities guided by short- and long-range statistical and dynamical forecasts. Use caution for applications that can be affected by short lived events. "Ongoing" drought areas are based on the U.S. Drought Monitor areas (intensities of D1 to D4).

NOTE: The tan areas imply at least a 1-category improvement in the Drought Monitor intensity levels by the end of the period, although drought will remain. The green areas imply drought removal by the end of the period (D0 or none).

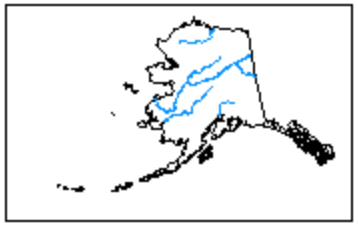
Drought persists

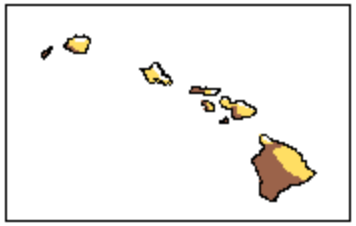
Drought remains but improves

Drought removal likely

Drought development likely

Author:
Rich Tinker
NOAA/NWS/NCEP/Climate Prediction Center





http://go.usa.gov/3eZ73

Current Requirements

- SWRCB reduced mandatory conservation requirement from 36% to 33%
- Customers frustrated at flood releases and mandatory conservation
- Push for removal of conservation requirement
- Drought surcharge tied to conservation stage – tied to conservation requirement
- Remove drought surcharge as soon as conservation requirement removed

SWRCB

Current Situation:

- Folsom is releasing for flood control
- Snowpack about average with March storms
- Shasta at 90% of average for this time of year as of March 8
- Other reservoirs, especially in south, are much lower

Draft Proposal to SWRCB

- Mandatory conservation requirements were to react to an extreme drought emergency
- ARB is not in extreme drought emergency
- USBR is responsible for setting allocations for CVP contractors
- Allocations set based on available water supplies in the CVP system, as well as local area anomalies
- The SWRCB should remove the mandatory conservation requirements for ARB to allow agencies to use their available water supply
- If agencies do not have adequate water supply, they are responsible for determining conservation requirements for their customers
- Agencies encourage voluntary conservation and the 20x2020 requirement

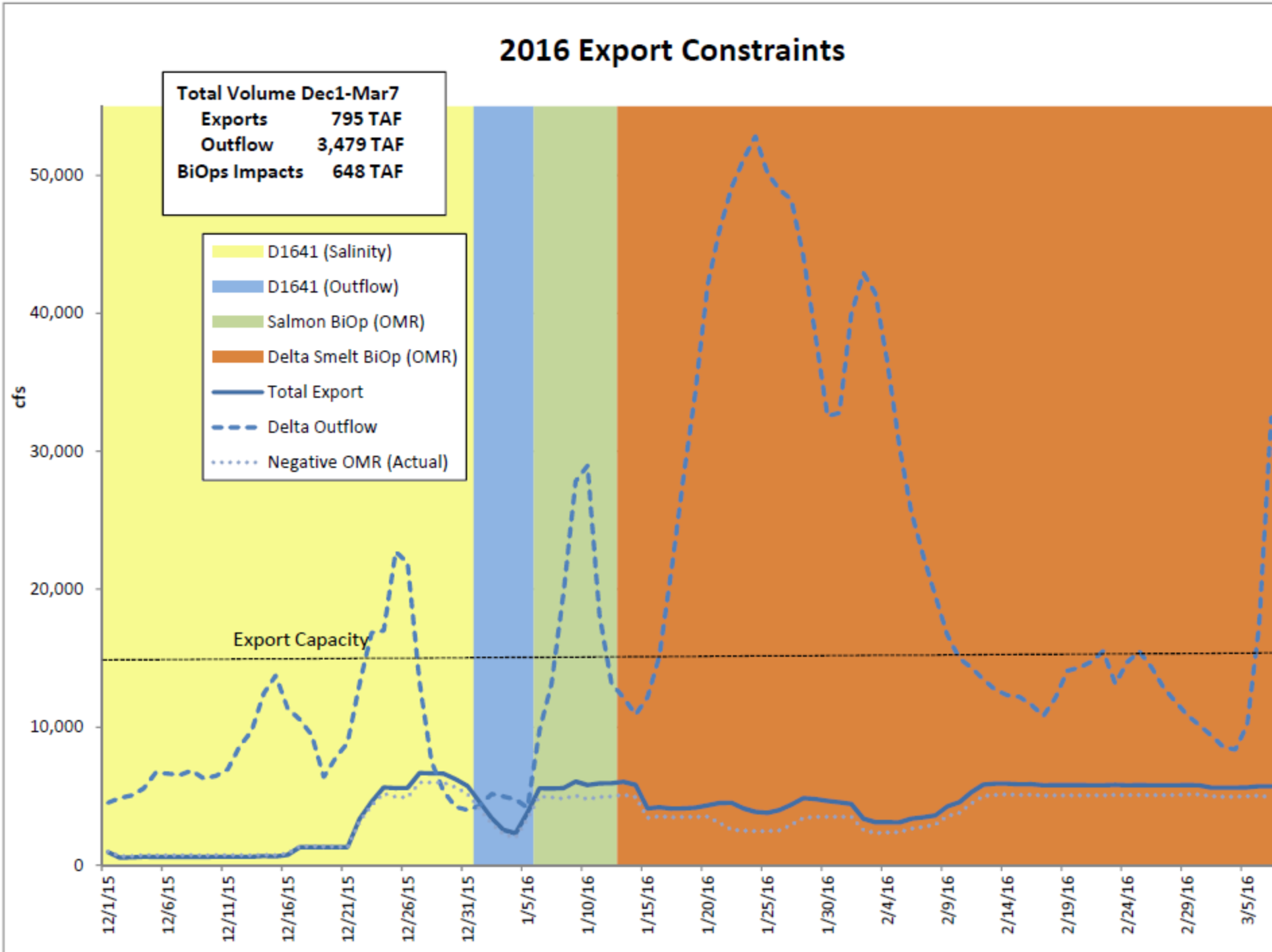
QUESTIONS?

Water Transfers

March 9, 2016

Shauna Lorance
General Manager

2016 Export Constraints



Groundwater Substitution

- **~5000 AF pumped by CHWD and FOWD**
- **~5000 AF GW purchased from SSWD (maybe)**
- **Split purchase price from SCVWD**
- **SSWD disputing right to conduct GW substitution transfer**

Required Actions for GW Substitution

- **Documentation of surface water rights**
- **Method used to quantify the amount of surface water available**
- **Location and characteristics of the wells proposed for use**
- **Historic groundwater pumping in non-water transfer years to establish an appropriate baseline**
- **Proposed volume and schedule of transfer-related gw pumping**
- **Monitoring plan designed to assess the effects of the transfer**
- **Mitigation plan to id any impacts to gw basin**

Agency review criteria

- **Transfer will result in providing the agreed-upon amount of transfer water.**
- **Transfer will not unreasonably affect fish, wildlife, other instream beneficial uses, or the environment and will have no significant unmitigated environmental effects.**
- **Transfer will not injure other legal users of water.**
- **Proposal shows that an adequate monitoring and mitigation plan is in place prior to the transfer to document that the above conditions are met.**

GW substitution checklist (1/5)

- **Seller contact Information**
- **Letter from SGA stating no negative long term impact**
- **Sacramento County approval**
- **Surface water source that will be replaced by groundwater pumping**
- **Identify the surface water rights covering the proposed transfer and provide documentation demonstrating compliance with CEQA**

Checklist continued (2/5)

- **Location, construction details, and other relevant information for each proposed transfer well**
  - **Well Identification: Well owner name and identification number, water district, and district's well identification number**
  - **Well Location: Latitude and longitude**
  - **map with well location and all surface water features within two miles of District boundary**
  - **Well Completion Report**
  - **Well Construction: well depth, depth of annular surface seal, gravel pack interval(s), casing size, casing perforation interval, and well's construction method**
  - **Geologic Log**
  - **Estimated Well Capacity**
  - **Photographic evidence of an instantaneous reading and totalizing flow meter installed on each participating well**
  - **Certification by a Professional Engineer or Professional Geologist of flow meter installation and calibration**
  - **Technical analysis that supports a streamflow depletion factor other than a minimum of 13%**
  - **Additional Information (If available): PG&E well pump efficiency test, independent well drawdown tests, water quality data, and/or site-specific studies with aquifer properties surrounding the well or extent of the well's hydrologic connection with any surface waters**
  - **Pump Power: Verification of an electric power source for each well, or if a pump is diesel or natural gas powered, verification of compliance with California Air Resources Board or local Air Pollution Control District Rules and Regulations.**

Checklist continued (3/5)

- Schedule and volume of water to be pumped
- Proposed Operations: Description of the well's projected operation and the beneficial use of pumped groundwater
- Baseline from which the additional groundwater pumping will be measured
- Historic Operations: Operation records indicating the volume of groundwater pumped from each proposed transfer well for the three previous non- transfer years during the months when transfer pumping will occur; identify and document area(s) normally irrigated by wells.

Checklist continued (4/5)

- **Monitoring Program –The seller shall begin monitoring groundwater levels in March of the transfer year**
  - **Monitoring well network that adequately covers the surface area and aquifer intervals within the affected pumping area(recommend using dedicated monitoring wells)**
  - **Meter readings of instantaneous flow and total discharge volume at each of the transfer wells**
  - **Groundwater level measurements**
  - **Groundwater quality monitoring**
  - **Method to detect land subsidence or a determination that land subsidence is unlikely to occur**
  - **Plans to coordinate data collection and cooperate with regional monitoring efforts**
  - **Data evaluation and reporting**

Checklist Continued (5/5)

- **Mitigation Plan – submit a mitigation plan at the time the transfer proposal is submitted**
  - **A procedure for the seller to receive reports of purported environmental or local economic effects and to report that information**
  - **A procedure for investigating any reported effect**
  - **Development of mitigation options, in cooperation with the affected third parties, for legitimate effects**
  - **Assurances that adequate financial resources are available to cover reasonably anticipated mitigation needs**

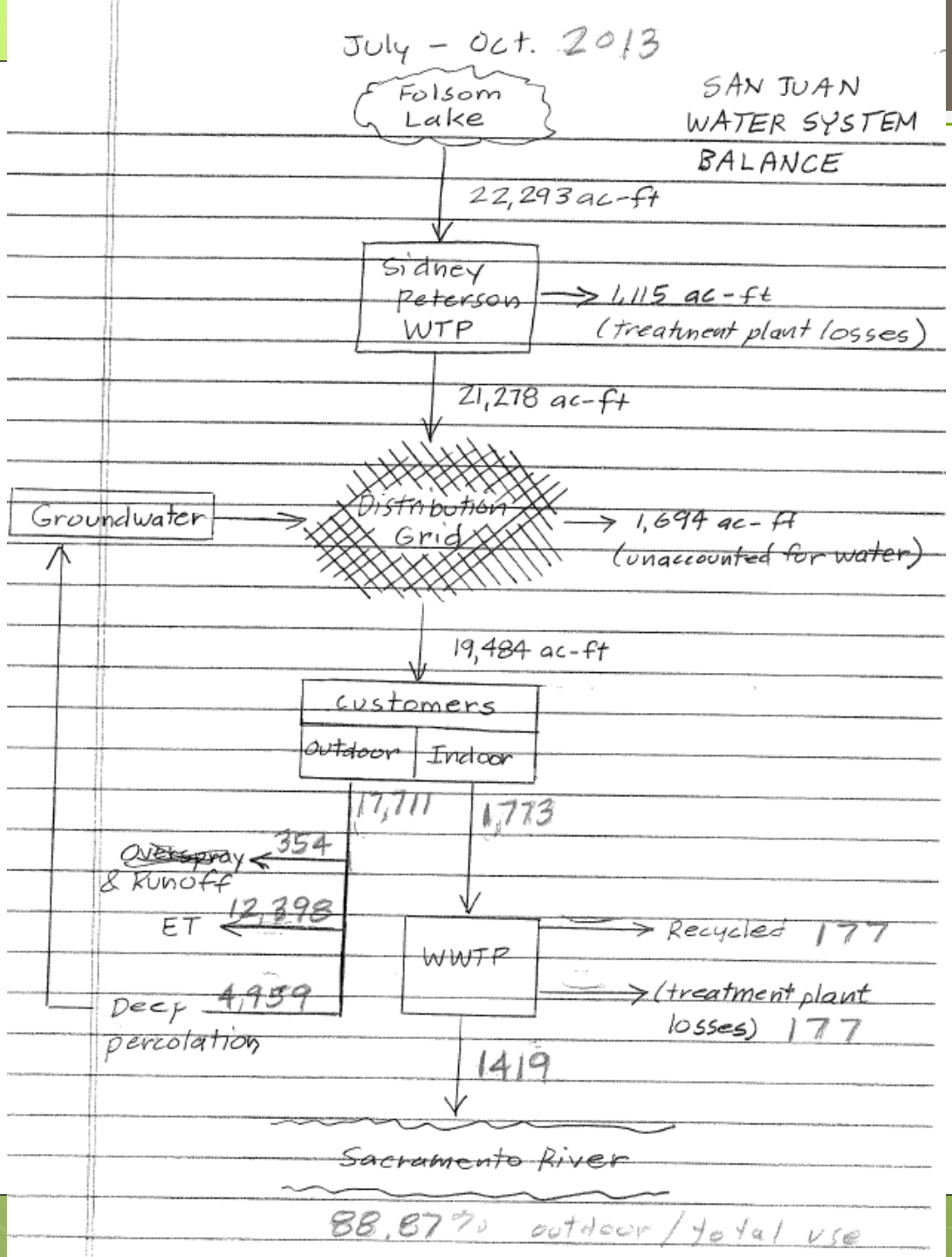
Conserved Water Transfer

Two types

- **One year short term**
  - **Mandatory conservation for upcoming year**
- **Long term**
  - **Commitment of long term conserved water (20x2020)**

Conserved Water Transfer Checklist

- None developed
- SCVWD engineer developing
- Water returned to system vs. new water
- Need to determine
  - Overspray
  - Deep percolation
  - Runoff to storm drain
- Prove specific, measurable actions taken to achieve conservation


July – Oct. 2013
SAN JUAN WATER SYSTEM BALANCE
Folsom Lake
22,293 ac-ft
Sidney Peterson WTP
1,115 ac-ft (treatment plant losses)
21,278 ac-ft
Groundwater
Distribution Grid
1,694 ac-ft (unaccounted for water)
19,484 ac-ft
Customers
Outdoor
Indoor
17,711
1,773
354
Overspray & Runoff
12,398
ET
4,959
Deep percolation
WWTP
Recycled 177
(treatment plant losses) 177
1419
Sacramento River
88.87% outdoor / total use

Data

Water that returns to system

- **Sewer meter flows to determine indoor use**
- **Storm drain flows to determine runoff**
- **Irrigated area**

Next Steps

- **Groundwater substitution**
  - **Binder of checklist items early next week (from CH&FO)**
  - **Provide proposal to USBR (3/17)**
  - **Determine approval process**
  - **Schedule next meeting**
- **Conserved Water**
  - **Confirm proposed calculations/process with USBR (3/17)**
  - **Summarize in white paper**
  - **Develop proposal if applicable this year**
- **Constraint will be delta pumping capacity**

AGENDA ITEM IV-2.1

STAFF REPORT

To: Board of Directors

From: Tony Barela, PE
Operations Manager

Date: March 9, 2016

Subject: SJWD/Fire Department Emergency Response Table Top Training (Chlorine Facility)

ACTION
No action requested; for information only.

BACKGROUND
At the District's Sidney N. Peterson Water Treatment Plant, chlorine in 1-ton containers are stored within the chlorine facility and used for water disinfection; 24 one-ton cylinders of chlorine are maintained on site. Chlorine is an extremely hazardous substance which, if released, can cause serious injury or death. Related to emergency response of a chlorine leak, the Water Treatment Plant is a *non-responding* facility. District treatment operators are classified as "Specialist Employees"; this means that facility personnel will determine the validity of any reported leak, evacuate the area, make proper notifications, and remain onsite as needed to provide technical support to the emergency responders.

In the case of a chlorine leak incident, South Placer Fire District is designated the first responder as they have the closest emergency personnel to the facility; Roseville Fire Department's HazMat Team will provide specialized support, personnel and equipment during an incident. All emergency personnel will work directly with Treatment operations personnel during the response.

The District's Emergency Response Program for Chlorine Releases requires District personnel to perform specific emergency response drills, including on-site orientation for the HazMat Response Team and desktop emergency response exercises every two (2) years. To remain in compliance with the District's safety program, these trainings were conducted between February 22nd to 26th, 2016.

SITE ORIENTATION & EMERGENCY RESPONSE TRAINING
The District, in conjunction with South Placer Fire District and Roseville Fire Department's HazMat Team, conducted an emergency response site orientation and desktop training exercise related to a theoretical 1-Ton chlorine tank rupture/leak. Over three separate training days to encompass all fire department shifts, Treatment staff guided fire department personnel tours of the water treatment plant, focusing on emergency response dangers at the site with a concentration on the chlorine

facility. Upon completion of the tour, in a class room setting, a proposed tank rupture simulation was presented to the fire personnel and treatment staff. The fire personnel, with input from Treatment staff, worked through the scenario and the steps to be taken based on the proposed chlorine leak.

The 3-day coordinated training successfully allowed local fire department personnel to become familiar with the District facilities and the emergency response procedures in place. Lessons learned during the training are also guiding improvements to the District's response plan, to make District personnel and our customers safer in the case of an accidental release.

South Placer Fire District and Roseville Fire Department personnel were professional and proactive in the preparation and execution of the training. Special recognition should be given to Darren McMillin, Battalion Chief, South Placer Fire District and Richard Harlan, Battalion Chief, Roseville Fire Department for their assistance in coordinating the training exercise.