BB2eBird™ is a Windows application program that converts your BirdBase sightings into an eBird upload format, thereby allowing those sightings to be easily imported into the eBird database.

eBird (ebird.org) is a global database of bird observations that is used for science, conservation, and to keep track of bird sightings across the world. More than 450,000 people worldwide have submitted sightings to eBird to date, totaling more than 650 million observations from every country on earth. One of the most important aspects of eBird is that data are open and available, and any data that you enter in eBird are freely accessible to you, downloadable at any time for free. These data are also viewable in many various interactive formats and visualizations, from regional bar charts and global species maps, to summaries of all sightings every reported from a country. For example, here are all eBird data ever submitted from India: http://ebird.org/ebird/country/IN?yr=all

BB2eBird gives you—the BirdBase user—a chance to contribute your bird sightings to this important citizen science project, enabling them to be used by ornithological researchers for decades (and even centuries) to come, informing scientific and conservation policy, land management decisions, and much more. Your contribution should not be underestimated: the valuable bird sightings that you have stored in BirdBase are inaccessible to posterity unless you make an active effort to transfer your records from BirdBase to eBird.

BB2eBird automates much of the hard part of this transfer process. You still must apply some quality control to your sightings records by visually inspecting the accuracy of some of the information, but BB2eBird does the "dog work" for you. The remainder of these instructions details the steps you need to follow in order to transfer your sightings from BirdBase to eBird.

The whole migration process is entirely free, as is everything else at eBird. The BB2eBird utility was developed as shareware by Peter Bono and has been available to the BirdBase community since 2008. Now Peter is making his program available through eBird, and, to help compensate him for his efforts, please consider providing him an optional donation.

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Step 1. Installing BB2eBird

You can obtain the BB2eBird utility from the .zip file attached to this article (scroll to the very bottom). You should specify that its contents (the executable file, bb2ebird.exe, the configuration file, birdbase.ini, and the instructions file, bb2ebird.htm) be <u>extracted and saved</u> in the folder holding the BirdBase program (by default, that folder is \BIRDS). Doing so will let BB2eBird be run in the folder where the BirdBase program runs, making the export process as easy as possible.

Step 2. Exporting Your Sightings Data from BirdBase

To get your sightings information out of BirdBase, you'll use the Display function of BirdBase (from the BirdBase Main Menu) and designate "Data exchange file" as the Output Format. You may use the various options on the Display Menu to select which collection of sightings records you want to export into a data exchange file.

Collections in BirdBase can be as small as sightings from a single range of dates in one US state or can be as large as all your sightings from the whole world (BirdBase code WW). You might want to start small, limiting your initial conversion effort to one country. For example, to get all your Mexican sightings into one file, you would perform the following steps:

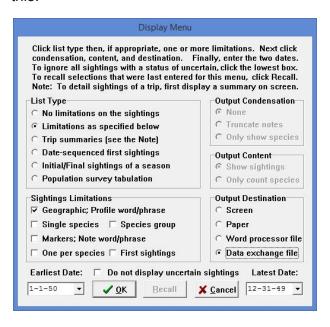
1. After starting BirdBase; you will see the BirdBase Main Menu:



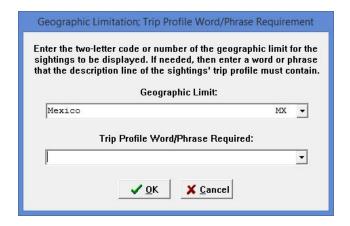
2. Click on Display. In the window that pops up, select "Limitations as specified below" as the List Type;

check the Geographic checkbox in the "Sightings Limitations" section; select "1-1-50" as the earliest date and "12-31-49" as the latest date; and set "Data

exchange file" as the Output Destination. You should see a screen similar to this:



3. After clicking the OK button, the Geographic Limitation window will pop up. Enter MX in the Geographic Limit dropdown box and push the Tab key; MX will be expanded to "Mexico" and you will see this:

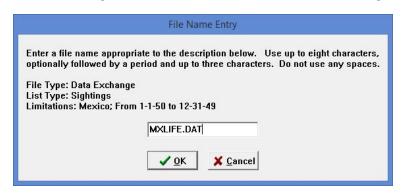


4. After clicking the OK button, the File Name Entry window will pop up. Enter a file name following the rules specified in the window.

Note: If you use DAT as the file extension, your file will be easier to find when you use BB2eBird (see next section for instructions on running BB2eBird).

For this example (your Mexican life sightings), we will use MXLIFE.DAT as the

Data Exchange File Name. You should see something like this:



5. Click on the OK button. If a file with that name already exists, you will be asked to confirm that it is okay to replace it.

When BirdBase is finished, it will display an Information message box like this:



Note: This means that this new file will be in whatever folder the BirdBase application is running from; by default, this is \BIRDS.

Click OK one last time, and you will be returned to the BirdBase Main Menu.

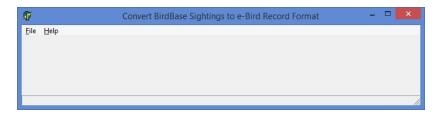
Further advice on exporting your sightings from BirdBase:

- If you try to export too many sightings, your DAT file might be too large for you to easily review and edit during subsequent steps in this process.
- More than 64,000 sightings is definitely "too large".
- We suggest that your DAT files contain no more than a few thousand sightings, if these sightings are from many different locations.

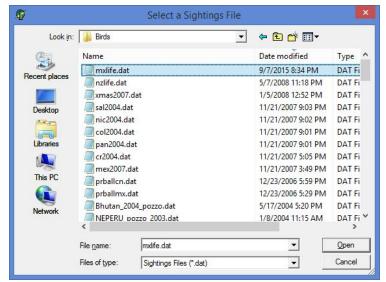
 If you have tens of thousands of records from just a few locations, as you might if you birded extensively in your home county, then importing them all at once would be a good idea.

Step 3. Running BB2eBird

1. BB2eBird is a Windows application. Use Windows Explorer, My Computer, or Computer (depending on your version of Windows) to navigate to the folder where you placed the BB2eBird.exe file, and double click that file. You should see this window:



Click on File>Open. Then navigate to the BirdBase data exchange file containing the collection of sightings you want to convert. You should see something like this:



Click on Open. You will

be returned to the Main Menu.

3. Click on File>Create CSV. Your eBird Record Format (Extended) file will be saved into the same folder where your BirdBase data exchange file is located. The eBird Record Format (Extended) file will have the same filename, but its file extension will be CSV. You will get a confirmation message like:



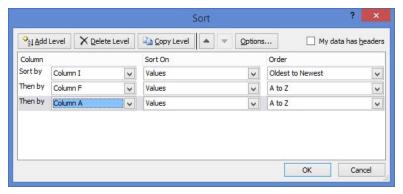
Click on OK to return to the Main Menu.

Click on File>Exit to close BB2eBird.

Step 4. Checking the Quality of your Sightings Records before Importing to eBird

Follow these steps:

a) Open the CSV with Excel (or some other spreadsheet program) and sort all the rows first by column I (date), then by column F (location), then (optionally) by column A (species). The sort screen might look something like this:



- b) While still in Excel, compare column D (which gives the count of the species seen) with column E (the comment associated with the sightings record). While the BB2eBird program tries determine the correct number of individuals seen, the program can still be confused if the sightings comment spells out numbers, contains other numbers (like 10km or 50x or 3500masl), or contains other references to numbers. When you find a discrepancy, simply change the value in column D to reflect the number of individuals seen for that sightings record. Use an "X" in column D (instead of an integer) if you don't know the count of individuals and if you just want to indicate that the bird was seen or heard.
- **c)** Change all occurrences of "casual" in column M to "p62". There was no "historical" protocol in eBird when BB2eBird was written, so the "casual" protocol was specified. However, "p62" in Column M indicates that these sightings should be entered as historical sightings.
- **d)** (Optional) While still in Excel, you can compare the locations in column F. You might find that you have different spellings for the same location. E.g., "Yosemite NP", "Yosemite National Park", and "Yosemite" on trips made on different dates. You can change one of them to be identical to all the others, so that identical locations are spelled the same. This step is not strictly necessary, but it reduces your effort later when your sightings have been uploaded to eBird.
- e) (Optional) If you know of any changes in taxonomy between the current eBird and your version of BirdBase, make your changes by editing Column A of the CSV file. For example, "Rock Pigeon" should be changed either to "Rock Pigeon (Feral Pigeon)" or to "Rock Pigeon (Wild type)". See the discussion in Step 6a below for the reasons why you might want to make this change before importing your sightings file into eBird. Making your species name edits BEFORE importing will save you lots of time making species fixes later in eBird AFTER uploading.
- **f)** Save the file from your spreadsheet program. The now-revised and newly-sorted CSV file is the file you will upload into eBird.