Casitas Municipal Water District
WATER RESOURCES COMMITTEE
Baggerly/Spandrio

November 17, 2020 – 10:00 A.M.

This meeting will be held via teleconference
To attend the meeting please call
(888) 788-0099 or (877) 853-5247
Enter Meeting ID: 955 9887 2924# Passcode:192108

Agenda

1. Roll Call
2. Public Comments
3. Board Comments.
4. Manager Comments.
5. Review Proposed Response to Significant Public Comments on the June 2020 Casitas MWD Draft Comprehensive Water Resources Plan (CWRP)
6. Discussion of Casitas MWD's Water Efficiency Allocation Program (WEAP).

Right to be heard: Members of the public have a right to address the Board directly on any item of interest to the public which is within the subject matter jurisdiction of the Board. The request to be heard should be made immediately before the Board's consideration of the item. No action shall be taken on any item not appearing on the agenda unless the action is otherwise authorized by subdivision (b) of ¶54954.2 of the Government Code.
If you require special accommodations for attendance at or participation in this meeting, please notify our office in advance (805) 649-2251, ext. 113. (Govt. Code Sections 65954.1 and 54954.2(a). Please be advised that members of the Board of Directors of Casitas who are not members of this standing committee may attend the committee meeting referred to above only in the capacity of observers, and may not otherwise take part in the meeting. (Govt. Code Section 54952.2(c)(6)

CASITAS MUNICIPAL WATER DISTRICT
MEMORANDUM

TO: WATER RESOURCES COMMITTEE

FROM: MICHAEL FLOOD, GENERAL MANAGER

SUBJECT: REVIEW PROPOSED RESPONSE TO SIGNIFICANT PUBLIC COMMENTS ON JUNE 2020 DRAFT COMPREHENSIVE WATER RESOURCES PLAN

DATE: 11/17/20

RECOMMENDATION:

It is recommended the Water Resources Committee review proposed responses to significant public comments on the June 2020 Draft Comprehensive Water Resources Plan.

BACKGROUND AND DISCUSSION:

The Board of Directors authorized a consulting services agreement with Stantec in January 2019 to prepare the Comprehensive Water Resources Plan (CWRP). An overview of the draft CWRP was presented at a Board Workshop held on February 8, 2020, and the draft CWRP report was released for public review from June 26, 2020 through August 24, 2020. The draft CWRP report incorporates discussions from 14 public meetings held with the Water Resources Committee prior to its release.

Several public comments were received on the draft CWRP report, which were provided to the Water Resources Committee on September 15, 2020 and the Board of Directors on September 23, 2020. Based on review of comments, staff is recommending a revised draft CWRP report be prepared.

In response to public comments, staff developed the attached phased implementation strategy for the Casitas-Calleguas Interconnection (Attachment 1), which is proposed to be incorporated in a revised draft plan. The phased strategy includes feedback received from the Water Resources Committee at their October 20, 2020 meeting. Staff also continue to regularly meet with Calleguas Municipal Water District staff to better understand issues and options related to our agency's respective water systems.

Additional items to be addressed in response to public comment are summarized in Attachment 2, and are clarifications and corrections in nature.

In October and November 2020, staff received additional comments on the draft CWRP which are included as Attachment 3**.**

In light of recent comments received, staff are proposing that next steps include a Board workshop in January 2021 to review contents of the draft plan, including the basis of planning criteria and hydrologic modeling.

Comprehensive Water Resources Plan
Tentative Meeting Schedule

Date	Meeting	Goal
Nov 17	Water Resources Committee	Discuss Recommendations Regarding Significant Changes to Plan
Dec 9	Board	Provide an update to the Board on CWRP Status
Jan (TBD)	Board	Orientation for New Board Members regarding Contents of CWRP; Make Recommendation to Board Regarding Significant Changes to Plan; Receive direction to proceed with revisions
Feb 16	Water Resources Committee	Review Revised CWRP Document
Mar 10	Board	Receive direction to release revised document for public review

Attachments:

1. Draft Phased Implementation Strategy for Casitas-Calleguas Interconnection
2. Additional Items to be Addressed in a Revised Draft CWRP
3. New Comments received on Draft CWRP in October and November 2020

Casitas Municipal Water District
Draft Comprehensive Water Resources Plan
Phased Implementation Strategy
for Casitas-Calleguas Interconnection

The June 2020 Draft Comprehensive Water Resources Plan (CWRP) evaluates over thirty different water supply alternatives, and makes recommendations on future water supply portfolio based on several criteria including technical, cost, and environmental factors.

The CRWP is a high-level strategic document to help guide water resources planning efforts. The projects included in the evaluation are conceptual and further study regarding feasibility and design is necessary. The recommended projects may evolve as new information becomes available. As such, annual implementation updates are suggested, with updates to the CWRP occurring on a 5-year basis aligned with updates to the Urban Water Management Plan.

Since the release of the June 2020 Draft CWRP, additional questions were raised regarding project SWP 04 (Casitas-Calleguas Interconnection), which was a recommended concept in the plan. SWP 04 allows Casitas to receive State Water deliveries through a potable water pipeline connection to Calleguas, and then through a dedicated pipeline across the City of Ventura to the Casitas distribution system (Figure 1). The SWP 04 alternative has a relatively high capital cost compared with other alternatives. At the same time, SWP 04 provides direct delivery of imported water to Casitas service area, and allows Casitas relatively high decision-making control for implementation, which could be important if a water shortage is imminent.

While SWP 04 is the recommended project, segments of the project could be implemented in phases, and allow Casitas flexibility to continue to evaluate the costs and benefits of other alternatives (e.g. SWP 01, SWP 02, and SWP 05) that depend on actions of other regional water agencies. Partnering with other agencies (Calleguas MWD and/or City of Ventura) may result in financial benefits, but it could delay the timeline for project implementation. The timing of decisions by partner agencies is outside the control of Casitas and is currently unknown. Figure 2 presents a graphic of key implementation actions supporting an adaptive plan, and Table 1 shows the relation of each segment to other alternatives.

Segment 1: Ventura SWP Interconnection

Segment 1 represents a shared pipeline from East Ventura to Calleguas' Springville Reservoir, and would be a joint project between Calleguas, Casitas, and City of Ventura. Various pipe sizes are under evaluation since the constructed size would depend on the level of joint participation. A 24-inch pipeline is being evaluated for the City of Ventura, Casitas, and Calleguas use, and a 36-inch pipeline is being evaluated to include additional capacity dedicated to Casitas. If Casitas participates in construction of the project, the capital costs to Casitas are assumed to include 1/3 of the City of Ventura's costs and an additional incremental cost of upsizing the pipeline from 24 inches to 36 inches if Casitas decides to do so. Preliminary analyses show a 36-inch pipeline would be sufficient to meet Casitas' peaking demands during periods when little to no water is available from Lake Casitas. In a phased plan, Segment 1 should be completed first, since Segments 2 and 3 would not serve any purpose without first constructing Segment 1.

- Estimated Capital Cost to Casitas: $18 million
- Conceptual pipe size: 36 inches (costs reflect ~$9.5 million for Casitas' 1/3 cost share of the City of Ventura's costs of the project, plus ~$8.5 million costs of upsizing the pipeline from 24 inches to 36 inches)
- Length: Approximately 7 miles

The construction of Segment 1 supports future implementation of several SWP alternatives, including SWP 01, SWP 04, SWP 05, and potentially SWP 02. All of these alternatives require additional infrastructure with the exception of SWP 05.

With construction of Segment 1, Casitas could explore partnering with the City of Ventura to implement an In-Lieu program (SWP 05), in which the City of Ventura receives more State Water in lieu of taking deliveries from Lake Casitas. Prior to implementation, the cost of an In Lieu Program must be evaluated with consideration of the revenue collected for sale of water to the City of Ventura, and costs for an in-lieu program would be subject to negotiation.

In order to support future implementation of SWP 02, additional study is needed to evaluate infrastructure needed for Calleguas to receive water from Lake Casitas during an imported water outage. Options for further evaluation include a potential bifurcation from the eastern side of Segment 1 with a new pipeline extension from

Springville to Somis, or other system improvements to be constructed by Calleguas MWD to move water to eastern portions of their system. Additional analysis is also needed to evaluate the increased water in Lake Casitas storage resulting from a regional SWP connection, and the amount of Lake Casitas storage available to Calleguas during its imported water outage.

Segment 2: Casitas-Calleguas Interconnection

This would be a dedicated pipeline constructed by Casitas conveying water across the City of Ventura, from the Ventura SWP Interconnection (Segment 1) to the Casitas-Ventura Interconnection (Segment 3). The City of Ventura is not anticipated to participate in the costs of this pipeline.

Estimated Capital Cost: $81 million

- Conceptual pipe size: 36 inches
- Length: Approximately 10.5 miles

Casitas could construct Segment 2 independently (SWP 04) or pursue cost-sharing opportunities with Calleguas (SWP 02). In order for Calleguas to benefit from cost-sharing, Casitas would need to provide backup water supplies to Calleguas during its imported water outage, and the Segment 2 pipeline would be designed to operate bidirectionally. Additional study is needed to evaluate the increased water in Lake Casitas storage resulting from a regional SWP connection, and the amount of water available to Calleguas during its imported water outage.

Segment 3: Casitas-Ventura Interconnection

This project involves two pump stations and two reservoirs constructed by Casitas to convey water from the existing City of Ventura connection at Olive and Ramona Streets to Casitas' transmission system. This segment makes use of Casitas' existing pipeline and reverses the flow direction to feed Casitas' transmission system. Depending on future implementation decisions (Figure 2), Segment 3 could be constructed with an initial capacity of 10 cubic feet per second (cfs) (Segment 3A), with expansion to the long-term capacity of 30 cfs (Segment 3B) for full implementation. However, Segment 3A may not be warranted and the likely path for implementation is to construct full-scale Segment 3 facilities at the same time Segment 2 is constructed.

Segment 3A

- Estimated Capital Cost: $25 million
- Conceptual capacity: 10 cfs
- Segment 1 and Segment 3A represent the facilities required to implement SWP 01.

Segment 3B

- Estimated Capital Cost: $37 million (includes costs of 3A)
- Conceptual capacity: 30 cfs

Casitas could construct Segment 3B independently (SWP 04) or pursue cost-sharing opportunities with Calleguas (SWP 02). In order for Calleguas to benefit from cost-sharing, Casitas would need to provide backup water supplies to Calleguas during its imported water outage. Additional study is needed to evaluate the increased water in Lake Casitas storage resulting from a regional SWP connection, and the amount of water available to Calleguas during its imported water outage.

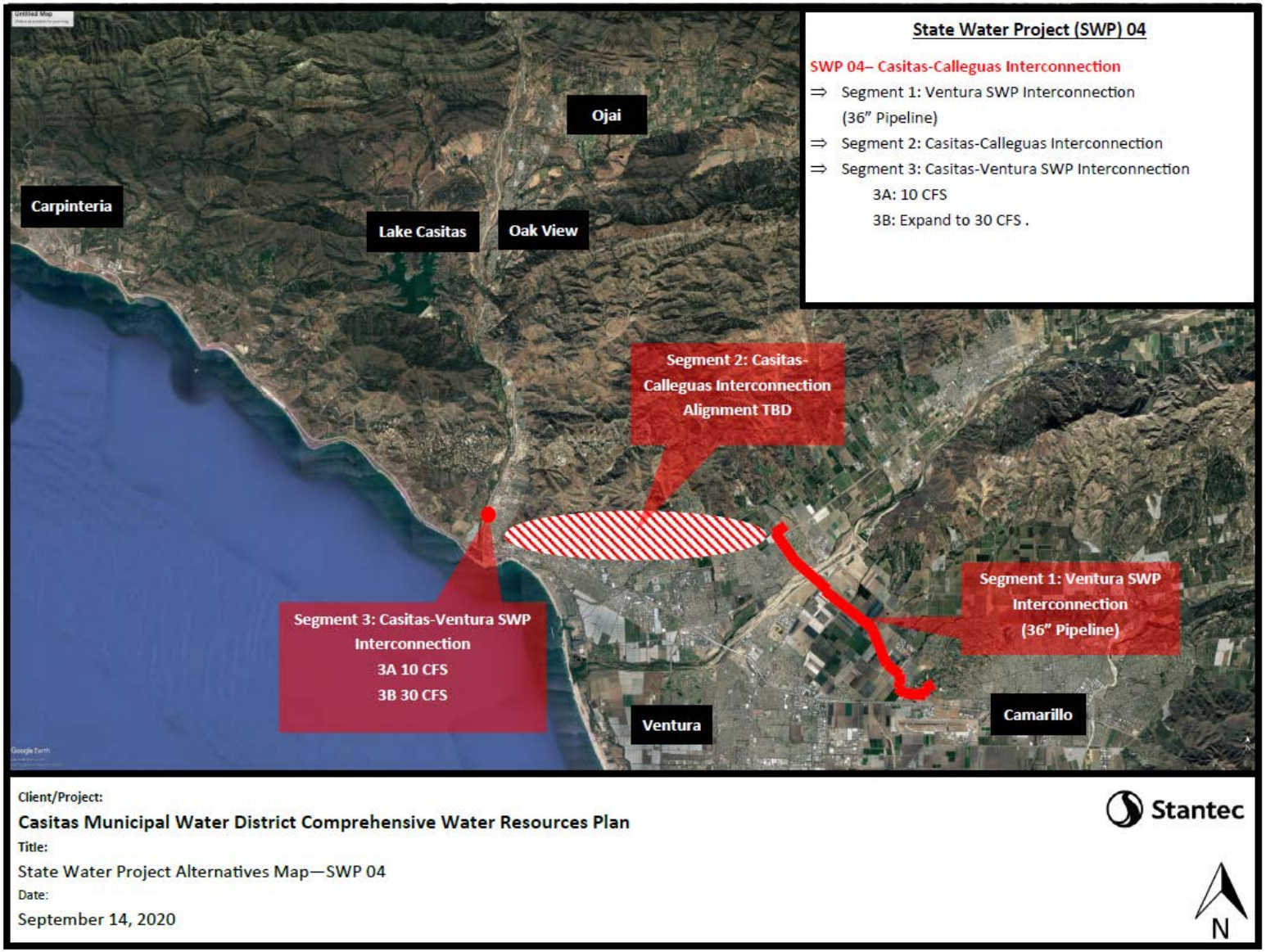
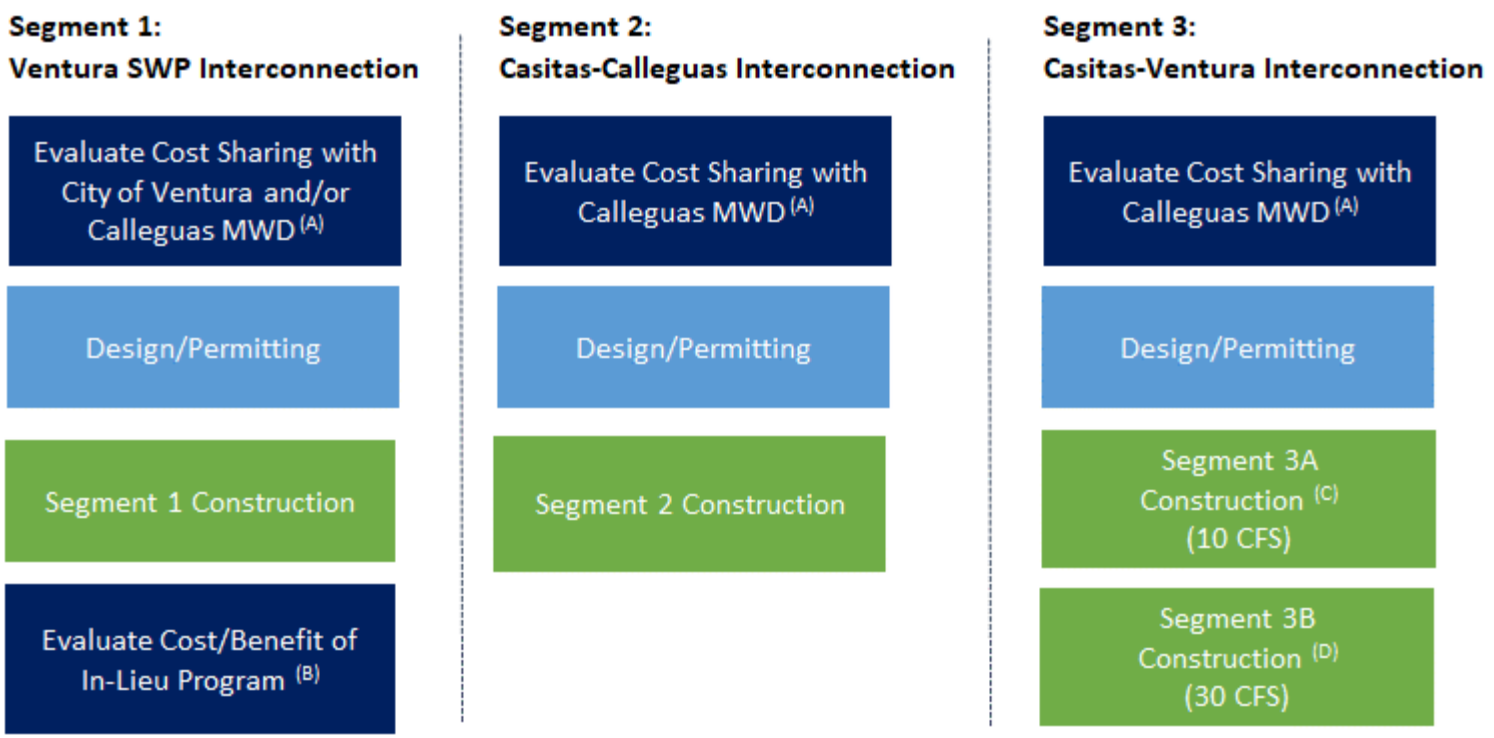


Figure 1. Conceptual Location of Segments 1 through 3



Notes:

(A) SWP 02 may be evaluated for potential cost-sharing with Calleguas MWD.

(B) Costs of In Lieu (SWP 05) would need to be compared against Casitas' revenue from City of Ventura water sales.

(C) Construct Segment 3A only if Segment 1 is constructed, and Segment 2 is not yet constructed, and the City of Ventura has constructed Eastside to Westside Waterline Project.

(D) Construct Segment 3B only if Segment 2 is being constructed.

Figure 2. Proposed Phased Implementation Strategy

Table 1. Relation of each Conveyance Segment to Various Alternatives

	Conveyance Segment		
Alternative	**Segment 1 – Ventura SWP Interconnection**	**Segment 2 – Casitas-Calleguas Interconnection**	**Segment 3 – Casitas-Ventura Interconnection**
SWP 01 - City of Ventura State Water Project Interconnect and Casitas-Ventura State Water Project Interconnection	Upsize Ventura's planned 24-in pipeline to 36-in pipeline	Not used[A]	Construct 10 cfs capacity
SWP 02 - Calleguas Emergency Interconnection with Casitas	Casitas MWD and Calleguas MWD upsize Ventura's planned 24-in pipeline to 36-in pipeline[B]	Casitas MWD and Calleguas MWD construct 36-in pipeline	Casitas MWD and Calleguas MWD expand to 30 cfs capacity
SWP 04 - Casitas-Calleguas Interconnection	Upsize Ventura's planned 24-in pipeline to 36-in pipeline	Casitas MWD constructs dedicated 36-in pipeline	Construct 30 cfs capacity
SWP 05 - City of Ventura Supplemental Water or In-lieu	Upsize Ventura's planned 24-in pipeline to 36-in pipeline	Not used[A]	Not used

[A] Ventura constructs its own Eastside to Westside Waterline Project (which has limited to no benefit to Casitas)

[B] In order for Calleguas MWD to receive a sufficient volume of water to merit investment in the infrastructure, Calleguas MWD would need to construct its own Springville-Somis connection or make other improvements to convey water throughout its system.

Casitas Municipal Water District
Draft Comprehensive Water Resources Plan
Summary of Proposed Changes to be Included in Revised Draft Plan
November 2020

In response to public comments, the following items are proposed to be addressed in a revised draft plan:

1. Incorporate a phased implementation strategy for the Casitas-Calleguas Interconnection (Attachment 1).

2. Include a discussion of the City of Ventura Adjudication lawsuit and its potential ramifications.

3. Clarify reasons for separate analysis of the Ojai system and limitations on use of Ojai groundwater wells.

4. Clarify and expand the discussion in Appendix D regarding evaporation. Include a comparison of estimated annual evaporation at various storage levels, and clarify that "lake demand" = safe demand + evaporation.

5. Add clarification there would be limitations on receiving State Water through the Santa Barbara – Ventura Interconnection when other "wheeling" agencies are simultaneously experiencing drought or emergency conditions requiring their full use of pipeline capacity.

6. Add clarification that further study is needed to understand unused capacity limitations through Metropolitan Water District and Calleguas systems.

7. Update the report to include the latest information regarding the status of the Ventura – Santa Barbara Interconnection.

8. Correct Figure 4-10 on Page 32 to be consistent with Figure 3-3 on page 6 of Appendix E.

9. Add Figure 3-4 on page 7 of Appendix E to the main report.

10. Correct Table 1-2 in Appendix H to reflect a total Yield of 5,200 AFY to be consistent with Table 8-1.

11. Include statement regarding future rate study and/or funding plan.

Neil Cole P.E,
[redacted]

November 3, 2020

Mike Flood
General Manager
Casitas Municipal Water District
1055 Ventura Avenue
Oak View, CA 930

Dear Mike

Thank you for the opportunity to comment on the Draft Casitas Municipal Water District Comprehensive Water Resources Plan. Below are my comments:

1. No justification is provided for selecting 20,000 AF as the cutoff other than for emergencies. An extended drought is an emergency. Therefore this seems to be a "two belts and two suspenders to hold up a tight fitting pair of pants" justification. 20,000 AF, under anything close to a normal rainfall years, with conservation measures in place, is enough water for 3-5 years. This is more than the total drought protection provided my most water supply reservoirs. Casitas was design and managed for a 20 year drought cycle every 50-60 years (see the project report submitted to congress by the Bureau of Reclamation to construct Casitas Dam). Further justification is required for a 20,000 acre pool limit or at the very least a sensitivity analysis to show what happens if a 30,000, 10,000 or dead pool limit is used in the analysis.
2. Page 15-Top of Page-Please reference the regulation. Typical State water law would limit the water use to the Ojai Basin and not just to Ojai Customers.
3. Section 3- I disagree with treating Casitas separate from the Ojai system. It is one District with 3 water sources, Lake Casitas, Upper Ventura Groundwater Basin and the Ojai Groundwater Basin.
4. Section 4.1.1 What is the justification for extending the model to 74 years? This seems arbitrary and results in the model being skewed by including two extended droughts and only one wet (or recovery) time frame. The original time period was selected because it included one wet period (1969-2004) and one extended drought period (1949-1969). Either the model needs to use one dry period and one wet period or two dry periods and two wet periods. The hydrology is available for both. At a minimum, a sensitivity analysis should be done using different time intervals. Casitas is not a typical water reservoir! It is designed and managed for a long term drought (about 20 years) to occur every 50-60 years. This dates back to the original Bureau of Reclamation studies.
5. Section 4.1.3-The logic of this section is baffling. A long term drought is an emergency. See comments in (1).
6. Table 8.1 needs an additional column to be "Cost per AF".

I pretty much stopped my review of the document at this point as comments one through 5 must be resolved before the rest of the report can be rationally reviewed. Thank you again for providing the opportunity to review the report.

Sincerely,

Neil Cole P.E.

October 21, 2020

Dear Richard

I am sending you this memo to initiate a conversation about the information and data I have been able to find that has been provided to the Casitas Municipal Water District regarding future water supply, especially the Comprehensive Water Resources Plan.

I have, as you may know, conducted a great deal of research in the area of water in California, and in Southern California. I will not bore you with my numbers of publications on this issue, including in *Science Magazine*, and the details about being under contract with the State Water Quality Control Board to help develop guidelines for the Urban Water Management Plans. I state this simply to indicate that I have a fair amount of expertise in water, and thus my comments are based on years of scientific and quantitative analysis.

The CWRP is, to put it mildly, inadequate. This does not seem to be a secret, but it needs serious critique for its numerous and misleading flaws and recommendations. I am happy to go through the report page by page with you, if you would find it helpful/useful.

However, there are some top level, general problems that any consultant should have addressed and are deeply problematic relative to decision making by the Casitas Board:

1. Inaccurate and misleading cherry picking of climate science (I was an author on the state's 4th climate assessment and the last national climate assessment, so I am pretty familiar with climate science). The research was thin and tendentious. Precipitation is not expected top decline, but it will be more episodic and come in bigger storms, challenging the state's infrastructure to store the water. However, Sierra snowpack, the back bone of the SWP, is widely modeled to decline, leading to serious supply problems for the SWP as it is engineered for stored snow pack. Finally, precipitation may no longer follow its historic pattern. As we experienced a year ago, Southern California received more precipitation than the places where the SWP sources its water. They were in drought. SWP water cannot be counted on in the same way as in the past.
2. The report does not account for the cost of the prospective Delta bypass in any of its calculations, and how that will affect the price of delivered water. In fact, there is no discussion of the cost of State Water Project delivered water at all. There should be a full cost-benefit analysis and life-cycle cost assessment in any consultant report, and in this case it is critical.
3. The costs need to include Delta bypass pipeline plus annual purchase costs for water and O&M on the new infrastructure. The costs of the Delta project are really up in the air. Prior cost projections have in the neighborhood of $150-400/ac-ft, and more. Casitas customers have no idea what this will cost them, nor the cost of water per acre foot.
4. There is no full discussion of the financial model for paying for the proposed Calleguas pipeline and the allocation of those costs among the rate payers (per hook up) and over time.

5. To reiterate, there should have been a cost discussion of O&M of each of the alternatives presented. A cash flow analysis needs to be included for wet, normal and dry years.
6. There is no acknowledgement and analysis of the SWP's existing overallocation, which is enormously significant. The project has only delivered an average of 2.4 million acre feet annually, as compared to total entitlements of 4.23 million acre feet. These are legal entitlements. Calleguas, while an MWD client, will not rise to the top of the list if there are curtailments, and currently the SWP delivers 20% of what is promised. Casitas needs to be realistic about state water.
7. Any Comprehensive plan needs to actually be comprehensive. The discussion of groundwater is perfunctory at best.
8. The report does not do any analysis of water use by end user, and changes in water demand/consumption over time. This data is available, and I suspect show that water consumption by all sectors is declining. Which can be further reduced and how? If the shortfall is ~ 5,000 a/f, can this be wrung out of existing water use?
9. There is no analysis of cost/affordability of any of the alternatives that is granular enough to make sense: residential cost per acre foot over time, agricultural cost per acre foot over time, commercial the same.
10. There is no "no project" alternative scenario presented.
11. There are no alternative scenarios such as underwriting the ag sector to reduce water use to free up the 5,000 A/F/yr. This shows the consultant either does not know about water use in ag and the range of ag water use per acre in the valley, or is exercising willful ignorance. Both of which are problematic.
12. There needs to be a sophisticated risk analysis conducted on the different alternatives. The costs involve warrant it.

Overall, the report is constructed such that any local (Ojai Valley) solutions are not sufficiently explored. Sadly the report reflects shallow analysis and lack of willingness to engage in potential alternatives to business as usual (BAU). Yet the future of water availability in the state is not BAU. Rather regions in the state need to go beyond the SWP to become resilient. To base any decisions on about solutions for water in the Ojai Valley using the partial and incomplete basis of this report would be a grave disservice to the public as a whole.

Happy to chat.

Stephanie Pincetl
[redacted]

MEMORANDUM

TO: Water Resources Committee

From: Michael L. Flood, General Manager

RE: **Discussion of Casitas MWD's Water Efficiency and Allocation Program (WEAP)**

Date: November 13, 2020

RECOMMENDATION:

The Water Resources Committee continue consideration of the WEAP.

BACKGROUND:

The District's Water Efficiency and Allocation Program was originally developed in response to a combination of historically high water demands and local drought conditions in the late 1980s.

The WEAP has been revised several times including most recently, April of 2019.

Casitas MWD's Comprehensive Water Resources Plan (CWRP) was released to the public in draft form in June 2020.

During the discussion of this item at the August 2020, September 2020 and October 2020 Water Resources Committee Meetings, the Committee asked that this item be added to future Water Resources Committee agendas for discussion.

DISCUSSSION:

During the September 2020 Water Resources Committee meeting, the staff indicated that the Committee should consider health & safety aspects of the setting of WEAP restrictions, especially those that would be put into place for lake levels below the currently-considered threshold of 20,000 Acre-Feet.

20,000 Acre-Feet is the minimum operating volume of Lake Casitas that is contained within Casitas MWD's draft Comprehensive Water Resources Plan and has been discussed amongst the Committee members as a possible 'Stage 6'.

During the October 2020 Water Resources Committee Meeting, the Committee made the following recommendations in regard to the proposed 'Stage 6' demand management measures:

Stage 6 Lake Casitas Volume Criteria = **at or below 20,000 Acre-Feet**

Stage 6 Proposed Demand Management Measures:

1. Residential 'Essential Use' allocations reduced from 10 Units per Month (61.5 Gallons per Capita per Day) to 7 Units per Month (44 Gallons per Capita per Day).

2. Residential 'Non-Essential' allocations are set to zero.

3. Irrigation of Commercial landscaping is prohibited.

4. Casitas Staff to commence close coordination of water demands with wholesale customers.

5. Agricultural and Agricultural-Domestic classifications demand target to be set at 1,800 Acre-Feet per fiscal year with Casitas Staff to present details to the Board of Directors as to how this would be met.

6. Prohibition of new water allocation assignments.

7. Prohibition of water use for construction and dust control.

Next to be considered should be the Lake Level criteria and actions for the previous drought stage, Stage 5. Current Lake Casitas volume criteria and demand management measures are as follows:

Proposed Stage 5 Lake Casitas Volume Criteria: **59,500 Acre-Feet to 20,001 Acre-Feet**

Current Stage 5 Demand Management Measures:

1. All Customer Classifications Stage 1 Allocations Reduced by 30% (Note: Residential 'Non-Essential' allocations are reduced; Essential allocations remain at 10 Units per month.)

2. Continue with Stage 1 through 4 measures:

    a. Landscape watering advised to one (1) watering day per week.

b. Consider prohibition of filling swimming pools and fountains.

c. Require water audits for large water users; implement recommendations of the water audits.

d. Adhere to Water Waste Prohibition Ordinance and State of California laws and regulations regarding water waste

e. Businesses display “save water” signage.

f. Increase public information.

3. Rescind Temporary meters issued.

4. Consider and implement Conservation Penalty for water use in excess of allocation.