Climate Watch — How to Get Started

1) Map reconnaisance:

- Claim a square and target species. Consider the travel distance, terrain, means of access (by road or trail), and of course your own preference and prior familiarity. Consult your *Local Coordinator* before proceeding.
- Mark 12 planned points. (Use the Climate Watch Planner interactive map if you feel like it, but don't feel you need to; a paper map, Google map, or other means is OK if it provides you with a working reference.) Points should be at least 200 meters apart, and all 12 should be reachable in a single half-day outing. (Local Coordinator can assist with picking locations if needed.

2) Field reconnaisance, trial run, or first set of counts:

Print off field data sheets for notes in the field. The form is optional, but note the data required. Bring your map of point locations as described above; adjust locations as needed to ensure good habitat and a place to observe.

Use handheld GPS (smartphone with "GPS Kit" or similar app) At each point:

- record lat-long on paper and in phone app ("waypoint" or equivalent)
- Write a brief description of location with reference to appearance and landmarks
- Note presence of nest boxes or feeders
- If counting birds, note starting time and set a timer for 5 minutes.

On your chosen count day, don't worry if there are few birds — absence is still important data. But if conditions are poor, and likely affected bird activity or your observations, try again later.

3A) Entering data in eBird:

The mobile app is OK but may be inconvenient if cellular internet is not available in the field. We recommend using a home computer or device with good data connection after completing field work. For each list/point:

- Select "Submit" from top menu, then "Use Latitude/Longitude" to set location from field notes or GPS waypoint. Confirm or refine in map view.
- Enter Location Name. Include the grid square, the target species, and the point number. This name will appear in eBird's list of your Personal Locations. I use a CW prefix to distinguish Climate Watch locations; e.g., CW USA-NM-02263 PYNU 1.
- Enter the date of the count, and use "Stationary" as the observation type.
- Add the start time, the count duration (5 minutes) and the number of observers.
- In the "Comments" field, add a brief location description and any other notes you like.
- Enter the species and numbers. At right, confirm this is a **Complete Checklist**.
- Check over the data, and **Submit.** (For few or no birds, you'll be asked to confirm.)
- Copy the list number (beginning with S) to the Audubon portal: http://checklist-submission.s3.us-east-2.amazonaws.com/climate watch submission.html
- Repeat for each point list, and Submit Observation from the portal page.

You should receive an email confirmation. Please forward a copy to your Local Coordinator.

3B) Alternatively:

If you don't want to use eBird, or the Audubon app or website, just send your lists to me, by mail or email. I'll take care of the rest, provided you have included the necessary details noted in (2) above.

 $-Albert\ Shultz, \underline{shultzaw@gmail.com}$

Q: Should I record all birds present, or just the target species?

A: This is up to you. If you enter your lists in eBird, you should record all birds. I recommend this; more data is always helpful, and it may be used in the future. If you use the Audubon app or website, you can only enter the target species.

Q: Can I designate more than one target species per square?

A: Yes. You can designate related species (e.g., Western and Mountain Bluebirds) for a set of points.

Q: Can I include birds I hear?

A: Yes, if you can confidently identify them by sound.

Q: Can I "pish" or play sounds to attract birds?

A: No.

Q: What about distant or high-flying birds?

A: Count all birds in or passing over the circular area extending 100 meters from your point location. Any height counts.

Q: What if I can't ID a bird?

A: After your 5 minutes is up, it is OK to move around or try attracting it to get a better look. If it remains unknown, you can report it as Unidentified (unless using the Audubon app or website, which only record the target species.)

Q: What if I don't find any birds?

A: This is still a valid observation, and should be included. eBird will ask you to confirm that your blank list is complete, but it is not a problem.

Q: What if I think I could have found more birds on a different day?

A: Don't worry. Climate Watch is a big-data project that aggregates observations from many locations over many seasons. The most important thing is that your count is representative. The only time it is useful to repeat a count is if there was some exceptional condition (extreme weather, road closure, construction noise) that interfered with either bird activity or your ability to observe. And don't combine data from different days: to be valid, a set of twelve points must be counted on a single day.

Q: I'm a relatively new birder. Won't I bias the results if I get better next time?

A: Again, don't worry. It is always good to have a partner (or two) to back you up. And in the long run, there is enough variability that missing a few birds will average out. And over time, you'll probably find that these systematic bird counts become more interesting and rewarding!