Balancing Authority of Northern California

Regular Meeting of the Commissioners of BANC and Strategic Planning Session

10:00 A.M. Wednesday, August 26, 2020 Telephonic Meeting Only

Balancing Authority of Northern California NOTICE OF REGULAR MEETING AND AGENDA

Notice is hereby given that a regular meeting of the Commissioners of the Balancing Authority of Northern California (BANC) will be held on **August 26, 2020** at **10:00 a.m. The meeting will be telephonic only.**

The following call-in information is being provided as the forum by which members of the public may observe the meeting and offer public comment:

Phone number: 1-408-418-9388Public Meeting (Part 2) – 10 a.m. start (access code): 126 197 5661 Public Meeting (Part 1) – 2 p.m. start (access code): 126 697 4225

AGENDA

1 Call to Order.

- 2 Matters subsequent to posting the Agenda.
- **3 Public Comment** any member of the public may address the Commissioners concerning any matter on the agenda.

4 Consent Agenda.

- A. Minutes of the Regular Commission Meeting held on July 22, 2020.
- B. Minutes of the Emergency Commission Meeting held on August 17, 2020.
- C. BANC Operator Report (July).
- D. Compliance Officer Report (August).
- E. PC Committee Chair Report (August).
- F. General Manager's Report and Strategic Initiatives Update.

5 Regular Agenda Items – Discussion and Possible Action.

- A. Grid Conditions Update.
- B. Draft BANC 2021 Budget Preview.

6 BANC Strategic Planning Session – Part I

A. Discussion on Future Roles for BANC in a Changing Energy Landscape.

BREAK

7 **Closed Session:** Conference with legal counsel in anticipation of litigation pursuant to subdivision (c) of Cal. Gov't Code § 54956.9; three matters.

8 BANC Strategic Planning Session – Part II (2:00 p.m. start)

- A. Discussion on Possible Strategic Initiatives for 2020/21.
- B. Action Items and Next Steps.
- 9 Adjournment.

Accessible Public Meetings - Upon request, BANC will provide written agenda materials in appropriate alternative formats, or disabilityrelated modification or accommodation, including auxiliary aids or services, to enable individuals with disabilities to participate in public meetings. Please send a written request, including your name, mailing address, phone number and brief description of the requested materials and preferred alternative format or auxiliary aid or service at least 3 days before the meeting. Requests should be sent to: Kris Kirkegaard, 555 Capitol Mall, Suite 570, Sacramento, CA 95814 or to kirkegaard@braunlegal.com.

Balancing Authority of Northern California

Consent Agenda Items

- A. Minutes of the July 22, 2020 BANC Regular Meeting.
- B. Minutes of the August 17, 2020 BANC Emergency Meeting.
- C. BANC Operator Report (July).
- D. Compliance Officer Report (August).
- E. PC Committee Chair Report (August).
- F. General Manager's Report and Strategic Initiatives Update.

MINUTES OF THE REGULAR MEETING OF THE COMMISSIONERS OF THE BALANCING AUTHORITY OF NORTHERN CALIFORNIA (BANC)

July 22, 2020

On this date, a Regular Meeting of the Commissioners of the Balancing Authority of Northern California (BANC) was held telephonically.

Representatives Present:

Member Agency	Commissioner
Modesto Irrigation District (MID)	James McFall
City of Redding	Dan Beans, Chair
City of Roseville	Michelle Bertolino
Sacramento Municipal Utility District (SMUD)	Arlen Orchard
City of Shasta Lake	James Takehara
Trinity Public Utilities District (TPUD)	Paul Hauser

Agency	Liaison(s)	
Western Area Power Administration (WAPA)	Sonja Anderson	

- 1. <u>Call to Order:</u> Mr. Shetler reviewed attendance and confirmed that a quorum was present. Chair Beans called the meeting to order at 2:00 p.m.
- 2. Matters Subsequent to Posting the Agenda: None.
- 3. <u>Public Comment</u>: Chair Beans invited comments from the public and none were given.
- <u>Consent Agenda</u>: Mr. Hauser moved, Ms. Bertolino seconded, and the participating Commissioners unanimously approved the Consent Agenda items comprised of: (A) Minutes of the Regular Commission Meeting held on June 24, 2020; (B) BANC Operator Report for June; (C) Compliance Officer Report for July; (D) PC Committee Chair Report for July; and (E) General Manager's Report and Strategic Initiatives Update. The City of Shasta Lake was absent.
- 5. Regular Agenda Items Discussion and Possible Action:
 - A. Mr. Shetler provided a status update on EIM Phase 2. BANC is on schedule for an April 1, 2020 Go-Live. Review of EIM Business Practices has been completed by a technical team with representatives from all participating entities. They are currently under review by the Legal Committee, with plans for EIM Committee review and presentation to the Commission for approval in September. An EIM Charge Settlements Allocations Manual has also been developed and will be brought to the Commission for approval in a similar timeframe. Additional documents are under development, including operating guidelines, BANC metering and credit policies, an RS "grace period" proposal, and an enabling agreement for RS products.

BALANCING AUTHORITY OF NORTHERN CALIFORNIA (BANC)

Ms. Bertolino moved, Mr. McFall seconded, and a roll call vote was taken. All Commissioners present voted unanimously in favor of Resolution 20-07-15 *Authorization for Change to EIM and EDAM Budget Allocation Adjustments Based on 3-year Net Energy Load Rolling Average*. The City of Shasta Lake was absent.

- B. Mr. Shetler reported that the Joint Agencies are planning a two-day workshop in late August to present the draft results of their analysis to stakeholders. In advance of that workshop, they plan to do outreach to the Balancing Authorities (BA) to discuss how they have addressed the comments and recommendations made by the BAs. The BAs are expected to be asked to participate on a panel discussion on the second day of the workshop. A final draft report is expected in September for approval by the CPUC, CEC, and CARB later this fall. The report is expected to be submitted to the legislature by January 1, 2021.
- C. Mr. Shetler reviewed the status of the NWPP RA Project with the Commission. Phase 2A of the project, which was intended to review possible structures and legal issues as well as develop an RA program at a conceptual level, concluded in June. A Phase 2B has been proposed to run from July 2020 through the first quarter of 2021. This phase includes hiring a program developer to help define the details of the program, laying out the schedule/details of such a program, and defining a specification to be included in a future RFP for hiring a program administrator to run the program. 17 of 18 entities approved moving forward with Phase 2B; BANC was unable to commit at that time due to the funding requirement, which was over the delegation of the General Manager. Mr. McFall asked how approval of Phase 2B would affect BANC's 2020 budget. Mr. Shetler responded that the there is no adjustment required at this time, but in accordance with the resolution, he would report back to the Commission by October 30, 2020 if any budget adjustment is required to cover any approved expenditures.

Mr. Orchard moved, Ms. Bertolino seconded, and a roll call vote was taken. All Commissioners present voted unanimously in favor of Resolution 20-07-16 Authorization for NWPP RA Project Phases 2A Expenditures and 2B Participation. The City of Shasta Lake was absent.

D. Mr. Shetler reviewed plans for the 2020 Strategic Planning Session, which is scheduled for Wednesday, August 26th from 10 a.m. – 2 p.m. A virtual meeting is planned. The agenda is in the process of being finalized, but current topics under consideration include: member engagement, EIM/EDAM impacts, a GM transition plan update, 2021 budget draft discussions, and strategic initiatives.

6. <u>Closed Session</u>: The Commission retired to closed session at 2:30 p.m. for conference with legal counsel in anticipation of litigation pursuant to subdivision (c) of Cal. Gov't Code § 54956.9; one case.

The Commission adjourned from closed session at 2:48 p.m. where no formal action was taken.

Minutes approved on August 26, 2020.

C. Anthony Braun, Secretary

MINUTES OF THE REGULAR MEETING OF THE COMMISSIONERS OF THE BALANCING AUTHORITY OF NORTHERN CALIFORNIA (BANC)

August 17, 2020

On this date, an Emergency Meeting of the Commissioners of the Balancing Authority of Northern California (BANC) was held telephonically.

Representatives Present:

Member Agency	Commissioner
Modesto Irrigation District (MID)	James McFall
City of Redding	Dan Beans, Chair
City of Roseville	Michelle Bertolino
Sacramento Municipal Utility District (SMUD)	Arlen Orchard
City of Shasta Lake	James Takehara
Trinity Public Utilities District (TPUD)	Paul Hauser

Agency	Liaison(s)
Western Area Power Administration (WAPA)	Jeanne Haas, Carl Dobbs

- 1. <u>Call to Order:</u> Mr. Shetler reviewed attendance and confirmed that a quorum was present. Chair Beans called the meeting to order at 2:00 p.m.
- 2. <u>Public Comment</u>: Chair Beans invited comments from the public and none were given.
- 3. Agenda Items Discussion and Possible Action:
 - A. Mr. Braun briefly reviewed the resolution and conditions precedent for declaring an emergency, thereby allowing the Commission to conduct this emergency meeting.

Mr. McFall moved, Ms. Bertolino seconded, and a roll call vote was taken. All Commissioners voted unanimously in favor of Resolution 20-08-17 *Authorization for Emergency Meeting of the BANC Commission to Respond to Electric System Emergency Conditions.*

B. Mr. Shetler gave an update on system conditions. Topics included: current system status and forecast updates, BANC's public appeal for conservation and August 17th press release, support for CAISO, questions from state legislators and planned responses, and an update on the Governor's Letter and Executive Order. No formal action was taken.

The meeting was adjourned at 2:29 p.m.

Minutes approved on August 26, 2020.

C. Anthony Braun, Secretary



BALANCING AUTHORITY OF NORTHERN CALIFORNIA

P.O. BOX 15830 • D109 • SACRAMENTO • CA 95852 -1830

- TO: BANC Commission
- **RE:** BANC Operator Report for July 2020

Operations:

- BA Operations: Normal
- Significant BA Issues: None
- NWPP Reserve Energy Activations
 - 0 contingency requiring activation of NWPP
 - 0 MW average generation lost
 - 0 MW maximum generation lost
 - Generating unit(s) and date(s) affected: None
 - o All recoveries within 0 minutes
- USF
 - \circ 8 of 31 days with instances of USF mitigation procedure utilized
 - 4 days on Path 66
 - No operational impact on BANC
- BAAL Operation:
 - Maximum duration of BAAL exceedance: 12 minutes
 - Number of BAAL exceedance >10 minutes: 3
 - BAAL violation (BAAL exceedance >30 minutes): None
- Frequency Response (FR) Performance Quarterly Metric:
 - 2020 Frequency Response Obligation (FRO): -14.7 MW/0.1 Hz
 - Q2 Frequency Response Measure (FRM): -23.0 MW/0.1 Hz
 - o Q2 Number of Under-Performed Events: 1 out of 4
 - Q1~Q2 Frequency Response Measure (FRM): -29.4 MW/0.1 Hz
 - Q1~Q2 Number of Under-Performed Events: 1 out of 8

Monthly Notes:

• No additional notes or impacts for July 2020

Modesto Irrigation District, City of Redding, City of Roseville, Trinity Public Utilities District,

City of Shasta Lake, and Sacramento Municipal Utility District

Compliance Officer Report BANC Commission Meeting August 2020

The following summarizes routine issues for the Commission's information and consideration. Any major issues or action items will be identified separately on the Commission agenda for action.

BA Compliance Issues:

- No significant operational Balancing Authority compliance events occurred.
- All required BA compliance reports and operating data were submitted to WECC.
- The most recent self-log of potential non-compliance issues was submitted to WECC on July 15th. There were no BA/PC issues to report. The next periodic self-log submittal deadline is January 1, 2021.
- The BANC Operator has completed its annual update of the BANC BES Cyber System Categorization procedure as required by CIP-002-5.1, Requirement R1.

BANC MCRC:

• The next BANC MCRC meeting is scheduled to be held at 10:00 AM on Monday, August 24, 2020 via webinar.

PC Committee Chair Report BANC Commission Meeting August 2020

The following summarizes Planning Coordinator-related issues for the Commission's information and consideration. Any major issues or action items will be identified separately on the Commission agenda for action.

BANC PC Committee Issues:

- SMUD staff continue to work toward demonstrating compliance with PC-related NERC reliability standards:
 - FAC-010-3 System Operating Limits Methodology for the Planning Horizon Finalized methodology was sent out to PC participants, adjacent TPs and PCs, and RC on July 14th.
 - FAC-013-2 Near-Term Transfer Capability for the Planning Horizon Staff sent out the draft report on July 31st for BANC PC Participants'' review and comments. Comments are due by August 14th.
 - FAC-014-2 Establish and Communicate SOLs Preliminary results were sent out on July 31st for BANC PC Participants" review and comments. Comments are due by August 14th.
 - PRC-012-2 Remedial Action Schemes Staff is currently performing a technical evaluation of each RAS for SMUD and Roseville areas required by the NERC standard once every five full calendar years. The Effective Date of PRC-012-2 is January 1, 2021.
 - PRC-023-4 Transmission Relay Loadability Finalized report was sent out to PC Participants on July 31st.
 - PRC-026-1 Relay Performance During Stable Power Swings Final draft report was sent out to PC Participants on July 30th. Report will be finalized after WECC issues the new 2020 WECC Underfrequency Load Shedding Program Assessment Report so that it's incorporated in the BANC 2020 PRC-026-1 report as well.
 - TPL-001-4 Transmission System Planning Performance Staff finalized the powerflow and stability results and are now developing a draft study report. The draft study report will be sent out on August 14th.

		Estimated	
		%	
	PC Standard	Complete	Notes
1	FAC-002-2 Interconnection Studies	25%	There are 3 materially modifying transmission facilities projects within BANC area this year.
2	FAC-010-3 SOL Methodology for Planning Horizon	100%	Finalized methodology was sent out to PC participants, adjacent TPs and PCs, and RC on 7/14/2020.
3	FAC-013-2 Transfer Capability for Near-Term Planning Horizon	85%	Staff sent out draft report on 7/31/2020 for BANC PC Participants'' review and comments. The comments are due by 8/14/2020.
4	FAC-014-2 Establish and Communicate SOLs	75%	Preliminary results were sent out on 7/31/2020 for BANC PC Participants'' review and comments. The comments are due by 8/14/2020.
5	IRO-017-1 Outage Coordination		Will send out 2020 annual assessment report in October.
6	MOD-031-2 Demand and Energy Data	100%	2020 Loads and Resources supplement Data Request III sent to WECC end of March.
7	MOD-032-1 Data for Power System Modeling & Analysis		Ongoing activity.
8	MOD-033-1 System Model Validation		Data request in August, 2020. (Dependent upon weather)
9	PRC-006-3 Underfrequency Load Shedding	100%	BANC PC Participant data was submitted to the WECC UFLSWG SILTP group. A revised study report from latest study cycle is expected soon to be available from WECC UFLSWG.
10	PRC-010-2 Undervoltage Load Shedding	100%	Study has been completed. The report was finalized on 12/30/2019.
11	PRC-012-2 Remedial Action Schemes	40%	New Standard to be effective on 1/01/2021. Study Plan has been finalized on 4/10/2020. Working on the base cases and contingencies for each RAS scheme.

The table below shows the current status of all PC-related standards:

		Estimated %	
	PC Standard	Complete	Notes
12	PRC-023-4 Transmission Relay Loadability	100%	Finalized report was sent out to PC Participants on 7/31/2020.
13	PRC-026-1 Relay Performance During Stable Power Swings	95%	Finalized draft was sent out to PC Participants on 7/31/2020 pending the 2020 WECC Underfrequency Load Shedding Program Assessment Report to be published by WECC.
14	TPL-001-4 Transmission System Planning Performance	75%	Working on draft report
15	TPL-007-4 R1 GMD	100%	The draft Agreement sent to Members to review on 5/31/2020. Conference call on 6/4/2020 with the BANC's members to discuss the changes in Vulnerabilities Assessment Responsibilities Agreement for the new version of the TPL-007-4. The final TPL-007-4 R1 "the Vulnerabilities Assessment Responsibilities Agreement" has been approved and posted in the BANC PC Member only websites on 6/15/2020.

GM Report BANC Commission Meeting August 26, 2020

I wanted to summarize routine issues for the Commission's information and consideration. Any major issues or action items will be identified separately on the Commission agenda for action.

Outreach Efforts:

Refer to GM outreach report provided under separate distribution. In addition, here are some other noteworthy items:

LADWP/Seattle City Light/SRP/TID/Tacoma Power

Dialogue continues with these entities regarding EIM participation. Based upon the group's discussions, we have agreed to continue to interact on an informal basis to make sure we are on the same page on EIM issues from a POU perspective. We are routinely holding bi-weekly calls to provide updates and discuss issues. To date, we have collaborated with the other POUs on joint language to use in the EIM Entity agreement, on how to address market-based rate authority with DMM, potential common language for OATT revisions, and joint comments on the EIM governance issues. We have also used this forum to discuss POU positions regarding the EDAM development. On April 1, 2020, both SRP and Seattle City Light went live with EIM. Feedback is that the transitions were smooth with no major issues. Both LADWP and BANC – Phase 2 are on track for go-live in April 2021.

POU Western Markets Initiative

BANC continues to participate in this effort, which is being coordinated by APPA. The group continues to evaluate how best to represent the POUs in the everchanging power markets in the West. Our last meeting was a webinar on August 11th which focused on the latest issues with EIM, EDAM, and the WEIS proposed by SPP.

Coronavirus Restrictions

With the increased restrictions on public gatherings and travel, BANC has moved to remote meeting attendance, both for our own internal member meetings as well as outside meetings for the foreseeable future. We will maintain this approach until public health authorities advise the restrictions can be relaxed. In addition, the BANC BA Operator (SMUD) has instituted measures to reduce coronavirus risks, including stay at home for most employees with only essential staff working at the offices.

Market Initiatives:

EIM Participation

The BANC EIM Phase 1 implementation effort was completed on April 3, 2019, with the successful go-live of BANC as the EIM Entity and SMUD as a Participating Resource. We are now monitoring EIM participation. CAISO quarterly benefit reports continue to show that BANC/SMUD is seeing benefits from the EIM participation, with the 2nd Quarter 2020 report showing gross benefits of \$9.17 million. BANC was contacted by a writer for APPA regarding an article on public power experiences with joining the Western EIM, which was included in the latest APPA magazine.

With respect to BANC EIM Phase 2 effort, staff is coordinating with the Phase 2 participants and Utilicast to move forward with implementation. We have reached a tentative agreement on the use of WAPA transmission for EIM. WAPA and an understanding on how the deviation band can support EIM. Discussions continue on metering, Resource Sufficiency/Flex Ramp test approach, CAISO Department of Market Monitoring default energy bids, and individual participant software testing. We have worked with CAISO to resolve some of the unique issues associated with the BANC structure, which currently all seem to meet our needs. In addition, we have finalized an initial draft BANC EIM Business Practices that WAPA has referenced as part of their current OATT and Rates processes. We have completed the legal review of the Business Practices and are looking to bring the final version along with the settlements cost allocation manual back to the EIM Committee for final review in August and to the Commission for approval in September.

EDAM Participation

The EDAM Feasibility Assessment is complete. The CAISO issued an initial EDAM issues white paper on October 10, 2019 and held a stakeholder webinar on October 17. The CAISO requested comments on the issues white paper by November 22, with the EDAM Entities filing joint comments and BANC also filing supporting comments. It is expected that the CAISO will use 2020 and early 2021 to conduct the formal stakeholder process, including development of a straw proposal for EDAM, followed by tariff filings at FERC. The CAISO is currently estimating that an EDAM go live would likely be in spring 2024. The EDAM Entities (including BANC) were active participants in the first EDAM public stakeholder workshop on February 11-12. 2020. Stakeholder comments have been submitted and the EDAM Entities are in the process of digesting the comments to determine our approach going forward. The CAISO issued the initial Bundle 1 straw proposal on July 20th. The CAISO also held a stakeholder meeting on July 27th & 29th, which BANC attended. Comments will be due on September 10th and the EIM Entities are in the process of developing comments on the straw proposal. The EIM Entities also have continued to do outreach to the CA PTOs.

The EIM Governance Review Committee (GRC) issued its straw proposal on July 31, 2020, with comments due by August 28_{th} . The recommendations are consistent with positions that BANC has supported in both the EIM group and POU group. The EIM Entities and POU group are developing comments, which will mainly be supportive of the GRC proposal.

WAPA:

Market Engagement

We have included WAPA-SNR in our EIM Phase 2 planning efforts and WAPA-SNR is an active participant. As noted above, the main discussions with WAPA-SNR have been around the approach for use of WAPA-SNR transmission in EIM and how the deviation band will be handled in EIM. Also, as noted above, we are working proactively with WAPA-SNR to assist them in their OATT and Rates processes for EIM.

WAPA-SNR and BANC have initiated routine calls with NCPA to help facilitate discussions on joint issues.

San Luis Transmission Project

WAPA-SNR has announced its intent to work with the Bureau of Reclamation and CDWR to construct the SLTP. BANC met with WAPA and the other parties to fully understand the implications of having this new transmission project in the BANC BA/WAPA-SNR sub-BA. The SLTP developers (DATC) have completed the open season on the additional capacity for the project. We will keep the Commission informed as more information becomes available.

WECC

WECC Board Meetings

The next MAC and Board meetings are scheduled for September 10-11, 2020, via webinar rather than in person due to COVID-19 concerns. This will be WECC's Annual Meeting and I will plan on attending to the extent my schedule will allow.

NWPP

Resource Adequacy Project

In light of the concerns raised last year regarding resource adequacy (RA) for the PNW entities, NWPP initiated a formal project to develop an RA program for the region. As a NWPP member, BANC has been providing funding for the initial phases of this effort. NWPP updated the participants on June 25th regarding the scope, schedule, and budget for the next phase of this effort (Phase 2B). Based upon the

Commission's approval at the July meeting, staff has proceeded to engage in the Phase 2B effort, with active participation on the project design working groups and steering committee.

CDWR Delta Pumping Load:

BANC is coordinating with SMUD, CDWR, WAPA, and the CAISO regarding how the construction and pumping loads and ancillary services will be provided for this project. The CAISO has reached out to BANC/SMUD/WAPA-SNR regarding contacts for initiating discussions on how CAISO will supply energy for the construction loads in our footprints. With the Governor's announcement that the project will be downsized from two to one tunnel, CDWR has withdrawn the current applications and will be submitting revised environmental documentation. SMUD reported that CDWR has approached them regarding the revised environmental review, which will be performed during 2020.

SB100 Implementation

As part of SB100, the CPUC, CEC, and CARB (Joint Agencies) are required to collaborate with the California BAs to develop a quadrennial report on the status of achieving the goals of SB100. The initial report is due 1/1/21. The four POU BAs (BANC, IID, LADWP, and TID) are collaborating on positions and responses. In addition, we have done outreach to the CAISO, Pacificorp, NV Energy, and WAPA BA's in California to determine if there is benefit to all BAs coordinating on this effort. BANC filed comments with the agencies on 12/2/19. BANC stated that it supported the long-term goals of the State regarding GHG reductions. However, we also cautioned that the transition from the current mix of resources to the long-term resource mix needs to be done in an orderly manner to ensure that grid reliability and affordability can be maintained for the benefit of the end-use consumers. We also supported a "net zero" carbon approach to meeting the goals, at least on an interim basis. I attended the SB100 workshop on 2/24/2020 and participated on a BA reliability panel. Subsequent to the workshop, staff worked with the other POU BAs (LADWP, IID, and TID) regarding comments to the Joint Agencies. Recent feedback from the Joint Agencies was that they intended to have a workshop in late August to discuss their draft report and would reach out to the BAAs in advance of the workshop. To date we have not seen any notice for a workshop or any outreach to the BAAs.

Western Electricity Industry Leaders (WEIL) Group

The WEIL group has done outreach to the Western Governors' Association with a request to hold discussions on how to better coordinate electricity policy in the West. Based upon these discussions, the Western Governors and WEIL have agreed to make use of the Center for a New Energy Economy (CNEE), which is headed by

former CO Governor Ritter, to facilitate further dialogue. The group has agreed to focus discussions around three topics:

- State clean electricity goals and GHG accounting
- Reliability/resource adequacy
- Transmission planning and development.

The goal is to have a set of actionable recommendations that can be presented to the December Western Governors meeting. Staff is monitoring these discussions and is actively participating in the reliability/RA and transmission planning and development work groups.

Strategic Initiatives

An update of the 2019/2020 Strategic Initiatives is attached to this report.

No./Priority	Focus Area	Initiative	Responsibility	Target Due Date	Status
1	INDEPENDENCE	Effectively oversee the BA	tively oversee the BA Jim Shetler Ongoing		See monthly Ops, PC,
Medium		operations.			Compliance, & GM Reports
2		Develop long-term succession	Jim Shetler/Commission	Ongoing	Draft plan discussed with
Medium		plan and traits for General			Commission. Discuss at
		Manager			Strategic Plng. Session
3		Organizational Issues:			Draft of business practices
Medium		~ Develop BANC procedures &	Jim Shetler/BBSW	4th Qtr. 2020	under final review. Ops
		processes as appropriate			Guidelines being drafted.
4	OUTREACH	Engage in industry forums	Jim Shetler	Ongoing	Attend RC West, WECC
Medium		(WECC, Peak, NWPPA, etc.)			Board, WEIL, & NWPP
					Exec. Forum meetings
5		Coordinate with other POU BAs	Jim Shetler	Ongoing	Coordinating with SCL, SRP,
Medium		(Ca and regionally)			LADWP, TP, & TID on EIM
6		Outreach to regulatory and	Jim Shetler/BBSW	Ongoing as	Participating in WEIL group
Medium		legislative bodies on key issues		Necessary	outreach to West governors
7	ASSETS	Evaluate joint options for	Resource Committee	4th Qtr. 2020	
, Medium	ASSETS	resource needs for BA	Resource committee	401 Qtt. 2020	
Wedium		resource needs for BA			
8	MEMBER SERVICES	Identify and outreach to	Jim Shetler	Ongoing	Discussions with WAPA-SNR
Low		potential new BANC members			

Focus Area	Initiative	Responsibility	Target Due Date	Status
INDEPENDENCE	Manage implementation of EIM	Jim Shetler/SMUD	4/1/21	Routine EIM Committee
	Phase 2 participation effort			meetings being held
	Manage EIM Phase 1	Jim Shetler/SMUD	Ongoing	2nd Qtr. CAISO benefits
				show BANC/SMUD = \$9.17M
	EDAM evaluation effort			
		•	-	Coordinating with EDAM SC
	~ CAISO Tariff Development	Jim Shetler/BBSW	1st Qtr. 2021	
OUTREACH	Evaluate opportunities to	Jim Shetler	Ongoing	Coordinating with SCL, SRP,
	engage other entities in market development			LADWP, TID, & Tacoma
	Regional Policy Issues: Monitor/	Jim Shetler/Commission	Ongoing	Participating in WEIL group
	weigh-in where appropriate			outreach to West governors
	Regionalization:			
	~Monitor CAISO GRC effort	Jim Shetler/BBSW	3rd Qtr. 2020	GRC issued straw proposal
				Commenting with EIM Group
	Coordinate with BAs on SB100	Jim Shetler/BBSW	12/31/20	Participated in 2/24/20
	collaboration effort			reliability workshop
				Submitted BANC comments
				3/9/20
ASSETS	Evaluate resource criteria for			Holding discussions at
	BANC long-term needs	Jim S./Res. Com.	4th Qtr. 2020	Resource Committee
MEMBER SERVICES	Evaluate possible support to	Jim S.	4th Qtr. 2020	Finalized software EIM
	INDEPENDENCE	INDEPENDENCEManage implementation of EIM Phase 2 participation effort Manage EIM Phase 1EDAM evaluation effort ~ CAISO Stakeholder Process ~ CAISO Tariff DevelopmentOUTREACHEvaluate opportunities to engage other entities in market developmentRegional Policy Issues: Monitor/ weigh-in where appropriate Regionalization: ~ Monitor CAISO GRC effortASSETSEvaluate resource criteria for BANC long-term needs	INDEPENDENCE Manage implementation of EIM Phase 2 participation effort Jim Shetler/SMUD Phase 2 participation effort Jim Shetler/SMUD Manage EIM Phase 1 Jim Shetler/SMUD EDAM evaluation effort Jim Shetler/SMUD CAISO Stakeholder Process Jim Shetler/BBSW OUTREACH Evaluate opportunities to engage other entities in market development Jim Shetler/Commission Regional Policy Issues: Monitor/ weigh-in where appropriate Jim Shetler/Commission Regionalization: ~Monitor CAISO GRC effort Jim Shetler/BBSW Coordinate with BAs on SB100 collaboration effort Jim Shetler/BBSW ASSETS Evaluate resource criteria for BANC long-term needs Jim S./Res. Com.	INDEPENDENCEManage implementation of EIM Phase 2 participation effortJim Shetler/SMUD4/1/21Manage EIM Phase 1Jim Shetler/SMUDOngoingEDAM evaluation effort ~ CAISO Stakeholder Process ~ CAISO Tariff DevelopmentJim Shetler/BBSW3rd Qtr. 2020OUTREACHEvaluate opportunities to engage other entities in market developmentJim Shetler/Commission Jim Shetler/CommissionOngoingOUTREACHEvaluate opportunities to engage other entities in market developmentJim Shetler/Commission Jim Shetler/CommissionOngoingRegional Policy Issues: Monitor/ weigh-in where appropriate Regionalization: ~ Monitor CAISO GRC effortJim Shetler/BBSW3rd Qtr. 2020Coordinate with BAs on SB100 collaboration effortJim Shetler/BBSW12/31/20ASSETSEvaluate resource criteria for BANC long-term needsJim S./Res. Com.4th Qtr. 2020

Balancing Authority of Northern California

Agenda Item 5B

1. DRAFT BANC 2021 Budget.

BANC 2021 Budget July 2020 - DRAFT

1. Base Budget

- a. General Manager Expenses = **\$339,000**
 - i. Scope: General Manager retainer (@\$27,000/mo.) and expenses (@\$1,250/mo.)
 - ii. Assumptions: No increase in retainer from 2020 and maintain reduced travel expenses
- b. Legal Services (BBMS) = **\$540,000**
 - i. Assumptions: No increase in base legal services from 2020 revision, with the notation that additional legal services may be required based on the level of activity in Market Engagement
- c. NWPP Membership Payments = **\$100,000**
 - i. Scope: Covers NWPP charges to BANC as an NWPP member, including RSG, FRSG, and Executive Forum
- d. Resource Committee Support = **\$100,000**
 - i. Scope: Potential ongoing engagement in NWPP Resource Adequacy Project, potential consultant support for evaluating IRP recommendations and coordination with members, and potential consultant support for SB100 report engagement.
- e. Asset Valuation = **\$1,025,708**
 - i. Energy Management System
 - 1. Assumptions:
 - a. Amortized capital cost, excluding EIM module (BANC share) = \$517,238
 - Annual Siemens support cost (BANC share) = \$113,470
 - c. Revised to reflect latest capitalization amount for Siemens EMS upgrade (\$5,508,835) and annual support services (\$263,883) both excluding EIM module. Assumes capital investment is amortized over 5 years @ 3%/year. BANC share of EMS capital and support services costs is 43%.
 - 2. Total = \$630,708

- ii. Energy Management Center/Backup Control Center
 - 1. Assumptions:
 - a. Total estimated amount for EMC+BCC= \$~1,300,000/year
 - b. TOP/BA share is 76% = \$988,000
 - 2. BANC share of TOP/BA= 40% = \$395,200
- f. Administrative Expenses = **\$9,400**
 - i. Annual Audit Fees = \$8,500
 - ii. Bank Charges = \$900
- g. Sub-total = **\$2,114,308**
- h. Contingency: **\$100,000**

Total = **\$2,214,308**

Member Breakdown Comparison of 2021vs.2020 Base Budgets (based upon 2019 NEL):

MEMBER ALLOCATION		2021	2020 - R2	20	020 Original
SMUD (70.1%)	\$	1,534,704.91	\$ 1,446,198.14	\$ 3	1,640,238.14
MID (16.2%)	\$	354,667.90	\$ 346,419.76	\$	392,899.76
ROSEVILLE (7.6%)	\$	166,387.41	\$ 164,862.41	\$	186,982.41
NOSEVILLE (7.070)	Ŷ	100,557.41	\$ 104,802.41		100,502.41
REDDING (4.8%)	\$	105,086.78	\$ 104,343.30	\$	118,343.30
SHASTA LAKE (1.3%)	\$	28,461.00	\$ 25,042.39	\$	28,402.39
Subtotal \$		2,189,308.00	\$ 2,086,866.00	\$2	2,366,866.00
TPUD (fixed)	\$	25,000.00	\$ 25,000.00	\$	25,000.00
TOTAL	\$	2,214,308.00	\$ 2,111,866.00	\$2	2,391,866.00

2. Participation Agreement #1 (PA-1) – PC Services

- a. Assumptions:
 - i. SMUD to provide contract PC services to BANC
 - ii. Total Base Cost to BANC = \$399,400
 - 1. Main PC evaluation labor = \$250,000
 - 2. \$35,000 for labor to perform an overview assessment of full BANC footprint
 - 3. Labor rate adjustment of 4.0% = \$11,400
 - 4. A \$3,000/year charge for GE PSLF Geomagnetic Disturbance (GMD) Tool.
 - 5. Cost of GMD monitor installed at one substation in accordance with NERC Standard TPL-007-2 for a one-time estimated charge of \$100,000.
 - iii. WAPA-SNR does not participate, TPUD and Shasta Lake embedded within WAPA-SNR; all other members participate
 - iv. Cost to be allocated based upon 50% to SMUD and 50% to remaining members prorated by share of generation/60kV and above buses among the remaining members:
 - 1. SMUD = (50%)
 - 2. MID = (30%)
 - 3. Redding = (9.5%)
 - 4. Roseville = (10.5%)
- b. Estimated costs by member:

MEMBER	PA-1 ASSESMENT			
SMUD (50%)	\$	199,700.00		
MID (30%)	\$	119,820.00		
REDDING (9.5%)	\$	37,943.00		
ROSEVILLE (10.5%)	\$	41,937.00		
TOTAL	\$	399,400.00		

- 3. Participation Agreement #2 (PA-2) RC Funding
 - a. Assumptions
 - i. BANC transitioned from Peak RC to RC West (CAISO) for RC services on 7/1/19 and will provide RC services going forward.
 - ii. RC West Funding
 - 1. TPUD and Shasta Lake embedded within WAPA-SNR, which becomes a TOP Funding Party under CAISO RC West tariff
 - 2. MID and SMUD become TOP Funding Parties under CAISO tariff
 - 3. BANC pays the remaining amount allocated to the BA footprint per CAISO tariff for Redding and Roseville
 - 4. RC West 2021 charge-out rates = \$0.0267/MWH
 - 5. 2019 NEL for remaining BANC footprint:
 - a. Roseville = 1,182,626 MWH
 - b. Redding = 748,983 MWH
 - b. Estimated costs under PA-2 based upon RC West proposed rates for Roseville and Redding:

		_	
MEMBER	2019 NEL - MWH	20	21 ASSESSMENT
ROSEVILLE REDDING	1,182,626 748,983	\$ \$	31,576.11 19,997.85
TOTAL	1,931,609	\$	51,573.96

- 4. Participation Agreement #3 (PA-3) EIM Implementation (Phase 1) CLOSED
- 5. Participation Agreement #4 (PA-4) Extended Day-Ahead Market (EDAM) Evaluation
 - a. Assumptions
 - i. BANC participates in the EDAM as an EIM/EDAM Entity
 - All Participating Resources (SMUD, MID, WAPA-SNR, Roseville, and Redding) participate in effort. (NOTE: Shasta Lake loads assumed part of Redding load for this allocation). Cost allocation based upon 3-year rolling average as follows:
 - 1. SMUD 64.3%
 - 2. MID 14.6%
 - 3. WAPA-SNR 8.6%
 - 4. Roseville 6.9%
 - 5. Redding 5.6%
 - iii. Formal CAISO stakeholder process completed by end of 2021
 - iv. CAISO tariff filings, FERC review process, and market implementation mid-2022 late 2023
 - v. EDAM "go-live" no earlier than Spring 2024
 - b. Estimated costs for EDAM evaluation under PA-4 are initial estimates based upon discussions among the EIM entities, CAISO, and BANC staff, including BBSW support at fixed monthly fee of \$15,500/month and consultant support as noted.

IMPLEMENTATION	СОЅТ					
CATEGORY	ESTIMATE	SMUD	MID	WAPA-SNR	ROSEVILLE	REDDING
Legal Support Consultant Support	\$ 186,000.00	\$ 119,598.00	\$ 27,156.00	\$ 15,996.00	\$ 12,834.00	\$ 10,416.00
~ Cost Eval. (Utilicast) ~ Update Ben. Analysis	\$ 25,000.00	\$ 16,075.00	\$ 3,650.00	\$ 2,150.00	\$ 1,725.00	\$ 1,400.00
(Brattle)	\$ 20,000.00	\$ 12,860.00	\$ 2,920.00	\$ 1,720.00	\$ 1,380.00	\$ 1,120.00
~ Market Dev, Spt. (CES)	\$ 31,250.00	\$ 20,093.75	\$ 4,562.50	\$ 2,687.50	\$ 2,156.25	\$ 1,750.00
~ Total	\$ 76,250.00	\$ 49,028.75	\$ 11,132.50	\$ 6,557.50	\$ 5,261.25	\$ 4,270.00
Total Estimate	\$ 262,250.00	\$ 168,626.75	\$ 38,288.50	\$ 22,553.50	\$ 18,095.25	\$ 14,686.00
Contingency (~20%)	\$ 45,000.00	\$ 28,935.00	\$ 6,570.00	\$ 3,870.00	\$ 3,105.00	\$ 2,520.00
TOTAL for 2021	\$ 307,250.00	\$ 197,561.75	\$ 44,858.50	\$ 26,423.50	\$ 21,200.25	\$ 17,206.00

- 6. Participation Agreement #5 (PA-5) EIM Participation
 - a. Assumptions
 - i. Phase 1 (BANC/SMUD only) 1/1/2021 3/31/2021
 - ii. Phase 2 (BANC/SMUD/MID/Roseville/Redding/WAPA-SNR) 4/1/2021 – 12/31/2021
 - Phase 1 costs allocated to SMUD only; Phase 2 costs allocated in accordance with 3-year rolling average NEL for all five participants as follows:
 - 1. SMUD 64.3%
 - 2. MID 14.6%
 - 3. WAPA-SNR 8.6%
 - 4. Roseville 6.9%
 - 5. Redding 5.6%
 - b. Cost estimates based on EIM Services Agreement, and latest estimates, including winddown support from Utilicast from 5/1/2021 – 9/30/2021, software charges per contracts, and CES contract for support on CAISO EIM processes. Includes 3.5% adjustment for SMUD labor.
 - c. Allocation of TPUD load settlement charges assigned to SMUD/MID/Redding/Roseville per original agreement. Load based settlement charges assumed at \$25,000 for 9 months of EIM operation in 2021.

					Participant	Cost	Allocations	
IMPLEMENTATION CATEGORY	TOTAL ESTIMATE	PHASE 1: 1/1-3/31	PHASE 2: 4/1-12/31	SMUD	MID	WAPA-SNR	ROSEVILLE	REDDING
Personnel - EIM Desk (5)	\$1,691,969.00	\$ 422,992.25	\$ 1,268,976.75					
Personnel - Settlements (1.5)	\$ 629,396.00	\$ 157,349.00	\$ 472,047.00					
Personnel - Outage Mgmt (0.4)	\$ 135,358.00	\$ 33,839.50	\$ 101,518.50					
Personnel - Netwk Model (1)	\$ 285,534.00	\$ 71,383.50	\$ 214,150.50					
Personnel - Meter Data Mgmt (0.5)	\$ 42,267.00	\$ 10,566.75	\$ 31,700.25			•		
Personnel - SME/Oversight (0.4)	\$ 182,486.00	\$ 45,621.50	\$ 136,864.50					
Personnel - IT Support (0.25)	\$ 59,542.00	\$ 14,885.50	\$ 44,656.50					
Personnel Total (9.05)	\$3,026,552.00	\$ 756,638.00	\$ 2,269,914.00					
EIM Software Support								
- OATI	\$ 90,000.00	\$-	\$ 90,000.00					
- Power Settlements	\$ 542,900.00	\$-	\$ 442,900.00		\$ 50,000.00			\$ 50,000.00
- ITOA	\$ 20,000.00	\$ 5,000.00	\$ 15,000.00					
- WebEIM	\$ 40,000.00	\$ 10,000.00	\$ 30,000.00					
EIM Software Support Total	\$ 692,900.00	\$ 15,000.00	\$ 577,900.00					
EMS EIM Module								
- Amortized Capital	\$ 52,978.00	\$ 13,244.50	\$ 39,733.50					
- O&M Support	\$ 10,000.00	\$ 2,500.00	\$ 7,500.00					
EMS EIM Module Total	\$ 62,978.00	\$ 15,744.50	\$ 47,233.50					
EIM OPERATOR TOTAL	\$3,782,430.00	\$ 787,382.50	\$ 2,895,047.50	\$2,648,898.04	\$472,676.94	\$248,974.09	\$199,758.28	\$212,122.66
Miscellaneous Support								
- Legal Support - EIM Stakeholder	\$ 30,000.00	\$ 7,500.00	\$ 22,500.00					
Support (CES)	\$ 18,750.00	\$-	\$ 18,750.00					
- Utilicast Ramp Down	\$ 140,000.00	\$ -	\$ 140,000.00					
Miscellaneous Support Total	\$ 188,750.00	\$ 7,500.00	\$ 181,250.00					
CAISO Charges								
- Fees	\$ 250,000.00	\$ 62,500.00	\$ 187,500.00					
- Uplifts	\$ 500,000.00	\$ 125,000.00	\$ 375,000.00					
CAISO Charges Total	\$ 750,000.00	\$ 187,500.00	\$ 562,500.00					
TOTAL EIM Operations for 2021	\$4,721,180.00	\$ 982,382.50	\$ 3,638,797.50	\$3,322,129.29	\$581,264.44	\$312,936.59	\$251,077.03	\$253,772.66
TPUD Load Charges	\$ 25,000.00	\$-	\$ 25,000.00	\$ 17,600.000	\$ 4,000.000	\$ -	\$ 1,900.000	\$ 1,500.000
TOTAL EIM FOR 2021	\$4,746,180.00	\$ 982,382.50	\$ 3,663,797.50	\$3,339,729.29	\$585,264.44	\$312,936.59	\$252,977.03	\$255,272.66

- 7. Participation Agreement #6 (PA-6) EIM Phase 2 Preparation (Revision 1 5/15/19) CLOSED
- 8. Participation Agreement # 7 (PA-7) EIM Phase 2 Implementation
 - a. Assumptions:
 - i. MID, Redding, Roseville, and WAPA-SNR/Reclamation are Phase 2 BANC EIM Participants as Participating Resources. BANC will be the EIM Entity. Shasta Lake loads within Redding.
 - ii. EIM Phase 2 Implementation with CAISO will complete with go-live no later than April 1, 2021.
 - iii. Cost estimates are based upon GridSME report, EIM Phase 2 Gap Analyses, and current best estimates. Includes Utilicast costs, SMUD PM support, senior settlements position, final software estimates, and final CAISO implementation fee. Contingency at 5%.
 - iv. Costs will be shared among the four participants based upon a 3year rolling average NEL as follows:
 - 1. MID: 41.0%
 - 2. WAPA-SNR: 24.1%
 - 3. Roseville: 19.4%
 - 4. Redding: 15.5%

IMPLEMENTATION CATEGORY C		COST ESTIMATE		MID		REDDING		ROSEVILLE		WAPA	
Utilicast Support	\$	174,280.00	\$	71,454.80	\$	27,013.40	\$	33,810.32	\$	42,001.48	
Software Upgrades	\$	260,000.00	\$	106,600.00	\$	40,300.00	\$	50,440.00	\$	62,660.00	
SMUD PM & Settle. Support	\$	200,200.00	\$	82,082.00	\$	31,031.00	\$	38,838.80	\$	48,248.20	
Legal Support	\$	33,000.00	\$	13,530.00	\$	5,115.00	\$	6,402.00	\$	7,953.00	
CAISO Implementation Fees	\$	35,000.00	\$	14,350.00	\$	5,425.00	\$	6,790.00	\$	8,435.00	
Total Estimate	\$	702,480.00	\$	288,016.80	\$	108,884.40	\$	136,281.12	\$	169,297.68	
Contingency @~5%	\$	35,124.00	\$	14,400.84	\$	5,444.22	\$	6,814.06	\$	8,464.88	
TOTAL for 2021	\$	737,604.00	\$	302,417.64	\$	114,328.62	\$	143,095.18	\$	177,762.56	

9. 2021 BANC Member Assessments

MEMBER	BASE BUDGET	PA-1: PA/PC	PA-2: RC West	PA-4: EDAM	PA-5: EIM Part.	PA-7: EIM P2 Imp	2021 TOTAL	2020R2 TOTAL
SMUD	\$1,534,704.91	\$199,700.00	\$ -	\$197,561.75	\$3,339,729.29	\$ -	\$5,271,695.95	\$5,162,623.64
MID	\$ 354,667.90	\$119,820.00	\$ -	\$ 44,858.50	\$ 585,264.44	\$ 302,417.64	\$1,407,028.48	\$1,469,199.13
ROSEVILLE	\$ 166,387.41	\$ 41,937.00	\$ 31,576.11	\$ 21,200.25	\$ 252,977.03	\$ 143,095.18	\$ 657,172.98	\$ 735,044.60
REDDING	\$ 105,086.78	\$ 37,943.00	\$ 19,997.85	\$ 17,206.00	\$ 255,272.66	\$ 114,328.62	\$ 549,834.91	\$ 476,573.39
SHASTA LAKE	\$ 28,461.00	\$-	\$-	\$-	ş -	\$ -	\$ 28,461.00	\$ 25,042.39
TPUD	\$ 25,000.00	\$-	\$-	\$ -	\$ -	\$-	\$ 25,000.00	\$ 25,000.00
BANC TOTAL	\$2,214,308.00	\$399,400.00	\$ 51,573.96	\$280,826.50	\$4,433,243.42	\$ 559,841.44	\$7,939,193.32	\$7,893,483.15
WASN	\$ -	\$ -	\$ -	\$ 26,423.50	\$ 312,936.59	\$ 177,762.56	\$ 517,122.65	\$ 781,622.31
GRAND TOTAL	\$2,214,308.00	\$399,400.00	\$ 51,573.96	\$307,250.00	\$4,746,180.01	\$ 737,604.00	\$8,456,315.97	\$8,675,105.46