

MEETING SUMMARY

Tulare Basin Watershed Connections – Working Group April 16th, 2015

Participants

Michelle Selmon – California Department of Water Resources (DWR) (working group lead)
Jared Aldern – Teacher/Consultant on tribal history
Sarah Campe – Sierra Nevada Conservancy (SNC)
Carole Combs – Tulare Basin Wildlife Partners (TBWP)
Ron Goode – North Fork Mono Tribe (NFM Tribe)
Dave Hoffman – Deer-Creek Tule River Association (DC TRA)
Carolyn Hunsaker – US Forest Service (USFS) (on the phone)
Adam Livingston – Sequoia Riverlands Trust (SRT) (on the phone)
Nino Mascolo – Southern California Edison (SCE) (on the phone)
Jennifer Morales – California Department of Water Resources (DWR)
Lucas Patzek – (Ag Innovations Network) (on the phone)
John Shelton – CA Department of Fish and Wildlife (CDFW)
Niki Woodard – Tulare Basin Wildlife Partners (TBWP) (on the phone)

Opening remarks and discussion

- ✚ The first article in the watershed education series that Niki Woodard is producing has been posted; it's titled "Getting to Know the Tulare Lake Watershed". Any questions or suggestions about future articles should be sent to Niki.
- ✚ Michelle shared an article titled: "***How unusual is the 2012-2014 California drought?***" Conclusions indicate that "...the current event is the most severe drought in the last 1200 years, with single year (2014) and accumulated moisture deficits worse than any previous continuous span of dry years" and "The current California drought is exceptionally severe in the context of at least the last millennium and is driven by reduced though not unprecedented precipitation and record high temperatures". John Shelton commented that he knows of another study that shows that in the past we've had a balance of hot/dry and cold/wet, but now we're experience more and more years of hot/dry; the precipitation isn't that different, but the temperatures are now hotter.
- ✚ Carol mentioned that John Austin recently presented to the Tulare County Water Commission and Dick Shafer [Tulare Co Water Commission] asked a question about when to expect the next flood; Austin responded that we are due for a flood of 'biblical proportion' and should be prepared. The take-away message for this group is that **we need to be prepared for extreme events of all sorts.**
- ✚ Sarah Campe reported on a meeting with USGS and a possible 'silver lining' for this drought; she said modeling is being done on precipitation and temperature but also vegetative response to changes in climate. This drought is a window into a hotter and dryer future and allows us to see how species will respond. We see massive pine and sequoia die offs, but it is patchy, as with varying responses with mountain lakes. These reactions will help us ground-truth those models.
- ✚ Michelle updated the group on a conversation she had with Dick Moss, who facilitates the Tulare Basin IRWM Coordination Group, regarding the particular 'niche' this Watershed Connections Workgroup (WCW) can fill that will support the IRWM group's existing multi-year

efforts, in addition to other long-time planning efforts in the region. While the main purpose of that group is information exchange and regional planning for grant opportunities, the WCW will serve a role as an *action-oriented implementation group that helps connect funding sources and advance the projects identified through the IRWM and other planning process*. Dick has expressed interest in providing an update on the IRWM Coordination group at our next meeting.

- ✚ Michelle agreed to drop the term 'interim' from her role as lead for this WCW effort, but will be working to find a co-lead (maybe a federal agency representative?) and to establish a 'succession-plan' to ensure the persistence of this effort regardless of who is the current leadperson.

- The group name will be shortened slightly to **Tulare Basin Watershed Connections Workgroup (TB-WCW)**

- ✚ Proposed meeting ground rules were discussed

- Participate and show respect for other members and their time
- Share relevant information and ideas
- Speak one at a time
- Be concise
- Be solution-oriented
- Express concerns and interests (not positions)
- Focus on what CAN be changed (not on what cannot be changed)
- Draw on each other's experience
- Limit sidebar conversations
- Carol suggested that we repeat these before every meeting; Michelle will create a printout of the ground rules to display at the meetings. Send any suggested changes or additions to Michelle prior to the next meeting.

Lucas Patzek- Applying the Connectivity Approach; Groundwater Management in CA Kings Basin

- ✚ Ag Innovations (AI) started in 1999 focused on creating dialogue, consensus- based policy change.
- ✚ AI convenes and facilitates the California Roundtable on Water and Food Supply (CRWFS), which formed in 2010 as a forum for leaders at the intersection of agriculture and water
- ✚ CRWFS bring together leaders to help create a viable sustainable food systems approach, including considerations about water, while also finding ways to enhance the natural environment
- ✚ They've created guiding principles that focus on connected thinking, socioeconomics and institutional linkages, and public and stakeholder engagement.
- ✚ The connectivity approach- a methodology for developing solutions that move away from the perception that agriculture, urban, and ecosystems are separated, but instead view them as linked.
- ✚ CRFWS developed a set of questions pertaining to those linkages and applied them to groundwater management in the Kings Basin.
 - Kings Basin was chosen because agriculture is the dominant land use, the region is influenced by all aspects of CA water system, it represents a classic hydrologic model, and there has been a lot of cross-sector work in that area that they could glean from.
 - Summary of what they found:
 - There is an exceptional understanding of the water system in the Kings Basin with data going back to the 1930's.

✚ **Lucas Patzek- Applying the Connectivity Approach; Groundwater Management in CA Kings Basin** (continued)

- The Kings River Conservation District integrated data and developed the model to look at their hydrodynamics; the model is being updated but has allowed them to create a common language.
- They have a long history of groundwater specific projects; the groundwater overdraft in the region is creating socioeconomic issues that need to be dealt with.
 - There is a laser-focus on the issue of groundwater overdraft; it's fairly unique to have such a sophisticated understanding.
- The Kings Basin Water Authority has created a forum for water agencies and land use planners to interact. Resource managers have connected with upper watershed resource managers. They consider DACs in planning and fund projects and planning for those communities.
- AIN learned that there are still a number of areas of opportunity:
 - **1-Upper and lower watershed connectivity**- improve understanding of the effects of management strategies on the hydrologic cycle; water budgets for medium and high GW basins should include upper watershed conditions and processes; align and augment institutional cooperation.
 - **2- Surface and groundwater storage connectivity**- new storage concepts need to consider all hydrologic components; state government should reexamine policy regarding groundwater recharge (i.e. should regard recharge as valuable/beneficial use).
 - **3 - Alignment of governance structure and tools** -increase coordination and alignment between state and federal agencies to support IRWM and groundwater sustainability; integrate water and land use planning management by taking advantage of SGMA to share information. Explore opportunities to coordinate between RWMGs and emergent GSAs.
 - It was suggested that this coordination (SGMA/RWMG) will be very important and requested that that this be a specific topic of discussion for this group, either today or at the next meeting; Lucas agreed there is an important opportunity unfolding now to do this.
 - **4 - Improve public and stakeholder engagement**- increase support for multi-stakeholder collaborations. Enhance outreach to unengaged stakeholders.

✚ Ron mentioned that he has worked with the state on the California Water Plan and asked if Lucas had read Chapter 11 from the 2009 Water Plan; it includes a segment on meadow restoration (another opportunity for the Kings Basin and Tulare Basin), which he has extensive experience with; Lucas confirmed that they do communicate with DWR staff who work on the Water Plan and AIN tries to stay aligned with DWR.

✚ Question: These are great recommendations, but they require some sort of 'hub in a many-spoked wheel'; what are the next steps? Are there groups taking these recommendations to the next level?

- ✚ Lucas: Everybody who sits at our table recognizes that we are responding to crisis, which makes it hard for us to think about sustainability. That's what we do at the roundtable, we take people who are in crisis mode and get them to think long-term. We need to create more opportunities to learn from one another.
 - For example: the North Coast IRWM group is looking at the water-energy-forest nexus, which is something we could do here too
 - We are 'ripe to think holistically'
- ✚ Carol: The function of this group is shaping to be implementation and this may be something to discuss in a subgroup regarding accomplishing goals.
- ✚ Michelle: With regard to the 3rd recommendation (alignment of governance/tools), there is significant progress being made by the California Biodiversity Council and Strategic Growth Council in terms of alignment of policies, programs and resources for conservation and integrated planning of the built environment; this is an unprecedented level of coordination developing that should result in increased support for integrated resource management throughout the state.
- ✚ Ron: How can we understand the water system if we don't understand the watershed? We put very little money into watershed projects and we need to invest more into understanding the watershed. What we're seeing now is an accumulation of the problems of the last 20 years. We're not done with droughts and were not ready for the weather we'll get in between. Farmers hardly ever come to the table, but they're the big issue; how do we get them to come to the table? There is a lot of research out there, and the last big drought we had lasted 250 years (1250-1500), but in the end were still here, and we'll continue to be here, and there's the silver lining.
 - Michelle: Tribes carry a lot of knowledge also bring long term perspectives about how we may be able to alleviate some of the negative impacts of drought and extreme events; we value their participation with this effort.
- ✚ Michelle: The Ag Innovations report just came out two weeks ago so it's very timely and also highly relevant for this group, as you can see by their recommendations for next steps. From my perspective as a climate change specialist and wildlife biologist, the connectivity approach makes a great deal of sense in an increasingly resource-challenged world and I know we can apply it here in the Tulare Basin.
 - Report link: http://aginnovations.org/articles/view/new_report_looks_to_the_kings_basin_for_drought_solutions/

Denise England – Tulare County perspectives on SGMA

- ✚ Kings, Kaweah, and Tulare are considered high priority basins under SGMA.
- ✚ Local agencies are reacting uniquely according to circumstances their regions.
 - Locals are to have control; but it's not clear who wants to be in control and who will end up with control
 - The different entities have different goals so they're figuring out who would be best suited.
- ✚ In the Kaweah subbasin the Kaweah Delta Water Conservation District (KDWCD) covers the majority of the groundwater basin. KDWCD has been involved in water planning and programs for a very long time, so the relationships are there, we're just trying to figure out how they will work together to respond to SGMA. We're looking at third party facilitation for Kaweah.

Denise England – Tulare County perspectives on SGMA (continued)

- ✚ There are many governance options:
 - A single GSA, with a single entity
 - A single GSA with multiple agencies
 - Multiple GSAs coordinating to cover the Kaweah Basin
 - A hybrid of any of the above
- ✚ Each basin has strengths (existing local agency relationships, structures and systems, data sets), weaknesses (additional data needs, coordination between sub basins, incomplete basin coverage, lack of local funding sources, limited experience with extractor outreach), opportunities (act authorizes new authorities and tools), and threats (effective implementation issues, risk reduction, economic impacts, diverse and competing beneficial uses, stakeholder opposition).
- ✚ The current discussion has been about SGMA education - lots of outreach, roundtables, and meetings. Locally we're determining who the water users, interested parties and stakeholders are.
- ✚ Carol: I see an opportunity emerging for cross-IRWMG coordination as the GSAs are formed. There is a real need for this and I'd like us to start thinking about how to get that going with the Southern Sierra IRWMP and the Kaweah IRWMP.
- ✚ Jared: Are any agencies looking at the watershed outside of basin boundaries?
 - Denise: Yes, but some groups more than others; in Kaweah and Kings we've had many conversations about the upper watershed and we're looking there to create better circumstances for runoff and production. That is one of the key solutions to get better supply but we're not yet at the project level.
- ✚ Denise: Much of the upper watershed land is federal property so we're meeting with them to ask that same question.
 - Carolyn: The federal land managers have been trying to do this type of forest management for years, but the real blockage is the NEPA process and the public opposition to the projects.
 - Denise: In the forest service there is limited personnel to implement these projects, so one of our big 'asks' is for additional resources in those areas.
 - Carolyn: We could also reposition firefighting funds so they are spent on active management rather than response actions (i.e. when wildfire breaks out) which is something being worked on.
- ✚ Michelle: With regard to the need for education, keep in mind that outreach and education about watershed management is one of this group's goals.
- ✚ Carol: Lobbying assistant can be offered through TBWP as well.
- ✚ John: Engaging environmental groups (e.g. Forest Legacy, Sierra Club) and NGOS early on in projects may help prevent them from filing suit afterwards.
- ✚ Carol: TBWP hopes to be involved in the advisory committee in Kaweah. At the state level through Prop 1 there should be funding incentives for interregional collaborations.
- ✚ Jared: Yesterday I did presentation to Mt Whitney high school about meadow restoration and I'd love to speak with you (Denis) about making a presentation about civics and water.
 - Denise- there is a big value in educating K-12, if you educate the kids they will pressure the parents to conserve and be aware.

- ✚ John: I attend the California Water Commission meeting last night and the Commission recommended cross-IRWMP coordination
 - The bad news about Prop 1 \$\$ is that you need to show benefit to the Delta ecosystem or its tributaries. Every now and then the Tulare overflows into the San Joaquin so you may be able to show a connection there, but broad collaboration is going to be important here for us to tap into those funds.
- ✚ Carol: Jim Burns stated 50% of projects have to demonstrate ecosystem benefits.
 - John- it needs to be of benefit to the Delta or its tributaries. They (grant administrators) are going to try to be as broad as they can in definition.

Sarah Campe – SNC Proposition 1 funding

- ✚ Watershed Improvement Program (WIP)
 - WIP is about determining how to increase the scale and pace of restoration, and what are the impediments?
 - Sierra was in poor shape even before the drought from a century long mismanagement resulting in massive overgrowth and fires. Expecting 30-80% die off from pine beetle outbreak.
 - Many questions: How do we manage restorations? How do we align different policy's specific to forest management? There are also social obstacles that open the forest service to litigation through NEPA. How do we work through a collaborate process early on to prevent going through the courts later on?
 - In March we had dozens of agencies get together to discuss policy alignment for the Sierra. This will not be brought down to a watershed level, since each watershed is different we need to know what our local conditions are and who the players are.
 - The Conservancy got \$25 million of Prop 1 funding, which is not enough with everything that needs to be done, so we had to step back and prioritize.
 - Part of the WIP is to say who else got money and how can we leverage funds to achieve overlapping goals?
 - We haven't figured out integration of the end user groups yet. Current work is focused on large single user groups.
 - \$10 mil released this round towards forest health projects; biomass utilization for small wood. The RFP will be released July and will be due in Sept, with another funding round in March on a two year cycle.
 - If you have a project related to Sierra Nevada health but doesn't fit into our guidelines we want to hear about it and feed it to our partner agencies; also we have a staff member to match projects to money (Alisa Brown). We're doing all this to stretch every dollar.
- ✚ John: Have you (SNC) been able to tie into emergency drought funds?
 - Sarah: Not sure, everything is moving so fast.
 - John: A big chunk of that money came through Flood Control finding (1e) so it doesn't fit well with other funding but we (DFW) have some money for fish rescue.
- ✚ Jared: Do you want to hear ideas for proposals even if they don't match, what is the process for running projects past SNC?
 - Sarah- this is still being figured out but we recognize groups have limited capacity for grant development so the plan is to work really closely with potential grantee, so please talk with us as early as possible and we can funnel you the right direction.

Sarah Campe – SNC Proposition 1 funding (continued)

We'll probably have a pre-proposal review so you don't have to make the full investment in a proposal.

- + Ron: For your Prop 1 funding will there be a requirement about being connected to the Delta water system?
 - o Sarah: No, ours is for the entire Sierra region and it should be distributed equally, up to \$500,000 in an effort to think at a larger landscape level.
- + John: There are many pots Prop 1 funds; the Conservancies around the state got funding but it wasn't as much as they liked; a lot was given to surface storage and there is a lot of regulation that goes along with all these funds.
- + Ron: There's no direct funding for meadow restoration which is disappointing.
- + Michelle: We all need to pay attention to potential funding opportunities and always be thinking about how this group can leverage every potential funding source to help achieve our common goals.

Subgroup Updates

- + Michelle: The subgroups are developing organically and fulfilling roles as needed.
- + Michelle: I have spoken with Denise Kadara, who is working with me on the DAC subgroup.
 - o We're considering holding a Project WET (Water Education for Teachers) class in the Tulare Basin (likely in 2016) with a focus on region-specific issues and the upper-lower watershed connection.
 - Dave mentioned that Western Water had materials years ago that would be relevant.
 - Sequoia National Parks had some materials as well.
 - Jared: Teachers are worried about common core and next gen science standards. He has experience with relating content to those standards.
 - John: English classes might even be a good audience since non-fiction writing is required.
- + Michelle: The Climate Variability and Extreme Events subgroup has not formally met although they will soon, but I've spoken with a few people on the subgroup and have a preliminary concept for a conference to be held in fall 2015.
 - o Working title: "Climate Extremes, Vulnerability, and Adaptation for Tulare Basin Water Managers."
 - The focus will be the agricultural community and connecting them with other water users throughout the watershed.
 - DWR will help plan and will provide printed conference materials.
 - Additional co-sponsors are highly desired! – contact Michelle if interested or if you know of a group who would be.
 - Audience may include farmers, irrigation district employees, ranchers, urban water utility managers, possibly even federal land managers.

Subgroup Updates (continued)

- ✚ Lucas/Carolyn/Sarah: The Upper/Lower Watershed Connections subgroup has a proposal they've been working on.
 - They'd like to create a 'think-tank' that will synthesize scientific understanding plus incorporate the socio-economic piece.
 - The think-tank would be comprised of people from different sectors who would form a large working group to brainstorm ideas.
 - The goal would be to create a common vision to manage the watershed in a sustainable way that meets all of our needs.
 - Unlike crisis response planning, this would entail big-picture, long-term thinking with a landscape-level perspective.
 - Santa Clara Valley project provides a model of a good way of telling the story.
 - "Healthy Lands and Healthy Economies – Nature's Value in Santa Clara County"
 - Carolyn: We have a lot of opportunity in the Kings River watershed through SNAP/UC Santa Barbara, but many other entities are focusing on the Northern Sierra; we need to bring attention to the Southern Sierra!
 - Another aspect of this project will be focusing on what is being done (and by whom) and what needs to be done.
 - 1st step: Parks and Forest Service projects will be mapped.
 - 2nd step: What does that map tell us? Can we enhance existing projects?
 - Example: how could we align burn projects?
- ✚ Carolyn: Roger Bales from UC Merced has grant money for a groundwater observatory.
- ✚ Ron: I recommend you contact Dirk Charley of the US Forest Service, he coordinates a tribal forum and would be good to have on this working group.

Next Steps

- ✚ Michelle will send out draft meeting summary and a scheduling poll for our next meeting in July.