



## Aquatic, Water Quality, Geomorphology, & Hydrology Resources Water Balance Model Subcommittee

### Technical Working Group Meeting

**Date:**

**Time:**

**Location:**

**Directions**

**Discussion Topic:**

**Agenda**

**Attendees**

**Summary**

**Handouts, Attachments & Presentations**

## **Directions to SMUD's Customer Service Center**

SMUD has two four-story buildings located adjacent to Highway 50 on the north side, between 59th Street exit and 65th Street exit. The Customer Service Center (CSC) is the newer building of the two located at 6301 S Street, and houses the Rubicon Room, Forestview 1,2, & 3, Sequoia 1,2,& 3, Timberline 1,2, & 3, and the HRL Conference Room located on the third floor (Northwest wing). The Headquarters building is located at 6201 S Street, directly west of the CSC. It houses the Headquarters' Customer Center (HCC), the Auditorium and several other conference rooms.

The Field Reporting Facility (aka FRF) is located behind the SMUD Headquarters building: go under the Light Rail overpass, then to the left about 150 yards.

Directions:

**Heading East:** From downtown Sacramento, head east on Highway 50, exit at **59th Street**. This exit will take you up-and-over Highway 50. Go straight at the first intersection, travel about a half mile. On your left (north) is the SMUD Headquarters building, the next building is the Customer Service Center.

**Heading West:** From Placerville, take Highway 50 to Sacramento and exit at **65th Street**. Go straight about one block after the first intersection. The Customer Service Center is the four-story building on your right (north).

You should be able to find parking spaces for visitors located in the area between the two buildings. There is also parking available in a parking lot on Folsom Blvd. behind the SMUD complex.

If you need assistance to find the Rubicon Room, Timberline 1,2,& 3, Sequoia 1,2,& 3, Forestview 1,2, & 3, and the Hydro Relicensing's Conference Room located on the third floor of the Northwest wing, see the guard at the lobby desk. The Headquarters Customer Center (HCC) room is located in the Headquarters building opposite the board of directors Auditorium in the first floor. Drive Safely.

**Note:** *Downloadable maps can be found at [hydrorelicensing.smud.org/meetings/meet\\_loc.htm](http://hydrorelicensing.smud.org/meetings/meet_loc.htm)*

**Sacramento Municipal Utility District  
White Rock Room  
6301 S Street  
Sacramento, CA 95817**

**Water Balance Model Subcommittee**  
Upper American River Project Relicensing  
**Tuesday, September 23, 2003**  
9:00 am to 4:00 pm

**NOTE: PLEASE BRING YOUR CALENDAR TO THE MEETING SO WE CAN SET  
FUTURE SUBCOMMITTEE MEETING DATES.**

## **Agenda**

### **Administration**

- Introductions
- Approve/Modify Agenda
- Approve August 20, 2003 Water Balance Model Subcommittee Meeting Summary *(Provided to Subcommittee by Email on 8/21/03)*
- Identify Time Sensitive Items Not on the Agenda

### **Status Reports**

- Review Action Items in July 28 Subcommittee Meeting Summary
- Receive Report from Water Year Type Subgroup on September 5 and 22 Meetings

### **Review/Discuss/Approve Third Draft of Model Run Request Process**

*(Provided to Subcommittee by Email on 8/21/03)*

### **Identify Meeting Action Items**

### **Schedule Next Subcommittee Meetings & Set Meeting Agenda**

**Sacramento Municipal Utility District (SMUD)  
Upper American River Project (UARP) Hydro Relicensing Project**

**Water Balance Model Subcommittee Meeting Summary**

**September 23, 2003**

**9:00AM – 12:00PM**

The Water Balance Model Subcommittee (WBMS) met on September 23, 2003, at SMUD's Customer Service Center, White Rock Room. A notice of and agenda for the meeting was distributed to all interested parties on August 21, 2003. Meeting participants included:

- Bill Center – *ARRA & Camp Lotus*
- Margaret Hannaford – *HCE*
- Bob Hughes – *CDFG*
- Jim Lynch – *DTA*
- Parvez Mody – *SMUD*
- Cheryl Mulder – *ENF*

**SUMMARY**

- The subcommittee approved the 8/20 subcommittee meeting summary
- The subcommittee gave general concurrence to the Water Year Type Subgroup's observation
- The subcommittee re-approved list of nodes
- The next Subcommittee meeting is scheduled for October 8, from 1 to 4 pm

**ADMINISTRATION**

*August 20, 2003 Subcommittee Summary Approved* – The Subcommittee approved the August 20, 2003 meeting summary dated August 21, 2003 after making minor changes.

*Confidentiality/Model Use Agreement* - CDFG and USFS said they were still reviewing the confidentiality/model use agreement.

**STATUS OF ACTION ITEMS**

The following action items from the previous meeting have been completed:

- Water Year Type subgroup met on September 5 and 22 to discuss possible alternative water year type definitions
- Cheryl Mulder apprised the Water Year Type subgroup on the progress in the Project 184 Relicensing on setting alternative Water Year type triggers.
- The draft Model Run Request process write-up was revised and reissued for review to the subcommittee
- The Base Case description was revised and provided to Plenary Group for approval.
- SMUD and USFS reviewed the USGS maps and concluded that Loon Lake Reservoir did not impound any of the Rocky Basin Creek's drainage and thus was not affecting riparian encroachment in the lower portions of the creek.

Outstanding action items are listed below:

1. Dave Hanson and agencies to provide an update regarding the execution of the Water Balance Model use/confidentiality agreement at the October 8 Subcommittee meeting.
2. SMUD's Expert User to issue an email stating SMUD will make EDCWA's model run request (the first request).
3. Dave Hanson to call John Gangemi. No date assigned.
4. Bill Hetland to report on JBIT's discussions regarding whether consumptive withdrawals should be included in the model used in the UARP Relicensing (as compared to the model used by the JBIT) at the October 8 Subcommittee meeting.
5. SMUD to add Chili Bar and Iowa Hill to the model. No date assigned.

## **REPORT FROM WATER YEAR TYPE SUBGROUP**

***Subcommittee In General Agreement On Water Year Type Subgroup's Observations From Second and Third Subgroup Meetings*** – Jim Lynch, reporting for the Water Year Type Subgroup, said the Subgroup met on September 5 and 22 at the DTA office. Participants at one or both meetings included Bob Hughes, Mike Preszler, Cheryl Mulder, Parvez Mody and Jim Lynch. After reviewing the data and some discussion the subgroup shared the following observations with the subcommittee:

1. The Subgroup is leaning towards recommending CDWR's Total Water Year Unimpaired flow forecast (as compared to April-July runoff forecast) as a trigger for water year types.
2. The Subgroup is leaning towards recommending adding CDWR's Total Water Year unimpaired inflow in to Folsom as one more "triggers" for Water Year type. Thus, water year types would be set by:
  - CDWR October actual WY inflow in to Folsom for October 10 through Feb 9 [*Subgroup is researching whether CDWR publishes the actual WY inflow*]
  - CDWR February forecast of total WY unimpaired inflow in to Folsom for February 10 through March 9
  - CDWR March forecast of total WY unimpaired inflow in to Folsom for March 10 through April 9
  - CDWR April forecast of total WY unimpaired inflow in to Folsom for April 10 through May 9
  - CDWR May forecast of total WY unimpaired inflow in to Folsom for May 10 through October 9
3. The Subgroup is leaning towards recommending that, if EID is ready to make a decision soon regarding changing the triggers in the EID license for water year type change over, we consult with them to determine if we can use the same triggers
4. The Subgroup has not reached a final recommendation on water year types. However, the subgroup is leaning towards using five Water Year type names (as in the EID and PG&E's Mokelumne licenses): Critical Dry, Dry, Below Normal, Above Normal and Wet. These names are to facilitate discussion and are not necessarily descriptive.

The subgroup described two methods it was considering for establishing water year types and got general agreement on both methods from the subcommittee.

Bill Center suggested that the subcommittee we discuss Base Case at some level in a future meeting.

The next meeting of the subgroup is set for October 8 at SMUD's White Rock room in CSC building.

- Action Item 6:** Water Year Type Subgroup to meet at 9:00 a.m. at SMUD’s office on October 8 to continue development of Water Year types for consideration by the Subcommittee, and to report at October 8 Subcommittee meeting (1:00 – 4:00 pm at SMUD’s White Rock room). Base Case to be added to agenda at a future meeting.

## MODEL RUN REQUEST FORM

Jim Lynch distributed a revised draft of the Model Run Request process for consideration by the Subcommittee. The revised draft was approved by the subcommittee and will replace the current initial paragraph on the first page of the Model Run Request Form.

- Action Item 7:** Parvez Mody to update the Model Run Request Form.

## HYDROLOGY UPDATE

Margaret Hannaford gave the following status update on the Hydrology Study:

- Accretions at nodes below Chili Bar have been calculated and sent to PG&E for review.
- Revised Rock Creek accretion estimates which resulted in changes for Junction, Camino and Brush Creek estimates.
- Revised Rubicon and Buck Island accretion estimates.
- Accretions have been calculated for all the nodes in the initial list of nodes.

The subcommittee reviewed all the nodes in the list. Based on additional discussions, the subcommittee asked for total unimpaired flows at all nodes in the list.

- Action Item 8:** Jim Lynch will confirm with Scott Wilcox whether accretions at nodes below Chili Bar will be adequate for Aquatic and Geomorphology analysis. *[Jim sent an email to Scott requesting his concurrence on 9/26.]*

- Action Item 9:** Margaret to calculate total unimpaired flows at all nodes. No completion date assigned.

## EXPERT USER TRAINING

A CHEOPS™ “expert users” training session has been rescheduled for either October 29, 2003 or November 4, 2003. This training session will cover the use of the CHEOPS model and will not cover the basic operation of the UARP. A notice will be sent out with the actual time and location for this training.

- Action Item 10:** SMUD to issue email when expert user training data finalized.

## **NEXT MEETING**

***Next Water Balance Model Subcommittee Meeting Is Scheduled For October 8*** – The next Water Balance Subcommittee meeting is scheduled for Wednesday, October 8, at SMUD from 1:00 to 4:00 pm. As agreed to by the Subcommittee, agenda items will include:

- Review/Approve Agenda
- Identify “Hot” Items
- Approve September 23, 2003 Subcommittee Meeting Summary
- Review Status of Outstanding Action Items
- Receive Report from Water Year Type Subgroup
- Identify Meeting Action Items
- Schedule Next Subcommittee Meeting and Set Agenda

**NOTE: THE WATER BALANCE MODEL SUBCOMMITTEE HAS NOT SCHEDULED ANY MEETINGS AFTER OCTOBER 8. PLEASE BRING YOUR CALENDARS TO THE OCTOBER 8 MEETING SO WE CAN SCHEDULE ADDITIONAL MEETINGS.**

## Water Balance Model Subcommittee Draft Description of Process to Request Model Runs

(Distributed on August 21 by Jim Lynch for Discussion at the September 23, 2003, Subcommittee Meeting)

At the August 20, 2003, Water Balance Model Subcommittee meeting, Jim Lynch was asked to revise the second draft of the Model Run Request process found on the first page of the Model Run Request Form. A third draft of the process is provided below for consideration by the Subcommittee at its September 23 meeting.

This form is to be completed by any stakeholder who requests that Sacramento Municipal Utility District make a run of the UARP Relicensing Water Balance Model. In general, the form is divided into seven sections, which include:

- Questions 1-3: General information.
- Question 4: Period for the run (e.g., all water years, typical water years or specific years).
- Question 5: Which Base Case to use (UARP Only or UARP with Iowa Hill).
- Question 6: Level of involvement by Water Balance Model Subcommittee.
- Question 7: Specific purpose of run.
- Question 8-18: Minimum flow or other constraints by reach and reservoir.
- Question 19: The run results as summarized by SMUD's Expert User, including summary plots and tables.

Please call Parvez Mody at (916) 732-5329 if you have any questions regarding this form, the directions to complete it, or need assistance regarding a mode run request.

To request a run, you should:

1. Complete the entire form, except for Section 19. Note that if you re only concerned with one reach, complete that the question for that reach only, and in Question 7 say whether the UARP Only Base Case or UARP with Iowa Hill Base Case conditions should apply to all other reaches and reservoirs.
2. Email the completed form to SMUD's Expert User at [pmody@smud.org](mailto:pmody@smud.org). *[WBM Subcommittee – I have asked SMUD if this is the right email address. JML]*

SMUD's Expert User will:

1. Review the completed form and contact you to try and resolve any questions/concerns SMUD's Expert User may have concerning the requested run.
2. Advise you by email that either:
  - The run is being made, and when the Expert User expects to complete the run and provide the results to you.
  - The run is not being made and why (e.g., a very similar run has already been made, the results might be achieved in a more efficient way, the request is unreasonable, or the request has some technical problems that the Expert User and requester have not been able to resolve). Note that if you disagree with SMUD's Expert User decision to not make a run, you may request that the Plenary Group override SMUD's Expert User's decision.
3. Provide a summary of the run results to you by completing Section 19 of the Model Run Request Form, including attachments, and emailing it to you.