



SNAMP 2014 1st Quarter MOU Partners Meeting

Wednesday, April 16, 2014, 2:00 pm to 3:30 pm, conference call

Notes

In attendance:

John Battles – UC Berkeley

Patricia Flebbe – USFS Region 5

Russ Henly – CA Resources Agency

Peter Hopkinson – UC Berkeley

Susie Kocher – UC Cooperative Extension

Anne Lombardo – UC Cooperative Extension

Victor Lyon – USFS Tahoe NF

Debra Whitman – USFS Region 5

Michael Willis – USFS Region 5

1) Information on upcoming SNAMP IT meetings, including discussion format of IT meetings, informed by PPT IT meeting on April 2 (Susie Kocher).

May 1, 2014 – Spatial IT webinar

May 15, 2014 - Fire & Forest Ecosystem Health IT meeting - McClellan

[June 19, 2014 - American Fire field trip – Foresthill]

June 20, 2014 - CA spotted owl IT meeting - Davis

July 31, 2014 - Fisher IT meeting - Fresno

September 4, 2014 - Water IT meeting - Merced

November 6, 2014 - final SNAMP Annual meeting - McClellan

Susie Kocher reported on the upcoming SNAMP IT meetings. The UCST has developed an ambitious IT meeting schedule. Participants and stakeholders will hear from each team and give feedback to the team. The goal of the IT meetings is to hear from individual teams about the

research results that will appear in the team's individual final chapters and to get feedback on these results.

On April 2, the Public Participation Team (PPT) held its IT meeting as a webinar. The PPT presented its results and then there was an on-phone discussion.

The Spatial Team's IT meeting will also be a webinar. Currently, the rest of the IT meetings are planned as face-to-face meetings.

The final annual meeting at McClellan will provide an opportunity to provide input on the full integration.

Patricia Flebbe suggested that the Owl IT meeting take place in a location near Foresthill, the location of the American Fire field trip the previous day. Susie said she would consider changing the location of the Owl IT meeting.

2) Update on UC Science Team progress towards the SNAMP final report (John Battles).

John Battles described the highlights of the recent work by the UC Science Team. The Project Integration and Management Team (PIM) with help from other teams has been putting together introductory material for the final report: site description, maps, workplan design. All individual teams are working on their own chapters too.

The Fire and Forest Ecosystem Health Team (FFEH) is providing the core metrics for other teams. FFEH is currently focusing its fire behavior modelling on Last Chance, assessing how forest structure and composition change with SPLATs. FFEH is modelling that forward using lidar data, plot data, and information on treatment locations from the USFS. FFEH has had to build many analytical tools, for example, a Leaf Area Index for the Water Team.

For the fire behavior modelling, FFEH is using FARSITE. The canopy cover metric produced by the modelling has to be checked by the FFEH and Owl teams to confirm that it matches what they see on the ground. The Fire team is running models on Last Chance right now, and then the results will go straight to the Owl team. FFEH is being very careful that any changes detected are tied to treatment, not tied to data processing/modelling decisions we made, and are being careful to avoid confounding variables. This FFEH work is vital for the integration chapter

In general, we are making good progress and are adhering to our internal timeline well. We are still a bit behind on the modelling for Sugar Pine. It is not clear from the lidar data where the treatment occurred, and the Ranger District is having difficulty getting us their treatment data.

The two Ranger Districts implemented the SPLAT treatment very differently; SPLATs vary depending on circumstances.

The Owl Team is doing field work in Eldorado but not taking SNAMP data.

The fisher field work is now run by the USFS PSW; they are collecting data, but the data will be analyzed post-SNAMP.

UCST have finished the 2013 budget and is on budget and reasonably on schedule. The schedule is ambitious. Our goal is an integrated approach – looking at all resources on a scale in common. The management recommendations will also be integrated. John said that he did not see any key problems.

Patricia noted that UC Berkeley has not billed the Forest Service for six months and reminded the UCST that they will have to submit all remaining SNAMP bills by September 2015, a deadline that cannot be extended. John said that he would make sure that the bills are submitted.

3) Upcoming dates

Thursday, June 19, 2014: Last Chance/American Fire field trip

Wednesday, August 13, 2014, 8-11:30 am: SNAMP-related Organized Oral Session at Ecological Society of America meeting in Sacramento.

Patricia asked about funding for American Fire research [not a part of SNAMP]. John reported that the funder, the National Science Foundation, wants very finalized paperwork. John still wants to submit a proposal, but the NSF is concerned about the need to re-measure the plots before any post-fire logging takes place. John asked Victor Lyon whether the American River Ranger District could provide a letter of support for the American Fire re-measurement. John and Victor said they would talk after the MOUP call ended.

Patricia also inquired about Joint Fire Sciences Program (JFSP) funding for American Fire research. John said that Scott Stephens had been funded by the JFSP but for Rim Fire research. John explained that the Rim Fire has captured much of the funding interest.

Victor said that he and Kim Ingram were working on logistics for the American Fire field trip on June 19. Kim will probably contact everyone soon. He asked whether anyone had any special requests for what they would specifically like to see on the field trip. Patricia said she would be interested in seeing a SPLAT area that burned compared with a burned area with no SPLAT treatment, and also a SPLAT area that did not burn. She asked whether any owl Protected Activity Centers (PAC) were in the burned area. Victor said that the Ranger District had eliminated two PACs because they had burned with high severity. Also, the District moved two other PACs into habitat areas that survived the fire.

John asked how many people were expected to participate in the field trip; there might be a large amount of interest, which could determine what was possible. Victor said that if the crowd was really large, they would adjust logistics as necessary. **Patricia suggested that they may want to consider putting a limit on the number of people, and John said that the UCST should talk about capping the field trip if necessary; he will talk with Kim.** John asked how many people were possible. Victor said that 50 would be a large field trip and that 100 would be a lot to manage – the cut-off point would be in the range of 50-75; he suggested 30 vehicles would probably be possible. John asked whether the District was worried about hazard trees. Victor replied that hazard trees have been partially mitigated. John also noted that it is often hard for people to hear speakers on a field trip with many people.

4) Basic structure for the MOUP response to the SNAMP final report (Patricia Flebbe).

Patricia Flebbe has emailed an outline for the MOUP response to the SNAMP final report to the MOU Partners.

In the Memorandum of Understanding, each MOU partner described specific goals for SNAMP (see outline from Patricia or MOU - <http://snamp.cnr.berkeley.edu/documents/20/>); these goal

statements will serve as the basis for the agency response to SNAMP. Each agency will write an individual response to the final report and whether SNAMP met agency goals, and, to the extent possible, areas of consensus in the responses can be combined into a consensus section. John asked Russ Henly whether the state departments would write individual responses or a single state response. Russ said the state departments will discuss that and decide. John suggested that agencies should not only write a response but also provide information about participating in a project like SNAMP for the next group that tries to organize a large, adaptive management project. Patricia recommended a “lessons learned” approach to the responses. She said that she envisions the MOUP response as fairly short: approximately 2 pages per agency and 2 pages of consensus. Patricia also suggested that the SNAMP timeline be reviewed in the MOUP response. Patricia said that she would ask Mike Chapel to contribute to the Forest Service’s MOUP response.

Patricia asked about the MOU Partners’ interest in subtopics like neutrality or the collaborative process. John said that feedback from the MOU Partners on the UCST’s 3rd party role and neutrality would be very helpful. Patricia said that the UCST was very important in helping the Forest Service learn the collaborative process.

John said that he thought the MOUP response will help another person in setting up a large, multi-partner, adaptive management project in the future and asked everyone to be honest in their responses.

- **Addressing funding difficulties in the SNAMP final report**

Patricia noted that Sue Britting of Sierra Forest Legacy asked the Public Participation team in their recent IT webinar to address funding issues in the SNAMP final report; Patricia wondered whether UCST would be willing to do this. While agreeing that continuity of funding was a big issue for SNAMP, John stated that he did not think that funding issues would be a significant focus of the report. Russ said that the State could provide some language in the MOUP response regarding the difficulty of funding. John added that it might be worth noting in the report the administrative constraint of money coming from several different pools and pointing out that multiple pools can cause problems even if there is adequate funding – dealing with multiple

sources of funding can be an administrative challenge. Russ suggested that information on how to move forward in such situations would be helpful, but John said that he does not have a clear model of how best to deal with the problem; John observed that CalFed had difficulty with pooled funding too. All SNAMP parties were as flexible as they could be and tried their best to accommodate the funding situation. John noted that a non-profit organization could be employed as a clearing-house but then would itself need to be funded, resulting in a double layer of overhead charges. Patricia said SNAMP will want to acknowledge that the funding issues were a big part of the collaboration. John stated that having some of the project components remain internal to the agency really helped the UCST administer the project, e.g., the fisher flights were in-house for the Forest Service, some water equipment, etc. was in-house for the DWR. Patricia noted that that may have worked better for the UCST than for the agencies, and John observed that that is why it's good that the SNAMP report will have both perspectives.

Patricia said that she would summarize the discussion and circulate it. She asked agencies to decide on a lead author so that there would be a single point of contact for the MOUP response for each agency.

5) Team briefing – Fire team work.

John briefed the MOU Partners on the current FFEH team fire behavior modelling work. The most important aspect of the fire modelling was the decision about what model to use. In the initial SNAMP fire behavior paper, FLAMMAP was used. FLAMMAP modelled 1,000 fire iterations with random ignition and proved a useful tool.

But the fire impacts that the Owl and Water teams need for their analyses relate to how the landscape responds to a *particular fire under particular conditions*. The FARSITE model addresses this so the FFEH team decided to use FARSITE rather than FLAMMAP for the integration stage of the analysis. The fire that is being modelled by FARSITE occurs 5 years after the SPLAT treatment, under severe but not super extreme conditions. FARSITE also

provides metrics such as the number of trees that die (FLAMMAP does not generate these types of metrics).

There are 4 scenarios that are being modelled:

- 1) no SPLAT and no fire;
- 2) SPLAT implemented but no fire;
- 3) no SPLAT, but a fire occurs;
- 4) SPLAT implemented, and a fire occurs.

FFEH is modelling and analyzing this one fire, and the tree mortality metric will then feed into the owl habitat and water impacts. The drawback is that there is only one fire, and that fire has particular characteristics. FFEH may possibly have time to run more than 1 specific scenario fire. Currently, FFEH is doing the first runs of the model. If necessary, FFEH can go back to FLAMMAP analysis, and FFEH may report on FLAMMAP results, but FARSITE is the more powerful method, especially for integration efforts. FARSITE provides more tangible, more explainable, less abstract results.

Another interesting aspect has been analyzing the pre- and post-treatment plot data. There is a big difference in treatment between the two SNAMP sites. At Last Chance, the northern site, we observe a lot of change in canopy spacing, crown ratios, etc. In contrast, at Sugar Pine, the southern site, there is a reduction in fuel bed but over a much smaller area. It is hard to see changes in canopy structure, and only a small fraction of the plots show treatment effects. This will be an interesting comparison between the 2 sites. Fuels on the ground often determine the effects of fire. The two SPLATs emphasize different aspects of SPLATs. Note that the 2nd year of SPLAT implementation at Sugar Pine will not be part of the SNAMP analysis.

FFEH will have its IT meeting on May 15, 2014, and will share some points about the fire modelling and analyses. Victor asked whether there would be FFEH fire modelling specifics to share on the June 19 American Fire field trip, and John affirmed that FFEH will hand fire modelling products to the Owl team in April so there should be both FFEH and Owl results to share on the June field trip.

DECISIONS and ACTION ITEMS:

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