

**YOLO BYPASS WORKING GROUP
MEETING 32**

MEETING MINUTES

MEETING DATE: October 14, 2004

LOCATION: California Department of Fish and Game
Yolo Wildlife Area Headquarters
45211 County Road 32B (Chiles Road)
Davis, CA 95616

IN ATTENDANCE: Robin Kulakow, Yolo Basin Foundation (YBF)
Dave Feliz, California Department of Fish & Game (DFG)
Dave Ceppos, Center for Collaborative Policy
James Navicky, DFG
Selby Mohr, Mound Farms
Ron Unger, EDAW
Petra Unger, EDAW
Corky Quirk, Yolo Basin Foundation
Greg Schmid, Los Rios Farms
Armand Ruby, Armand Ruby Consulting
Linda Fiack, Yolo County Planning Department
Rick Martinez, Triad Farms
Dan Tibbits, US Army Corps of Engineers (COE)
Paul Forsberg, DFG
Tony Lucchesi, Wildlands, Inc.
Greg Kukas, COE
Bryan Plude, Canvasback Consulting
Craig Isola, US Fish and Wildlife Service
Luke Naylor, Ducks Unlimited
Mitch Sears, City of Davis
Mike DeWit, DeWit Farms
Bob Schneider, Regional Water Quality Control Board
Ellen Mantalica, Watershed Center, U.C. Davis
Dennis Orthmeyer, California Waterfowl Association (CWA)
Mark Hennelly, CWA
Tom Moore, Natural Resources Conservation Service
Robert Eddings, CWA
Bill Harrell, DWR
Kathy Kuivila, US Geological Survey
Gus Yates, Consulting Hydrologist
Mel Castle, Yolo Basin Farms
Steve Gidaro
John Currey, Dixon Resource Conservation District (RCD)
Don Stevens, Glide In Ranch

Dick Goodell, Glide In Ranch
Phil Martinelli, Channel Ranch
Ed Towne, Bullsprig Outing
Dennis Kilkenny, Dawsons Duck Club
Ted Sommer, Department of Water Resources (DWR)
Marianne Kirkland, DWR
Michael Perrone, DWR
Lauren Hastings, California Bay-Delta Authority-Ecosystem Restoration Program
Butch Hodgkins, Sacramento Area Flood Control Agency
Chuck Dudley
Jack Palmer, H Pond Ranch
David Kohlhorst, Glide In Ranch
Brad Burkholder, DFG
Tom Schroyer, DFG
Jeanette Wrysinski, Yolo County Resource Conservation District
Marilyn Waggoner, YBF
David Brown, Sacramento Yolo Mosquito Vector Control District (SYMVCD)
Mike Egan, Yolo Flyway Farms
Mark A. Kearney, Landowner
Beth Gabor, Yolo County Board of Supervisors, Helen Thompson
Casey Walsh Cady, CA Dept. of Food and Agriculture

NEXT MEETING: December 16, 2004, 10:30 am to 1:30 pm

Dave Ceppos called the 32nd meeting of the Yolo Bypass Working Group (Working Group) to order. The Working Group was started four years ago with funding from the CALFED Bay-Delta Program (now the California Bay Delta Authority, [CDBA]). The group continues to be funded through CBDA. It is the primary forum for Yolo Bypass (Bypass) issues, specifically on Bypass conditions as related to landowners, tenants and regulatory entities that have a direct responsibility or land ownership responsibility in the Bypass.

Robin Kulakow thanked all participants and recognized a very significant financial gift to YBF from the Glide In Ranch.

Mr. Ceppos briefly summarized the agenda. He gave a brief update about the Conaway Ranch regarding the inability of a key Conaway Ranch representative to attend the meeting. Mr. Ceppos explained that the Conaway Ranch issue is becoming a challenging situation. It is not just a public information issue now; it is a legal proceeding. Regina Cherovsky of Conaway Ranch, was unable to attend the meeting due to a family illness, and asked that the Ranch discussion item be removed from the agenda and to table it for a later date so the Conaway Ranch perspective on related issues could be presented. Mr. Ceppos stated that for future meetings, Conaway Ranch discussions will be handled in a more formal matter due to the legal context.

Introductions were made around the room.

The previous meeting minutes were adopted as final for the project administrative record.

Update on Regional Water Quality Control Board Agricultural Waiver Water Quality Issues

John Currey, Dixon RCD and Chuck Dudley

Sampling in the Yolo-Solano County water quality effort continues. Some toxicity was found in the flathead minnows. However, the Regional Water Quality Control Board has informed project leaders that there is some kind of pathogen that is affecting flathead minnows. The cost of the sampling effort was about \$2,000. Additional samples will likely be taken in October and then they'll wait for two storms then sample again.

Q: How are things going with getting landowners signed up to be a part of the program? Are you getting pretty good participation?

A: Yes, we are satisfied with the response. We anticipate the need for future fee structure adjustments by next spring, maybe February or March.

Bob Schneider indicated that he is the chair of the Central Valley Regional Water Quality Control Board and he can be contacted for any further questions.

Update on City of Woodland Water Quality Study

Armand Ruby

The last monthly monitoring will be done in October. Samples have been collected and analyzed from 12 different locations in the Bypass including all of the major tributaries and several locations along the Tule Canal and Toe Drain. During one flooding event in February, samples also were collected from the Sacramento Bypass Weir, and Fremont Weir. A lot of data has been collected for water quality. Over the next few months that data will be analyzed and we will start to develop a coordinated control strategy to manage water quality.

Q: Can you explain the purpose of the study and what you are hoping the outcomes will be?

A: The project is funded by a CalFed grant to the City of Woodland. The purpose of the study is to determine what water quality conditions exist in the Yolo Bypass and develop an integrated water quality management plan to address the related issues. We will discuss potential management strategies to address water quality issues at the next Water Quality Stakeholder Group meeting, which will be held on October 28, 2004, at Larry Walker & Associates office in downtown Davis. It is an open meeting. Robin Kulakow has information regarding that meeting.

Q: Is there any overlap with the ag waiver issue?

A: Yes. Since we are already out there doing the sampling and field monitoring, we offered to supply, basically gratis, sampling services to the ag waiver group. Our water quality monitoring program ends this month. After that, the ag waiver group may have to support those sampling sites on their own.

Yolo Wildlife Area Management Plan Update **Dave Feliz, Department of Fish and Game**

Dave gave a presentation indicating work conducted through funding from NAWCA (North American Waterfowl Conservation Act). Enhancements were done in partnership with the California Waterfowl Association and Ducks Unlimited. The ponds can be flooded independently to meet different habitat objectives. There are 16 new blind sites for hunting and each blind is an island and has four seats. This was to encourage folks to bring their family members. We have been creating levies and swales. Ducks Unlimited work is taking place in the Central Unit of the Wildlife Area. A new water distribution ditch was created. Inefficient water control structures have been repaired.

Near the newly installed Kinder Morgan pipeline, areas are getting replanted with native grasses. The grazing program on the Wildlife Area continues. The rice south of the I-80 Causeway is a major asset as an income source to fund the irrigation infrastructure. The new pump structures have been installed built above ground so they no longer need to be removed in winter.

Early flood of harvested rice was done to provide seasonal wetlands for early arriving migratory waterfowl since the SYMVCD asked that seasonal wetlands flood up be postponed until Oct. 1 to assist with mosquito abatement. We hope to re-create what we did last year with flooded rice fields so that waterfowl will flourish. The milo fields will soon be flooded for a habitat pond. We are pioneering management of shore bird habitat during migration and will plant rice the following year.

At this time there are about 15,000 Mexican Freetail Bats roosting under the Bypass causeway. It was reported that there were as many at 100,000 over the summer. The bats do a great job eating mosquitoes and moths.

Dave introduced Petra and Ron Unger from EDAW, the consultant that has been chosen to complete the management plan. Currently, a scope of work is being finalized with an anticipated start date of November 1, 2004, and a target finish date of December 31, 2005. EDAW is looking forward to input and working with everyone involved in the Working Group. They realize there is a lot of interest in the land management planning process. There are various interests and programs that are involved in this wildlife area. There is a lot of talent here which will be valuable to the process.

Q: Will this group have input to draft the EIR and will we be able to review it?

A: Yes, The scope is under development . EDAW wants to incorporate the Group's input since it is the key stakeholder group. There will be public meetings. The Yolo Basin Foundation is also involved.

**Update on U.S. Army Corps of Engineers/Department of Water Resources Yolo
Bypass Modeling Project and Technical Advisory Committee
Greg Kukas, Corps of Engineers and Dave Ceppos, CCP**

Mr. Ceppos described that several years ago in there were a lot of questions about hydraulic impacts in the Bypass relative to ongoing discussions of changing land uses. As a result we convened a technical advisory committee. It was comprised of representatives of regulatory and technical agencies such as DWR,. Different consultants were also asked to take part and there were informal discussions that revolved around what the future is going to hold for the Bypass and what might we want to do about that. One recommendation was that the previous, and to this date current two-dimensional modeling tool had some deficiencies in it in terms of use and availability. In what appeared to be a likely trajectory of land use change in the Bypass including ag to habitat, there was no effective way to see how those changes would impact the overall flood control program and the ultimate use of the. It was suggested that we try to get someone to update the model to make it more user friendly. A series of proposals were submitted to the CALFED Program by the US Corps of Engineers, DWR / Reclamation Board and the Yolo Basin Foundation. The proposal was approved and agencies now have the money and are beginning work on this modeling effort. Greg Kukas and his colleagues are here to present that to you and let you know what they are hoping to achieve as an outcome.

Greg Kukas: We met with Dave Feliz to discuss the management plan for the Wildlife Area expansion. DFG experienced about the same delay we did in seeking funding. We will be using the Causeway Ranch portion of the Wildlife Area as our case study as a component of the model development and calibration. We have also met with Dave Ceppos and Robin Kulakow to begin work to reconvene the modeling technical advisory committee that Dave mentioned.

We're here today to give you a brief demonstration using a RMA-2 model to show how it's going to be used and what its capabilities are. The end user will be able to locate areas of interest within the geographic mesh of the model. To simplify their efforts, the user will be able to trim off the portions that they don't need and work with a more manageable area. The user will be able to refine the mesh to reflect geographic features for hydraulic analysis. The roughness value represents the obstruction of flow, determining how fast and how deep the flood water flows. The Corps will assign a regional level baseline roughness value to the mesh. A point of interest can be selected, a roughness value can be assigned and the model can be run to see water surface elevation. The first step is to establish the baseline hydraulics against which whatever is proposed will be used. The user can view the impact on the model and use the tool to try different values to view different impacts of proposed land use modifications. One of the benefits of this tool as opposed to others that are available, we're able to look at the velocity factors which help to visualize the approximate level of flow and the flow conditions of what is being proposed using different values.

We will meet with the model technical advisory committee to see if this tool will meet their needs. We will initiate a series of meetings with them to see what we can do to make sure that our efforts address their concerns.

Q: Are you saying they can dictate what can be planted?

A: This tool that will allow planners to more explicitly identify the effects of land use use changes on the flood control function of the Bypass.

Dave intervened and described that Greg and his group are not here to act as regulators or on behalf of the State Reclamation Board. The Corps of Engineers is creating a modeling tool, working with DWR and the Reclamation Board to help better assist the Reclamation Board and landowners with each of their permitting decisions.

Participant: Will the Reclamation Board come down to our place and tell us that they don't want certain plants in place. We don't think that's right.

Dave: That has been an ongoing issue that you all raised as part of the Management Strategy. It is a conflict that is worthy of further discussion. It is important to remember that because all Bypass lands are under flood and flowage easements, the state already has the authority to dictate vegetation cover private land in the Bypass.

Greg: What we are looking at is contours associated with the predicted change in water surface elevation, not the ground elevation. We are starting with the representation of the ground that the model geometry mesh is based on.

Participant: This is a great tool for the Reclamation Board. Based on what you're doing here, it is not great for the private wetland managers in the Bypass. We don't want you to come down and tell us what we can and what we can't do in the Bypass and that this is good or bad for the wildlife and habitat.

Dave: It's a predictive tool. You have land in the floodplain and there are responsibilities relating to vegetation management.

Q: How well does this model allow for changes of roughness over time such as vegetation being knocked down by flood flows?

Greg: We will assign a single roughness value in the analysis. We will be able to have that change during the course of the analysis.

Q: What if the roughness disappeared?

Greg: We will be establishing our roughness values based on simulations and historic flood events. This will calibrate the hydraulic model. Land use will be scrutinized for calibration.

Q: Once complete, will this tool be available to planners free of charge? Will the Corps maintain the tool?

Greg: Maintenance, ongoing distribution, improvements to the model are things that we recognize there will be a need for and hopefully the right agencies will step up and take on those

responsibilities. The COE's effort is not funded to take on those responsibilities. The tool will be available to planners and the public domain. Our funding will go to a certain point, but at this time there is no funding to maintain the tool long term. There will be a concerted effort to distribute the model.

Dave: The goals envisioned several years ago were, in addition to the update itself, was to make it user friendly and user available with a workbook so that landowners could use it for ongoing assessments. Not only for the purposes of regulatory impact, but as well to assess where you can make improvements to your land and minimize impacts. (The other goal which was not able to be realized with current funding was updating the tool. Everybody recognizes that that will be necessary. The funding just wasn't available. If this tool is successful, we're confident that funding will be supported.)

Q: Can the user physically alter roughness to maintain balance?

Greg: This is possible, but more involved. From that scenario, we assume the end user will be a semi-experienced hydraulic consultant who is familiar with the program. This is not to say that anybody won't be able to use it. Some analysis will need more formal experience. Consulting firms will be able to manage and use the tool.

Q: What is the date from which the topographic data is coming from?

Greg: The topo data is from a variety of sources over the last few years including data from 1997 -2004

Dave: In addition to that, later this month myself, Robin, Corps staff and representatives from CWA and DU will be meeting to go over the most recent restoration efforts in the Bypass to get the most up-to-date topo data as is reasonably available.

Participant: My recollection is that anything new regarding the Bypass must go to the Reclamation Board. This data will be used as an analysis tool. It will be made available to the public. DWR will work on a manual, a workbook that will lay out case studies.

Q: Regarding the calibration, are N values assigned to each grid?

A: We will be using global N values and will rely on existing data. We do not have funding to develop any kind of comprehensive land use database to reflect current land uses out there.

Q: How good is the flood elevation data?

A: We have some limited gauge data available and some high water mark data. The calibration effort is to get as close as possible to fairly represent a baseline condition. What we are developing is a tool for impact assessment and impact assessment compares existing to a proposed condition. It's not as important to accurately represent the baseline condition out there; as it is to accurately represent how much of a difference occurs from what is being proposed.

Q: Is there any similar model in the Sutter Bypass?

A: Not that I'm aware of. There is one existing hydraulic model, but it is not a two dimensional model, although there may be one out there.

**Update on DWR/DFG Fisheries Programs Coordination
James Navicky, DFG**

The Department of Water Resources and Department of Fish and Game have begun a collaborative effort to identify fishery problems in the Yolo Bypass. For the last few months, Ted Sommer, Marianne Kirkland and I have met and identified a couple of areas for shared consideration. One is the proposed realignment of Putah Creek near the Toe Drain to facilitate more natural passage of fish. We will meet next Thursday, October 21, 2004, and what we are doing now is the beginning stages of what are the ideas from the DFG, what do we want to see happen with the fisheries in the Bypass. What can we accomplish? One of the projects we want to move forward on in relatively short term involves UC Davis, DWR, Fish and Game and that project that will hopefully confirm the number of salmon that actually enter Putah Creek as a result of current flows and current operations. We want to place an electronic counting device and infrared scanner in the Los Rios dam once the dam is removed sometime in November to count salmon that pass.

Q: When will the dam come out?

A: Mid-November. We wait for salmon to be present in the Toe Drain.

**Update of Current and Recent Fisheries Studies in the Yolo Bypass Region
Ted Sommer, DWR**

Ted Sommer of the Department of Water Resources spoke on behalf a consortium of different agencies and the work in the Delta estuary. If you have been following some of our previous results we've noticed some dramatic differences between the Bypass and the Sacramento River. What we found is that the Bypass, at least seasonally, is one of the major nursery areas for fisheries. We feel food web enhancements in the flood plain for things like plankton, and different invertebrates support several fish species that grow faster, survive better, and produce more offspring. The purpose of this presentation is to provide an update on recent fisheries results in the Bypass: 1) legal status of splittail; 2) invasion of an exotic shrimp; and 3) fish passage issues.

One of the notable recent events has been a change in the legal status of the splittail, a common species in the Yolo Bypass. This is a large native minnow that was listed as a threatened species in 1999. However, it was subsequently "de-listed" in 2003. Remarkably, this is the first extant (surviving) fish that has ever been de-listed from the endangered species list. So what happened? As part of our work with the Interagency Wildlife Program, one of the discoveries was that the range of splittail was actually broader than we initially understood. In addition, we found that the abundance of splittail improved substantially during the recent wet years. Overall, we have

learned a lot more about the life cycle of the splittail. The strength of splittail population is determined largely by the flood plain inundation. The splittail move out into the flood plain seasonally. They are able to spawn on some of the inundated vegetation, the young rear in the flood plain and they move off. Based on this knowledge of the importance of flood plain habitat, there has been an increased emphasis by CALFED, DFG and other groups on floodplain restoration. These efforts should help improve the long-term viability of the species.

Ted also gave an update on the recent invasion of the Siberian Prawn. It is native to Asia, typically found in fresh water. It spawns in the warmer months and several times during the course of the year. However, there is relatively little information about the species. It is a fairly large shrimp. It was initially collected in the Columbia River in 1995. We first detected the shrimp in our trap down at the base of the Bypass in January 2001. By June it was up to I-80, by August it had spread all the way to the top of the I-5 causeway. Shrimp densities are very high, much higher than the fish species in the Yolo Bypass. We seem to be at ground zero for the shrimp invasion in the Delta. Some of our staff had done sampling in different parts of the estuary in 2001, and in 2003 they were detected around Decker Island, Sherman Island, San Joaquin River and border islands. But none of these Delta locations showed densities as high as the Bypass

We have reason to be concerned because of major impacts from previous invaders to the estuary. For example, clams have come in and stripped much of the plankton from the water. The other thing that has us worried is that shrimp have become one of the most common organisms in the Bypass, frequently occurring at much higher densities than fish. Surprisingly, for all the different species we are monitoring, we have yet to see a substantial effect of the shrimp. It may be that the Yolo Bypass floods is “wipe clean” the flood plain, which helps keep the populations in check. The shore birds have not yet been checked for shrimp consumption, but could be a valuable food source.

As noted by James Navicky of DFG, there are several fish passage issues in the Bypass, particularly for salmon runs. The Department of Fish and Game has a tagging operation down near Suisun Marsh. Starting this year, Fish and Game has been putting receivers in different locations to give an indication as to where the fish are going upstream. An interesting development is that it appears that a large percentage of fish take a “wrong turn” at Rio Vista and swim up towards the Bypass.

Update on Lower Bypass Subgroup Feasibility Assessment Dave Ceppos, CCP

Mr. Ceppos briefly reviewed the plan to conduct a feasibility assessment for the Lower Bypass. He explained that CCP will work with local land owners in and adjacent to the Bypass as well as a number of agencies for flood management, resource management, law enforcement, etc to determine if it is feasible to start a subgroup of the Working Group specifically with the intent to resolve long standing land and flood management issues in the lower Bypass. CCP will begin interviews in December and will have a recommendations report likely in February or March.

Update on Conaway Ranch

Linda Fiack, Yolo County

Linda gave a brief report on the status of the Joint Powers Authority efforts and also about the eminent domain proceedings. She explained that Yolo County is attempting to resolve some misunderstanding about near term land use and they hope to meet with Ranch staff and tenants.

The Meeting was adjourned at 1:30.