### CALIFORNIA WATER AND ENVIRONMENTAL MODELING FORUM

# MINUTES OF THE STEERING COMMITTEE

For May 29, 2009

(This meeting was held at the Solano Irrigation District Office in Vacaville.)

| Decisions            | CWEMF will stay with the Sterling Bank.   |
|----------------------|---|
| Action Items         | <ul> <li>The ED will check on more alternate sites to Asilomar for the annual meeting, and their costs, and give this information to Tara and Paul.</li> <li>The ED will send out a Call For Presentations for the 2010 annual meeting.</li> <li>The E.D. will email out the proposal for the Delta Water Quality Modeling workshop proposal to the entire Steering Committee, and forward any feedback to Fred prior to the next Steering Committee meeting.</li> <li>The E.D. will forward the comparative report on several groundwater models (that Michael prepared) to the Steering Committee.</li> </ul> |
| Parking Lot<br>Items | The Friends of the Eel River (FOER) emailed CWEMF stating that they are asking the Sonoma County Water Agency to peer review its Reservoir Operations Model. The FOER had heard that CWEMF assists with peer reviews.   |
| MOUDIIS              |   |

### REFERENCES HANDED OUT:

- 1. Executive Directors Report.
- 2. CWEMF Workshop Status
- 3. Information pamphlets of alternate annual meeting conference sites.
- 4. Preliminary draft agenda for the Delta Water Quality Modeling workshop

## **MINUTES**

- 1. **INTRODUCTIONS/DESIGNATION OF QUORUM** The meeting was opened with 17 persons in attendance, and 2 proxies. A quorum was declared.
- 2. **EXECUTIVE DIRECTORS REPORT** The Friends of the Eel River (FOER) emailed CWEMF stating that they are asking the Sonoma County Water Agency to peer review its Reservoir Operations Model. The FOER had heard that CWEMF assists with peer reviews. The E.D. renewed our Earth Links web site, which costs \$30 per month. For emails, the E.D. is looking into Constant Contact, which has nice-looking emails. There is a 60-day trial period. Other E.D. comments are feathered into many of the topics below.
- 3. **SECRETARY'S REPORT** The minutes for the past meeting of March 20, 2009 were reviewed. Several suggestions were made as to clarifications needed to the minutes,

and so the minutes will be edited and submitted for re-approval at the next Steering Committee meeting.

- 4. **TREASURER'S REPORT** There is \$52,000 in the total funds, of which \$20,000 is in the general fund and \$32,000 is in the peer review fund. We have decided to stay with Sterling Bank for the CWEMF's money market account. (Our check account is in River City Bank.) The E.D. will set up an on-line account there.
- 5. **ANNUAL MEETING** The E.D. announced that the Power Points from the Asilomar meeting have been posted onto our web site. He has asked Asilomar for conference rooms closer together, so that much time is not spent in walking from one room to another between talks. Our larger conference room in 2011 will be Heather rather than Kiln. He has sent in the deposit for the 2010 conference, but not yet for 2011. For 2011, Asilomar has moved us to Feb. 28 – March 2, because of scheduling conflicts. The IEP got moved also, so our conference still overlaps with their meeting. The E.D. will send out a call for presentations for the 2010 meeting, and some discussion ensued as to who to send this to (just our mailing list, or other's mailing lists, too?) The possibility of using other conference sites was also discussed at length due to the current economy. Closer sites may be less expensive and allow people to come and go from Sacramento. The utilization of vans may cut costs. Some alternate locations mentioned were Napa, Lake Tahoe, and Lodi. An outside question was why does the modeling forum need a conference when there is a CALFED science conference every other year? It was decided to compile the costs for each facility and for the E.D., Tara, and Paul to have these ready to show management if asked. The E.D. will check on more alternate sites.
- 6. **TECHNICAL WORKSHOPS** The list of technical workshops is attached to the end of these minutes.
- a. Real-time water quality management Can this be a joint USBR/CWEMF informational workshop? This is now in the concept phase.
  - b. DSM-2 workshop Possible in July or August.
  - c. Nutrient dynamics in the Delta Possibly in the early Fall.
- d. Soil water in the South Delta Mark Gowdy is contact. (8/28/09 This will be a SWRCB external workshop)
- e. San Joaquin River Restoration Plan Peter, Rich may want three workshops. (8/28/09 This is on hold for now.)
  - f. CalSim III
- g. Groundwater Modeling for Conjunctive Use The E.D. has contacted Brian Heywood on this, and is awaiting word back.
- h. Conjunctive (surface and groundwater) management Have in late Fall possibly. Analytical and computer. Hubert is contact.
  - i. Sampling for fishery models (8/28/09 This is on indefinite hold.)
  - i. Habitat Restoration –
  - k. Data Visualization –
- 1. Sediment Transport Mississippi River, USBR Matilda Dam Removal, DSM-2 sediment. George is contact.
  - m. Wadeable Streams Possibly Peter Vorster, George Nichol.

- n. Data Management Possibly combine with data visualization.
- o. Delta Water Quality modeling Have an introductory workshop(s) to discuss what needs to be done to get the ball rolling on how the Delta Vision alternatives may affect the existing water quality violations, impairments, and TMDLs in the Delta. Fred is the contact. Have possibly in Spring of 2010. The E.D. will email out the packet of information to the entire Steering Committee that Fred handed out at the Steering Committee meeting in March, asking for comments, and then forwarding any comments to Fred. (The question arose as to which agency/entity is formally charged with getting prepared to answer the water quality portion of the Delta Vision proposals. Is it BDCP? Are they gearing up to oversee modeling or other predictive efforts? How best can a CWEMF workshop(s) help their effort?)
  - p. Analytical Tools This group is planning a workshop.
  - q. Delta Smelt on hold.
- r. CALSIM III workshop Introduction and training workshop. (DWR will put on, not CWEMF.)

#### 7. PEER REVIEW

- a. Delta Report on modeling dimensionality Pete Smith
- b. Comparison of Delta hydrodynamic models by UCD for State Water Board. (Is CWEMF involved in this?)
- c. Peer review for groundwater models for San Joaquin Valley groundwater studies. USBR may be able to help fund. (Includes DSM2, IWFM, Hydrogeosphere). Would the application or the models be reviewed? Review capabilities of the models for the Central Valley. Michael will send his past comparative report to Rich, and Rich will forward to the Steering Committee.
- 8. **MODEL USER GROUP** There is no WARMF User Group at this time. We are getting information as needed for now directly from Joel Herr of Systec Engineering. The DSM2 User Group recently met.

#### 9. OTHER BUSINESS

- a. Quasi Hydrologic Information System (Quasi HHIS) Nigel talked about this data base management system. It is a set of procedures. It has been found that large data bases do not serve the users well, and that distributed databases are better for users. The Univ. of Texas is leading this effort. This data base will allow models to talk to one another. This database would be useful for real-time water quality management. Nigel mentioned that he may want to lead a workshop on this. Nigel volunteered to present a 15-30 minute slide presentation on Quasi-HHIS at the next Steering Committee meeting.
- 10. **ADJOURNED** 1:30 pm. Next meeting is on July 17, 2009, at Solano Irrigation District Office in Vacaville. (Note: the meeting was later postponed until August 28, 2009.)

Respectfully Submitted George Nichol, Secretary, CWEMF

### **ATTENDANCE**

Paul Hutton Rich Satkowski Stacy Tanaka

George Nichol Nigel Quinn Tara Smith Erik Reyes Lisa Holm

Marianne Guerin Hubert Morel-Seytoux

Lisa Holm Peter Baker Michael Tansey

Rob Tull Jay Lund Mike Deas

Lucinda Shih (on phone)

Proxies: Steve Culberson, John Williams

Convener, MWD

Executive Director, CWEMF

Treasurer, Watercourse

Engineering Inc Secretary, SWRCB

LBNL DWR DWR USBR

Vice Convener, RMA

Hydroprose USBR

Stillwater Sciences

USBR CH2M-Hill UCD

Watercourse Engineering Inc.

**CCWD** 

| Workshop Title   | Status | Workshop Lead                           | Other Contact(s)   | Proposed Date     | Comments  |
|--|--------|---|--|-------------------|---|
| DSM2 Version 7 Training  | 2      | Tara Smith                              |  | July, August,     | 4   |
|  |        |   |  |                   | Annotation to the contract of |
| Real-time WQ Management on the SJR   | 3      | Nigel Quinn and Lisa                    |  | -                 | Nigel and Like will follow-up on a workshop - there's enough here for at least one  |
| Process Models For Nutrient Dynamics in the Delta                                    | 3      | Paul Hutton, Marianne<br>Guerin         |  | Early Fall 2009   | Cover the current state of model development for nutrient dynamics. Include apealers with expertise on th<br>important processes or measurements.   |
| Dynamic Modeling of Soil Water: Salinity Build-up In<br>California Soils             |        | Marc Gowdy, Les<br>Grober, Glen Hoffman | The Stata Boardwill let<br>CWEMF know about<br>timing for their workshop | Fall 2009         | has already embarised on the same effortwe (the State Board, head up by myself primarily) are in discussions with them on how to join forces. If it continues in this direction there would likely not be a role for CWEMF, as its already getting crowded with many big names. I would say remove that from the CWEMF list (which is already pretty long). I'll keep CWEMF in rolnd as we proceed with this effort.  |
| Delta Water Quality Modeling: pollutant transport and transformations                | 3      | Q. Fred Lee                             |  | Spring 2010       | Workshop will review the current understanding the modeling of Debs water quality pollutants transport an<br>transformations that cause violations of water quality objectives and the impairment of the water quality<br>insisted impairment of Debts bereficial uses. Information will be presented on the need to develop modelin<br>approaches and water quality and water quality data needs to develop water quality models for the Debts.<br>heal that it wood be better to plan on this workshop in the apring of 2010, this fall would be to soon since<br>one of the key reports on Debs water quality issues will not be available till this fall.   |
| Modeling the Deta Smett and Chinook Salmon<br>Biological Opinions                    | 3      | Eric Reyes                              |  |                   | Stalled - Eric will keep track  |
| San Josquin River Restoration Plan   | 3      | Peter Vorster                           | Rich Satkowski   |                   | I think the SJR restoration workshop should wait a bit until parhaps we have done the first interim flow<br>releases acheduled for this fail unleas we want to put it into a larger workshop on decision support<br>systems for real-time decision making for environmental flow releases.  |
| CALSIM III   | 3      | Sushit Arora                            | Eric Reyes   | Fall, Winter 2009 | MG follow-up with Eric  |
| Groundwater Modeling   | 3      | Brian Heywood                           | Rich Satkowskii  | _                 | Rich will keep track of this.   |
| Design basis for a practical surface/groundwater<br>model for conjunctive management | 3      | Hubert Morel-Seytoux                    |  | November 2009     | Procedures combine snalytical techniques with numerical ones, allowing for accuracy while minimizing computational bunders. In this way the system can be simulated at the realistic operational time of the dis-   |
| Sampling for Fishery Models  | OFF    | John Williams                           | Rich Satkowski   |                   | Ken Newman too busy for now - workshop on indefinate hold. (John Williams said that CALFED is interested in the workshop, which would be 4 hours in a classroom setting and then 4 hours in the field.)   |
| HydroGeo8phere   | OFF    | George Matangas                         | Lisa Holm will check   |                   | Worsishop occurred earlier in year.   |
| Modeling Habitat Restoration   | 3      | Mike Tansey                             | M. Guerin  | A District        | Phil Williams Assoc (Michelle Orr, Principal)   |
| Data Visualization   | 3      | Tara Smith                              |  | 7                 |   |
| Sediment Transport   | 3      | George Nichols                          |  |                   | My hopes are for a workshop that would look at the effects of hydromodification (dans, low impact development<br>requirements, artise runoff, debrit basins) and storm water permits on the transport of needed sediments from the<br>inland watersheds to the fragile coestal beaches and wetlands. I am not quibe sure how to go about this yet. I might<br>just start out with some single model presentations like HEC-MS (which now contains the HEC-S undiment transport<br>capabilities) and other sediment transport models, and then build on that   |
| Wadeable Streams   | 7      | Peter Vorster                           | George Nichols   |                   | George will ask Peterth his suggestion was for the modeling of wadeable streams (hydrautic south as velocity and water depth, water temperature, habitat, etc), or for such other ampets such as the monitoring and assessment of squatic streams, which in a way would support future modeling efforts. The term "wadeable stream" is a category waterways that has a special significance other than just being able to wade across it. The EFA and SMRIGH are doin special monitoring of wadeables streams for macroinvestionates, algoe, physical habitat, etc. to try to develop bio-criteria for them, rather than just have a narrative criteria that says "you must not do anything to hurt the biologic habitat."  |

#### Status:

1 = Schedule finalized or nearly finalized

2 = Detailed development underway

3 = Concept stage 4 = External Group