

Triangle Bird Count Protocols

Please read all instructions prior to surveying your route(s). Adherence to these instructions will lead to more accurate and useful results. We'd like to give credit to the Tucson Bird Count and Fresno Bird Count for developing the following protocols.

Scouting

Being that this is the first survey for the TriBC, it would be beneficial to visit your site before the actual survey. We have tried to screen census sites so that they are in a publicly accessible area.

In the event that a site on your route is not accessible (in a yard, in a restricted area, etc.), choose an alternate, publicly accessible site (sidewalk, street, park, etc.) as close as possible to the original site on your route map.

A few routes have remote sites, plan accordingly and for safety reasons, do not do remote routes alone. The same may apply to some urban routes in certain neighborhoods.

Do not attempt to conduct counts on any private property without consent of the owner, and only count on private property if no publicly accessible location is nearby. If the original site is in a yard or alley, move it to the nearest publicly accessible spot (street, park, etc). If you move a site mark the exact location of the new site on your route map with a red 'X' and the Site ID number, and submit details on the new site location, providing GPS coordinates if possible. Your markings will be used to update sites in computerized TriBC maps for data analysis and for locating the same site in future years.

Equipment Checklist:

- Transportation (car or bike for areas with roads, boots for more 'remote' areas)
- GPS unit (recommended)
- Binoculars
- Pencil or pen with dark ink
- Watch with second hand timer
- Field guide
- Clipboard
- TriBC instructions, route map, and data sheets
- TriBC business card
- Water, sunscreen, hat, etc.
- Data Sheets (download more if needed at: <http://trianglebirds.org/protocols/>)

When to Run Routes

Survey your route on a morning of your choosing during the survey period, April 15 - May 15. Many routes have one or more sites near roads that are noisy with weekday traffic; weekend mornings generally provide better counting conditions.

Acceptable Weather

Occasional light drizzle or a brief shower may be acceptable, but fog, steady drizzle, or prolonged rain should be avoided. Counts should not be done if the wind exceeds 12 mph (loose paper and dust are raised, small branches on trees move).

Starting and Traversing Sites in a Route

- **Choose a path** connecting all the sites along your route in a way **that will minimize** (roughly) **your total travel time** (Site ID numbers are for identification only; you don't need to survey them in numerical order).
- **Begin counting at your first site as close to sunrise as possible** (as early as 30 minutes before sunrise).
- **No counting should take place more than 4 hours after sunrise.** If all sites along a route are not surveyed within this time, survey unfinished sites another morning. Report that this was done in the "Notes" section of your data sheet, with a brief explanation (e.g., "sites x, y, and z involved hiking").

Counting Birds

These are 5-minute, point counts of all species seen or heard within a 40 m radius (130 ft)

- Only one observer should conduct the **5-minute point count** at each site.
- Count from a stationary point outside of a car.
- Count **every bird seen or heard by the primary observer** during the 5-minute period.
- On the point count data sheet **check the S box for seen, the H box for heard, or both.**
- **Only count birds within an estimated radius of 40 meters.**
- It is important to count each bird only once, even if it leaves the site.
- For large groups of birds, estimate the number. Be conservative in your counts if you are uncertain how many individuals there are. If you think you hear 3 American Crows, but can only be sure there are 2, then write down "2."
- Do not exceed 5 minutes because you are sure a certain "good bird" is there and not calling — valid negative data are as important as positive in this survey.
- If you observe, but do not identify, a bird during a point count, it's OK to spend time after the point count working on the ID. Record such birds as being in the point count.
- Don't use any method of coaxing birds ("spishing", tape playbacks). It's important that all point counts be done consistently to produce reliable results.
- Turn and face a different direction about every 1 minute, or you will miss birds behind you. Even if you count mostly by ear, this will help you pick up quieter birds.

Supplemental Observations: Birds detected by other observers in the group, detected outside the 5-minute window, or detected during your transit between sites, should be recorded in the Supplemental Observations Data Sheet. It is only necessary to record on this sheet those species that were not observed already during the Point Count for that site.

Rare or Unusual Birds: Any reports of rare species in the Triangle region or unusual in the area being surveyed should be supported by including some details of the observation in the "Notes" section. Include all features you used to determine ID.

Temporary Noise, Interruptions

If a temporary noise (e.g., passing car) or interruption (e.g., inquisitive resident) interferes with your ability to count birds at a site, pause the count (and the clock) for the duration of the interruption, and resume counting when the interruption has passed. Total time counting birds (that is, not including interruptions) for the point count should be 5 minutes. Birds observed during an interruption, but not otherwise during the 5-minute count, should be reported in the Supplemental Observations column.

Constant Excessive Noise

If constant noise interferes with your observations at a site, try to return to survey the site on a morning when it's quieter. The goal is to accurately survey birds at all sites — documenting the birds in a parking lot is as useful as recording the birds in a wash. Thus, surveying the original site at another time is preferable to moving the site. If returning is impractical, move up to 50 walking paces (but no more) to a spot where the noise is reduced. Report noisy conditions (see Recording Data, below).

Submitting Data

Please submit your data within 1 week of your count date. Please mail: (1) your Route Map, (2) updated site locations, and (3) all completed Route Data Forms to the address below. You may wish also to keep a copy for your records.

Mail completed forms to:

Triangle Bird Count c/o Madhusudan Katti
Dept of Forestry & Environmental Resources
Campus Box 8008
NC State University Raleigh, NC 27695

Contact Information

If you have any questions, don't hesitate to contact the TriBC Project Coordinator, Dr. Kaberi Kar Gupta, lorises@gmail.com

TriBC Principal Investigator: Dr. Madhusudan Katti, mkatti@ncsu.edu

Triangle Bird Count SciStarter page: <https://scistarter.com/project/18979-Triangle-Bird-Count>

Recording Data

This section details the fields on the TriBC Route Data Form sheets. Record all data on these sheets, up to 4 sites per sheet. Use as many sheets as are required for your route, but do not include sites from more than one route on the same sheet.

ROUTE section:

Record the Route Number and Primary Observer name on each sheet, and names of Others Present on the route's first sheet.

SITE section:

Site ID #.

Each site gets a column. Write the full Site ID number here.

Date & Site Start Time:

For each site, record the date, and the time at which the point count was started.

Site Status:

Check one box. Check “new or moved” if the site is in a physically different location from previous years.

Site Location:

Site at which point count is conducted. This description must accurately describe the count location to within 30 feet. This information will be used to ensure that future TriBC's count birds at the same locations.

Sites on or near streets. Report the adjacent street address (e.g., “in front of 4549 Maple St”) or nearest street intersection. Report side of street or corner of intersection (e.g., “20 ft SE of SE corner of Bullard and Blackstone”). If no marked address is near, record distance and direction along street from nearest street. Include any nearby landmarks, especially those likely to appear on maps (e.g., “Woodward Park, 100 ft NE of parking lot”). Including GPS coordinates (in addition to the above) if possible, though not essential if detailed street locations are provided.

Noise level:

Moderate = your ability to detect birds by sound is hindered somewhat;

Extreme = hindered almost completely.

NOTES section:

Use this section for details of site relocations, sightings of unusual species, recording accessibility issues (e.g., "in the middle of golf course, receive permission from clubhouse or call 555-5555 in advance"), or any other important information about a site. Begin any notes with the relevant Site ID number.

BIRDS section:

Write the Site ID # at the top of each column. In the species column on the left, use the Species List to write in the common name, or 4-letter AOU code (if you know it), of the species encountered. If writing the common name, please include the whole name with no abbreviations.

In the Point Count column, record the number of individuals of each species seen/heard during the 5-minute point count. If you use tick marks to tally birds as you observe them, be sure to also write a distinct Arabic number (1, 2, 3, etc) of individuals for each species observed, and circle it to avoid confusion.