

2016 GBBC Summary

Each year we wonder if the bird watchers of the world can possibly top their past performances in the Great Backyard Bird Count. And each year we're amazed! The 2016 GBBC was epic. An estimated 163,763 bird watchers from more than 130 countries joined in. Participants submitted 162,052 bird checklists reporting 5,689 species--more than half the known bird species in the world and 599 more species than last year!

This was the 19th year for the event which is a joint project of the [Cornell Lab of Ornithology](#) and the [National Audubon Society](#) with partner [Bird Studies Canada](#). The information gathered by tens of thousands of volunteers helps track the health of bird populations on a global scale using the [eBird](#) online checklist program.

Before we hit some of the highlights of this year's count, let's crunch a few more numbers for our popular Top 10 lists. Note that some of the numbers may still change very slightly if checklists for the GBBC dates are added through eBird.

Top 10 most frequently reported species:

(number of GBBC checklists reporting this species)



Dark-eyed Junco by Vicki Miller, California, 2016 GBBC.

Species	Number of Checklists
Dark-eyed Junco	63,110
Northern Cardinal	62,323
Mourning Dove	49,630
Downy Woodpecker	47,393
Blue Jay	45,383
American Goldfinch	43,204
House Finch	41,667
Tufted Titmouse	38,130
Black-capped Chickadee	37,923
American Crow	37,277

Data totals as of March 2, 2016

Note: All Top 10 species are North American, reflecting high participation from this region.

Top 10 most numerous species:

(sum of how many individuals were observed across all GBBC checklists):

Species	Number of Individuals
Snow Goose	1,405,349
Canada Goose	1,166,166
European Starling	624,267
American Coot	515,017
Mallard	510,103
Dark-eyed Junco	487,772
Ring-billed Gull	447,635
Red-winged Blackbird	437,615
American Goldfinch	429,073
American Robin	375,760

Data as of March 2 2016

Note: These Top 10 species are North American, reflecting high participation from this region.

Top 10 states by checklists submitted

* New state checklist record

State	Number of Species	Number of Checklists
California	365	10,861*
Pennsylvania	137	8,705*
New York	166	7,460*
Florida	320	7,308*
Texas	354	7,020*
Virginia	177	5,938*
North Carolina	212	5,521*
Michigan	132	5,109*
Ohio	131	4,955
Georgia	208	4,295

Data as of March 2, 2016

Top 10 Canadian Provinces by checklists submitted

* New provincial checklist record

Province	Number of Species	Number of Checklists
Ontario	150	5,951
British Columbia	201	2,230
Quebec	114	1,854*
Alberta	86	1,045*
Manitoba	65	687
Nova Scotia	115	665*
New Brunswick	88	476*
Saskatchewan	59	388
Newfoundland & Labrador	72	205*
Prince Edward Island	56	88

Data as of March 2, 2016

Top 10 countries by checklists submitted

Country	Number of Species	Number of Checklists
United States	665	131,290
Canada	246	13,651
India	784	7,796
Australia	529	1,769
Mexico	702	1,200
Costa Rica	616	423
Taiwan	254	343
Colombia	758	322
New Zealand	147	317
Portugal	202	302

Data as of March 2, 2016

Rare and Wonderful

Rare and wonderful species always turn up in unexpected places during the GBBC—here are just a few examples.



Figure 1 Clay-colored Thrush by Roseanna Denton, submitted with checklist, 2016 GBBC.

Three lesser-known relatives of American Robins were reported to the GBBC this year from the United States. They are primarily found in Mexico and Central America, but have been making inroads in the Southwest. They include the **White-throated Thrush, Clay-colored Thrush, and Rufous-backed Robin**. These species may be moving northward because of a warming climate along with these other unusual species also recorded in the Southwest: **Northern Jacana, Black-capped Gnatcatcher, Streak-backed Oriole, Crimson-collared Grosbeak, and Blue Bunting**.

A fourth American Robin cousin, the **Redwing**, is a European species but two birds were seen in Canada—one in Nova Scotia and the other in British Columbia, only the second time the species has been reported there. The B.C. bird probably crossed the

North Pacific from Siberia, perhaps pushed along by a string of storms fueled by this year's strong El Niño phenomenon. The Nova Scotia bird more likely came from the opposite direction across the north Atlantic.

A pair of **Barnacle Geese** were tallied in Philadelphia for the first time during the GBBC. This species normally winters in Europe but as melting ice sheets give way to tundra and ponds, some birds benefit from expanded nesting habitat.

Other species of note internationally include a **Nordmann's Greenshank** in Taiwan, Panama's first-ever **White-faced Ibis** in Gamboa, and **Oriental Honey-buzzards** in Australia.

Birders Around the World



Photo by C.S. Saneesh, India, 2016 GBBC.

Bird watchers in India are turning into a powerful force and they flocked to the GBBC again this year in record numbers. It's been amazing to see the growth of the event in the country, thanks largely to our excellent partners at [Bird Count India](#). Just look at the checklist numbers since 2013, the first year the GBBC expanded internationally:

India	
Year	Checklists
2013:	467
2014:	3,358
2015:	6,810
2016:	7,796

India is third overall in checklists but top-of-the-heap when it comes to species reported with an astounding 784 species! Three other countries also topped 700 species including Colombia (758), Ecuador (752), and Mexico (702). By comparison, the United States tallied 665 species (fifth highest).

Weather can be a factor in participation and that's clear when you look at the checklist numbers for the United States and Canada from 2013 through 2016. Both countries had steadily increasing participation until the winter of 2015 hit hard. You might remember the bone-chilling cold and wicked winds, both of which kept participation numbers down that year. But everything was back on track for 2016, with both countries setting new checklist records since the count began in 1998: 131,466 in the United States and 13,651 in Canada.

Speaking of cold--a special shout-out to Brian Zadawski from Nunavut who submitted two checklists from Canada's northernmost and most frozen territory reporting the Common Raven. And kudos to Ontario which led all Canadian provinces with nearly 6,000 checklists submitted this year!



Eurasian Hoopoe by Rinchen Dorji, Bhutan, 2016 GBBC.

As the GBBC has grown since going global in 2013, so too has the number of countries and territories participating. If we compare 2013 participation with 2016, we find 30 new regions taking part, though another 10 have dropped off. Among the newcomers are a healthy contingent from Africa and the Middle East, including Botswana, Brunei, Chad, Democratic Republic of the Congo, Ethiopia, Iran, Jordan, Malawi, Morocco, the Palestinian Territory, Rwanda, Western Sahara, and Zambia. It's also great to see reports coming from Antarctica and Madagascar!

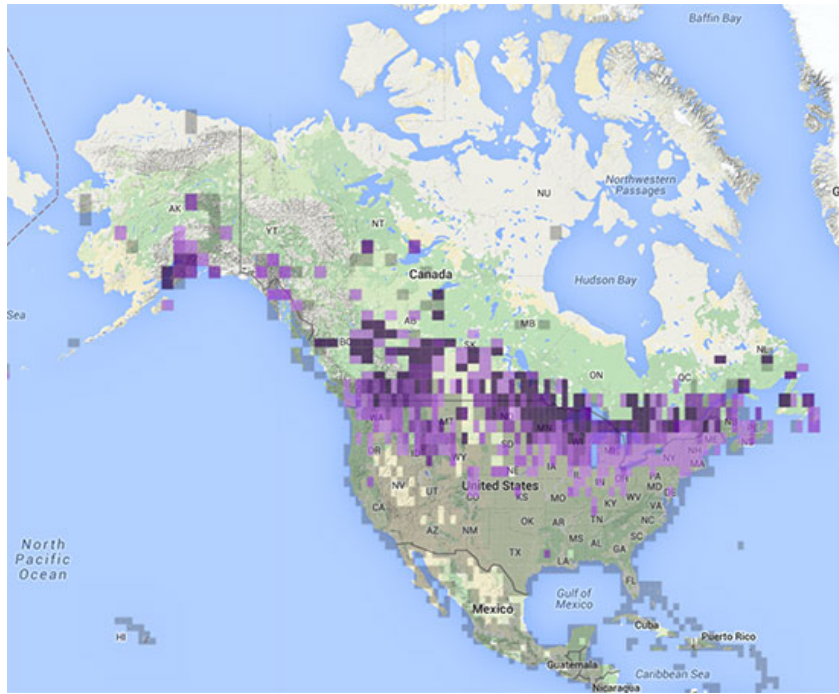
Bird Movements

Looking for patterns of movement among various species is a hallmark of the GBBC. This year, like last year, has been a fairly average one for the U.S. and Canada. Not many finches or owls moved far south of their northern winter ranges.

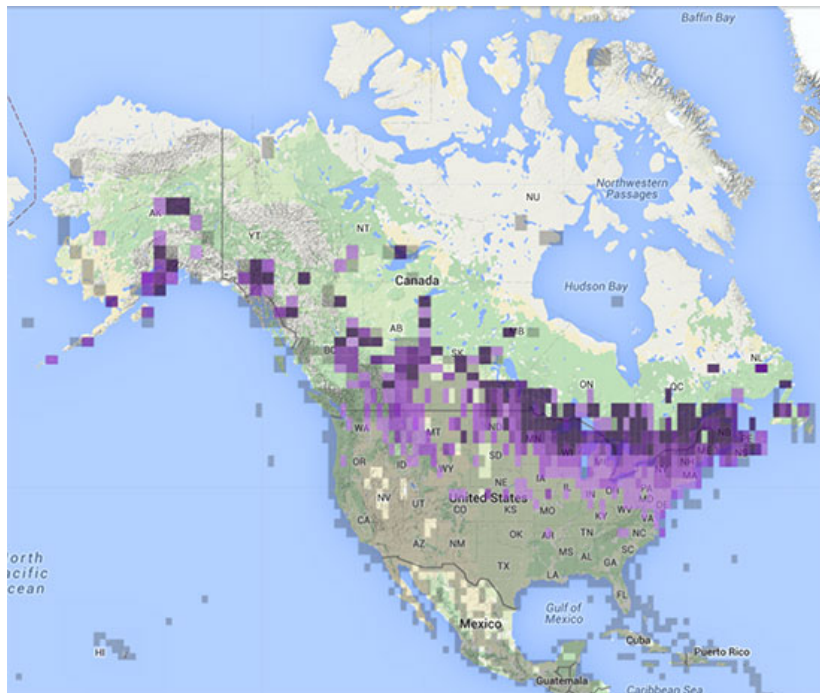
The **Common Redpoll** is a northern finch that specializes in birch and alder catkins, and really loves nyjer seed at bird feeders. In 2015 they did not come very far south, but were pretty common in the Northeast and Atlantic Canada. In 2016, the population seems to have shifted into the Northwest. To what extent this shift from 2015 to 2016 results from eastern birds moving west, as opposed to higher breeding success in the East and West respectively, is one of the questions that is still poorly understood with redpolls. Data from efforts like the GBBC help to paint a clearer picture.

Compare the two maps' intensity for southern Quebec, New Brunswick, and Maine (redpolls were common there in 2015) to British Columbia and Alberta (where redpolls are more prevalent in 2016).

2015 GBBC Common Redpoll Reports



2016 GBBC Common Redpoll Reports



Snowy Owl frequency maps look almost identical between the two years as well: compare the [2015](#) map to the map for [2016](#). For a species like Snowy Owl with such variability from year to year, such similarity between years is almost the exception rather than the rule.

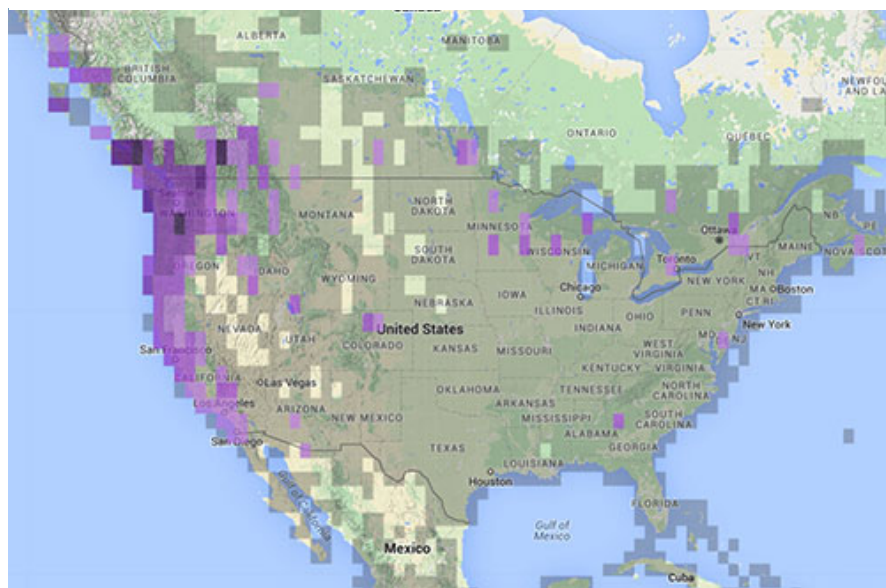


Varied Thrush by Herbert Fechter, 2016 GBBC checklist photo.

Although our irruptive species coverage usually focuses on finches and owls, some other species do show wildly variable patterns from year to year. **Varied Thrush**, a species of the Pacific Northwest that looks something like a belted American Robin, had a remarkable southward invasion last year, possibly in response to variability in acorn crops with the West Coast drought. In the two maps below, notice how the frequency in southern California—where a few Varied Thrushes can be found each year—went to dark purple in 2015 as Varied Thrushes went from an exciting rarity in SoCal to a fairly common bird that occurred in some places

in small flocks. This pattern extended up the coast to Juneau and Anchorage, Alaska, where they aren't being found this year but were around in numbers last year.

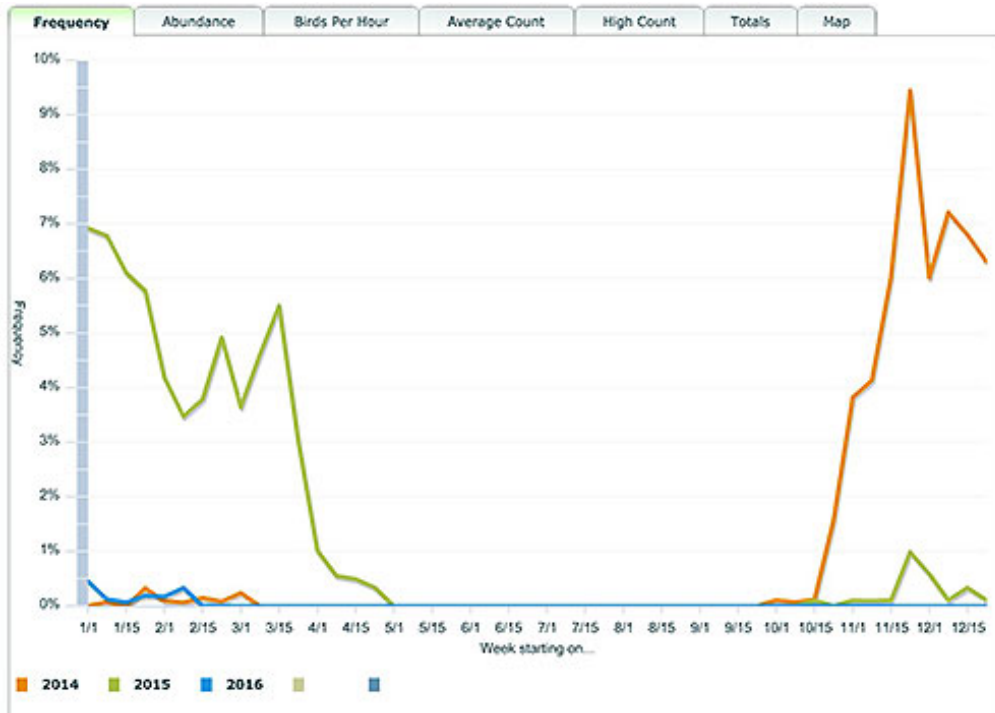
2016 Varied Thrush Reports



This is even more apparent the graph below. Compare the southern California frequency from February 2015 (about 4%) to the more normal occurrence pattern this year with Varied Thrushes found on 10 times fewer checklists. Like finches and certain other thrushes, including their American Robin cousins, Varied Thrushes move in response to local

food sources which must have crashed last year but seem to be in much better shape this year.

Varied Thrush frequency



More to Explore

There's plenty more to explore among the data from the 2016 GBBC and we invited you to look around using the [Explore a Region](#) tool and the Species Map tool. You can drill down to the county, state, and province levels and see the top participants as well.

And if you just like looking at pretty birds, you can't go wrong with our [online photo gallery](#). These photos are just a sampling of what was submitted for the contest—we've got thousands of images to review before revealing the top winners in our six categories just before the next GBBC.

Thanks to all of you who contributed checklists for the 2016 Great Backyard Bird Count, and to sponsor [Wild Birds Unlimited](#).



American Goldfinch by Jeff Drake, Alabama, 2016 GBBC.

Remember, you don't have to stop reporting your birds just because the GBBC is over. You can count year round using [eBird](#). Sign in with the same username and password you used for the GBBC. Keep a good thing going!

The next GBBC will be February 17-20, 2017!