

California Bat Working Group Meeting - Feb 6, 2018

Notes by Bronwyn Hogan and Heather Johnson

Notes were expanded upon with links and details

- The below Agenda was revised - Scott Osborn; Bronwyn Hogan
- Introductions - All
- Western Bat Working Group - Bronwyn Hogan; Pat Brown
 - NABCA wiki for bat threats, WBWG membership due, Next meeting location and date
- Statewide Monitoring projects - Ted Weller; All
 - NABat, BatAMP
- CDFW news - Scott Osborn
 - Scientific Collecting Permits
 - Biosecurity
- Gray literature clearinghouse - Leila Harris/Gabe Reyes
- Update on pallid bat as State Bat - Dave Johnston
- Update on California Bat Conservation Plan - Dave Johnston
- White-nose Syndrome (WNS) updates - Bronwyn; Scott; All
 - surveillance (including looking for hibernacula), Status of WNS response plan, USFWS Region 8 coordination CA/Nevada/Klamath Basin, coordination with USFWS Pacific Northwest Region states and overlapping federal agencies
- Caltrans study on effectiveness of bat mitigation for bridges - Dave Johnston
- Election for CBWG co-chairs - Bronwyn; Scott; All
- Bat Blitz coordination if it happens on CA/NV border - Bronwyn
- Structure and timing of future CBWG meetings - All

NOTES:

Over 60 people in attendance.

North American Bat Conservation Alliance (NABCA) Wiki - Bronwyn and Heather Johnson

Do you have information on how to address threats to bats that you can share with the conservation community? The North American Bat Conservation Alliance has developed a special Wiki, for sharing information on bat conservation. <http://batconservationalliance.wikidot.com/>

- Anybody with information on ways to address particular threats facing bats in North America is invited to sign in to the Wiki and contribute their information. The Wiki was developed to allow experts to share information on approaches for mitigating these threats with other experts and conservation practitioners. Ideally, you would post a brief summary of approaches that you have tried, with information on whether they worked (or didn't work) and links to resources with more details.
- The site is organized based on the various threats that face bats in North America. The wiki launch was announced at the North American Symposium on Bat Research in October (Knoxville, TN). Some information has already been posted, but NABCA is looking to folks with on-the-ground experience in bat conservation to share their knowledge and build up this site.

The NABCA hopes you will participate by reviewing/editing and adding data. They have provided some simple instructions on how to do this, which are posted on the Wiki.

Scientific Collecting Permits (SCPs) - Scott Osborn

- Earliest adoption of the new SCP regulations would be July 1, 2018. May be pushed off a full year due to fiscal analysis by the state Dept. of Finance. Suggestion to get a permit (new or renewal) as soon as possible.
- Key features of new regulations: online application, online reporting database, revised fee schedule, clarify admin procedures and provide definitions regarding types of permits, application process, renewals, etc.
- Two classes of SCPs: (1) General Use permits for low risk activities involving common or abundant species, and (2) Specific Use Permits for activities united by a common set of research goals or objectives; may involve more invasive techniques and/or species of greater conservation concern (bats would fall into this category).
- How many specific use permits would a person need for a variety of projects in California? A person might apply for one stating they are examining the abundance and distribution of bats throughout the state.
- CDFW is paying close attention to Justification/Need, Species, Level of Take, Education/Experience before authorizing work with bats.
- SCP is not required for strictly acoustic work. We discussed concern for acoustic work involving people entering roosts or being close to roosts. CDFW can't regulate this in general aside from SCP, it is an education concern. How to educate folks on avoiding disturbance at roosts? Suggested to use mini-webinars or online videos for training.
- For people doing environmental review, for example Timber Harvest Plan, what type of permit is needed? Scott replied depends on level of activity, ex. capture versus acoustic monitoring.
- Dave Johnston pointed out that acoustic data is reportable on SCP reporting form.
- Regarding reporting on SCP form, Bill Rainey asked how does CNDDDB handle sensitive information such as roost locations or sensitive species occurrences? Scott replied that exact locations of roosts can still be suppressed such that CNDDDB indicates a roost is in the general area (such as to the USGS 7.5-minute quadrangle level) but the exact location is not provided.
- Mentioned Species of Special Concern: Pat Brown raised example of fringed myotis. What is done with previously submitted SCP report data on a species that was not a species of concern in the past, but is now one? Scott replied that CNDDDB staff does go back and mine data on those bats that are now species of special concern. How do we reach individuals who may have data that wouldn't have been put into CNDDDB – does staff contact permit holders for older data? Unlikely. Pat asked attendees to send any information on fringed myotis maternity roosts to her.
- How does CDFW define a qualified bat biologist? Scott says he is open to input regarding this question.

Bat Handling Training in Workshops - Leila Harris

For handling training as part of workshops, proposed idea of utilizing captive bats (in the care of an educator/rehabilitation permittee) to learn initial handling techniques. The goal is to reduce stress on wild-caught bats. Captive bats would be more resistant to stress from handling, reducing the chances of negative impacts on captured bats from stress/capture myopathy, such as mortality.

Acoustic Data - Bronwyn Hogan and Heather Johnson (filling in details after meeting)

- An Acoustic Monitoring Handbook resulting from the 2nd International Symposium on Bat Echolocation Research: Tools, Techniques, and Analysis in 2017 is in the final production and printing stage. It will be a brief but comprehensive summary targeted towards bat-workers with varying levels of experience with comments, references, and materials.
<http://www.batsurveysolutions.com/Events/2017acousticsymp.html>
- We discussed standards for agencies to accept acoustic data.
- Ted Weller noted that for acoustic data, spatial replication is more important than temporal replication.

NABat – Ted Weller <https://nabatmonitoring.org/#/home/welcome>

- A large-scale, long-term monitoring program designed to assess the status and trends of North American bats at local, regional, and range-wide scales. Program spans the United States, Canada, and Mexico and brings together an extensive network of partners who utilize the NABat program design and monitoring protocols to collect bat population data.
- “Loeb, S.C., T.J. Rodhouse, L.E. Ellison, C.L. Lausen, J.D. Reichard, K.M. Irvine, T.E. Ingersoll, J.T.H. Coleman, W.E. Thogmartin, J.R. Sauer, C.M. Francis, M.L. Bayless, T.R. Stanley, and D.H. Johnson. 2015. A plan for the North American Bat Monitoring Program (NABat). General Technical Report SRS-208. Asheville, NC: U.S. Department of Agriculture Forest Service, Southern Research Station. 100 p.” at https://www.srs.fs.usda.gov/pubs/gtr/gtr_srs208.pdf
- Question about doing NABat surveys in places where there are long term datasets already. We discussed how to deal with that. We discussed mist-netting data, the value of netting data and whether NABat can take that data.
- Bat Acoustic Monitoring Portal at <https://batamp.databasin.org/>
- Ted encouraged all California bat surveyors to share data.
- Bronwyn and Scott noted there will be an organizational meeting in Feb/Mar then generate “an ask” for the working group - ex. where and when to volunteer for surveys.

Grey Literature Clearinghouse - Leila and Gabe Reyes

- How to get the info and data that is out in the bat community into a cite-able format. Maybe a “notes” publication every couple of years?
- Are there other ideas?
- Gabe has started collecting grey literature on tree roosting ecology, available via CalBats [see below for info on CalBats]. He has found only a handful of papers from across the state. Submitting field notes or reports or other info that can be made public via Google doc would be really useful. Steve Norton – who volunteered to put together the CBWG bat website – suggested there could be a tab on the website. Leila said we are starting with a spreadsheet that has contact info and time to be devoted, and then a spreadsheet that folks could fill in – even have things like “second hand” stories to track down the first hand information on that story.

Data Sharing - All

- Pat Brown pointed out the problem of how to deal with information from private land and private client. Private client may feel they own any data from their land. How do we share it?

- Scott suggests front-loading agreements with clients to allow release of info of conservation significance. Or fall back on code of ethics for a wildlife professional <http://wildlife.org/wp-content/uploads/2017/07/Code-of-Ethics-May-2017.pdf> .
- Dave Johnston pointed out that he often has to deal with non-disclosure agreements (NDAs) – and that sometimes there are regulatory requirements to report (ex. Hawaiian hoary bat).
- Bronwyn suggested that anyone who knows about publicly available reports or data – see about whether those could be scanned in to the CDFW document library – especially reports from different agencies..

CDFW Document Library Link - Scott Osborn

Scott noted that CDFW has a document library – so maybe could get other agencies’ reports uploaded there too?

*Heather inserted link here: <https://nrm.dfg.ca.gov/documents/Default.aspx>

She searched for “bat” and got over 1,400 hits, searched for “Myotis” and got 366 hits.

California State Bat Update - Dave Johnston

- The petition for listing Townsend’s big-eared bat drove conservation, but not listed, and without a listed species conservation is limited. Four other states have a state bat.
- Adopting pallid bat (*Antrozous pallidus*) as state bat: Because we don’t have any state or federally listed bats, the pallid bat was proposed and promoted via online petition and meetings and phone calls etc. Pallid bat chosen because *A.p.pacificus* range is almost entirely in CA. Sen. Bill Dodd agreed to sponsor a bill, but many other things took priority, didn’t move very far. Dave met several times with Dodd’s staff. However Sen Dodd sponsored a resolution saying the pallid bat should be the state bat. This is a first step. Moving forward, very slowly.
- Heather sent out CBWG email on petition link: <https://www.ipetitions.com/petition/pallid-bat-as-the-california-state-bat>.
- Dave pointed out that the pallid bat eats California prionus which is a large (max length about 2.5 inches) beetle (*Prionus californicus*) that is a pest on vine and orchard crops, and hops. What a great promotion for pallid bats!!
- Dave also mentioned that pallids eat cockroaches and people in Mexico will leave screen-less windows open at night so pallids can get in to hunt.
- Suggestion to create short videos for bat benefits for beer to send around, post on YouTube.

Bats and Bridges - Dave Johnston

- There is a follow-up underway for the 2004 California document “Johnston, D., G. Tatarian, and E. Pierson. 2004. California bat mitigation techniques, solutions, and effectiveness” <https://nrm.dfg.ca.gov/FileHandler.ashx?DocumentID=10334>
- Dave is putting together a report on mitigation designs and effectiveness. Caltrans update: 77 bridges were selected that had bat habitat which was replaced with mitigation. Looking at a bunch of factors for what works and doesn’t work. A problem even with projects that were well thought out and designed, is that habitat was not built to specifications, and so failed.
- If anyone has a project they think is exemplary (good or bad) please contact Dave about it.
- Caltrans project will be wrapped up in Dec of this year with a report out.
- Dave is doing a CDFW presentation/webinar on bat mitigation on March 21 1-3 pm.
- Dan Taylor (BCI) mentioned that Justin Stevenson bridge roost insert has been successful.

- Greg Tatarian (Wildlife Research Associates) has successful designs.
- Joel Diamond gave a poster...(no further info).

Biosecurity - Scott Osborn

Biosecurity addresses the transmission of pathogens from animal to human or animal as a result of human handling.

- Avoidance methods include rabies vaccination, WNS decon, hantavirus.
- Get proper training to avoid bites and scratches.
- Avoid eating and rubbing eyes, nose, or mouth when handling animals.
- Use new or clean handling bags for each new animal.
- Equipment used directly on animals should be sanitized, e.g. using new pair of disposable gloves per animal.
- It is standard practice to use disposable gloves to handle animals.

California Bat Conservation Plan Update - Dave Johnston

Dave reported that a group of authors have been working on and off over 16 years to produce a full plan, but due to complexity and other factors a single document containing chapters on conservation issues, bioregion characterizations, species accounts, maps, etc. is not likely. Dave Johnston, Scott Osborn, Greg Tatarian, Heather Johnson, and Jill Carpenter met with editors of The Wildlife Society's Western Section journal "*Western Wildlife*". We are investigating the potential to publish plan chapters, or link to them on a CDFW website.

Ted Weller asked that rankings by species per conservation threat be published/available first.

Bat Blitz - Bronwyn Hogan

If Nevada organizes a Bat Blitz on a state border park we may coordinate with them. A Bat Blitz is a coordinated, intensive survey designed to sample the bat community in an extensive area, typically over a 2-3 day period.

Bat Carcasses - Scott Osborn

In the past some out-of-state carcasses were allowed into California for use in wind carcass trials and other work (genetics, tissue banking, etc.) but that is no longer allowed. The need for bat carcasses has been a driver for a potential solution for providing storage and distribution.

- Who should be contacted for carcasses for wind farm studies? Scott Osborn because CDFW is providing storage.

Batsnearme.com - Natalie Downe

"Bats near me" is an application by Natalie Downe and Simon Willison that tells you where your nearest bats are using data from iNaturalist. You can search for a place and get a map with record information for the bats that have been spotted in or around that location. Please check it out and note that some "sightings" need to be verified - maybe you can help.

Bat Cafes - Leila Harris

Leila reported on Bat Café groups in California. The below is from an email she sent out on the listserv: Dear California Bat Folk,

This is an open invitation to, and update on, the regional "Bat Cafe" groups, to make sure bat-interested people know about the groups and the standing invitation to participate.

- Purpose: The idea behind these Bat Cafe/"CalBats" groups is to provide a local opportunity for people to get together face-to-face on a regular basis to develop resources and share ideas, challenges and best practices around bat ecology. We'd also like to ensure that information and resources are vetted, transparent and available across all groups. Subject matter is all things bat, including environmental regulatory compliance, such as impact assessments and mitigation approaches; public education; field observations and grey literature; survey and research equipment; academic and applied research, and beyond.
- History: We started as a group that meets monthly in the Sacramento-Davis area. Since then, three more regional groups have started up (North Coast, SoCal, Kern). These groups are inclusive and informal. Topics and activities are directed by the interests of the folks involved. The groups are not part of an official organization and they are open to all.

How to get involved: If you are interested in being on the mailing list for one or all of the groups, please add your name, preferred contact email and your region(s) of interest to the online master spreadsheet available on Google Drive here:

[CalBats Master Contact List - New Interest](#)

If you have any trouble with the Google Drive spreadsheet, or have any questions, please don't hesitate to reach out to Leila Harris or the associated contacts for your area. (Please accept our apologies in advance for possible slow replies due to overloaded schedules across the board.) If there's no group nearby, let us know how we can help you start one! If you would like to share your research or expertise and offer yourself up as a guest speaker, we would be humbly grateful.

CalBats regional group details:

Sacramento Area Bat Cafe

Contact: Leila Harris, leilaharris.wildlife@gmail.com; Marieka Schrader, jamaicalily@gmail.com; Heather Johnson, heatherj@calweb.com

History: ~Monthly meetings since fall 2016.

Description: This is an inclusive group focused on bat acoustics and bat biology. The goals are in line with the purpose stated above. It's also a chance for students to connect with professionals, and for biologists from agency, consulting, nonprofit and academia to get together in an informal setting. We've had potlucks, pub nights, mini presentations and field demos. We all understand crazy work schedules; feel free to come and go as suits yours!

North Coast/Humboldt Bat Group

Contact: Jen Olson, Jennifer.Olson@wildlife.ca.gov; Lauren McClure, lauren@stillwatersci.com

History: Meetings ~ every other month since June 2017. Based in Arcata-Eureka area.

Description: Similar goals to the other groups. We've had grad student presentations, regulatory discussions, field outing to a hoary bat research site and are planning additional training opportunities for our area.

SoCal Bat Group - First meeting Feb 2nd.

Contact: Rachel Blakey, rachelvblakey@gmail.com; Jill Carpenter, jill.carpenter@lsa.net

Description: We currently have members from LA, Orange County and San Diego and we're excited to plan batty events in the Southern California area. We plan to hold regular events to advance bat outreach, acoustic literacy of bat workers and to provide knowledge sharing and networking opportunities to people who love bats. If you're interested in planning, guest speaking for, attending or just generally being involved in the latest CalBats chapter, please join us. If you'd like to be involved

but can't make it in person, feel free to send us any suggestions and we can also keep you posted with the meeting notes!

Kern Bat Working Group - First meeting February 21st.

Contact: Erika Noel, erika@mccormickbiologicalinc.com

Description: Come join us and help start a collaborative group intended for professionals and students working with bats to come together and discuss topics such as bat ecology and biology, survey/research methods, mitigation measures, data analysis approaches, field gear reviews, future bat databases for California, bat conservation, local bat rehab, etc., all in a face-to-face and informal setting. We can share each other's adventures in the bat world with the goal of providing a space to raise the bar on bat ecology knowledge, methods, and data access. This is an opportunity to share ideas and questions to collectively build best practices and improve our approaches to the challenges we face here with our western bats.

Election for Co-chairs of CBWG - All

Heather Johnson and Pat Brown were elected as co-chairs. Bronwyn Hogan/USFWS and Scott Osborn/CDFW will continue on as co-chairs. Tasks are shared among the co-chairs, for example Pat Brown represents California on most conference calls with the WBWG, Bronwyn and Scott provide coordination/information from state and federal agencies, and Heather promotes communication within the working group.

Adventuring Groups - Leila Harris

Participants share videos of mine entries on YouTube. How do we speak to these groups, who value secrecy in all respects, about WNS decon.? Contact REI? Talk to climbing rangers? Post YouTube videos?

Structure and Timing of Future Meetings - All

Meet more frequently? Webinars? Coordinate with regional Bat Café's? There seemed to be general agreement that meeting in conjunction with The Wildlife Society's Western Section conferences should continue. Seemed to be general agreement that the meeting structure was suitable.

What are our goals? Objectives? Products? Suggested to do 5-minute rapid presentations "on what you have been doing" then general information sharing.

Any ideas for other structure and timing please send out to listserv or contact one or more co-chairs.

heatherj@calweb.com; bronwyn_hogan@fws.gov; patbobbat@aol.com; Scott.Osborn@wildlife.ca.gov