

Beaverhill Bird Observatory Spring Report 2018

By Kevin Methuen

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Executive Summary

The Beaverhill Bird Observatory's spring migration monitoring was conducted by Head Biologist Kevin Methuen, along with Assistant Biologist Sara Pearce-Meijerink and Summer Students Emily Grose and Jeremy Lambe. Spring migration was monitored from May 1st to June 9th, with standardized banding and census conducted throughout these dates. BBO staff operated thirteen mist nets and recorded 607 captures of 44 species, achieving an overall capture rate of 23.4 birds per 100 net-hours. Staff, board members, dedicated volunteers, and 12 student interns completed many other monitoring programs, outreach, and conservation activities.

Migration Monitoring

Thirteen mist-nets (2, 2X, 8, 9, 9X, 50, 51, 52, 53, 54, 55, 56, and 57) were operated from May 1st to June 9th on days that were above zero degrees Celsius, relatively calm (wind below 20 km/h), and free of precipitation. A total of 2594 net hours were accumulated, due to relatively few 'weather' days during the monitoring period this spring. A total of 607 birds were captured, of which 443 were newly banded. Both of these numbers were the lowest since 2013, the year before new net lanes were established. Species diversity was also lower this spring with 44 species (Table 1).

	2003	2004	2005	2006	2007	2008	2009	2010
Total Captures	754	532	276	242	408	382	500	497
Birds Banded	546	424	196	169	318	288	351	333
Net hours (NH)	2219	1809	1570	1615	1813	1828	1608	2016
Capture Rate (birds/100 NH)	34.0	29.4	17.6	15.0	22.5	20.9	31.1	24.7
Species	44	38	32	31	44	38	39	38
	2011	2012	2013	2014	2015	2016	2017	2018
Total Captures	412	459	324	841	810	849	996	607
Birds Banded	241	307	211	561	641	663	802	443
Net hours (NH)	1884	1997	1884	2615	2859	3432	2031	2594
Capture Rate (birds/100 NH)	21.9	23.0	17.2	32.2	28.3	24.7	49.0	23.4
Species	40	39	36	43	45	54	51	44

Table 1. Numbers of captures, mist-netting effort, capture rates, and number of species caught during spring migration monitoring at the Beaverhill Bird Observatory since 2003.

The five most commonly captured species this spring were Clay-coloured Sparrow (144 captures, representing 23.7% of all captures), Least Flycatcher (117 captures, representing 19.3% of all captures), Yellow Warbler (50 birds caught, 8.2% of captures), House Wren (26 birds caught, 4.3% of captures), and Swainson's Thrush (24 birds caught, 4% of captures). These top five species made up 59.5% of the total number of birds caught. See Table 2 below for full banding results.

Table 2. Total number and type of capture per species during 2018 spring migration monitoring at Beaverhill Bird Observatory (BBO). Repeat captures were banded in 2018 at BBO, Return captures were banded at BBO in a previous year, Foreign captures were banded at a location other than BBO, and other captures were caught in a mist net but released un-banded.

Species	Banded	Repeat	Return	Foreign	Other	Total
Alder Flycatcher	3					3
American Goldfinch	4	2				6
American Redstart	3					3
American Robin	6	2	2		1	11
American Tree Sparrow	1					1
Baltimore Oriole	9	11				20
Black-capped Chickadee	1	11	2			14
Blackpoll Warbler	1					1
Brown-headed Cowbird	6	2	2			10
Canada Warbler	1					1
Cedar Waxwing	1					1
Chipping Sparrow	12					12
Clay-coloured Sparrow	110	29	2		3	144
Common Yellowthroat	3				1	4
Slate-coloured Junco	14	1				15
Downy Woodpecker	1					1
Gadwall					1	1
Gray Catbird	4					4
Gray-cheeked Thrush	4					4
Hairy Woodpecker	1					1
Hermit Thrush	3					3
House Wren	18	5	1		2	26
Least Flycatcher	75	19	13		10	117
Lincoln's Sparrow	17				2	19
Magnolia Warbler	3					3
Mourning Warbler	12				1	13
Myrtle Warbler	14					14
Orange-crowned Warbler	10				1	11
Ovenbird	1					1

Red-eyed Vireo	1					1
Rose-breasted Grosbeak			1			1
Ruby-crowned Kinglet	1					1
Savannah Sparrow	4					4
Song Sparrow	10	1				11
Swainson's Thrush	22				2	24
Tennessee Warbler	1					1
Trail's Flycatcher	20	1				21
Tree Swallow	2		1			3
Warbling Vireo	3	2	2			7
White-crowned Sparrow	2					2
White-throated Sparrow	14					14
Yellow Warbler	22	13	12		3	50
Yellow-bellied Flycatcher	2					2
Yellow-bellied Sapsucker	1					1
Totals	443	99	38	0	27	607

May 20th to 26th was our busiest week of spring migration, with 205 captures and the highlight being a Canada Warbler! Our single busiest day of banding occurred on May 31st when we caught 60 birds of 16 species, including three gorgeous Magnolia Warblers. Other notable captures this spring included 20 Baltimore Orioles, 13 Mourning Warblers, and one Gadwall duck!

Staff surveyed birds along a standardized census route each day between May 1st and June 9th. Census results are combined with other incidental observations and daily banding totals to produce a Daily Estimated Total (DET) of the number, and type of species migrating through the Beaverhill Natural Area. There were many memorable sightings on census this spring. One day staff observed large flocks of Sandhill Cranes and Snow Geese numbering in the 400's each, flying right over the lab building. Many raptor species were also present on census with Peregrine Falcon, Merlin, and Sharp-shinned Hawk recorded as highlights. Outside of census, large flocks of White-faced Ibises were popular with visitors and observed on Kallal Marsh, Beaverhill Lake, Lister Lake, and nearby flooded fields.



Figure 1. Blackpoll Warbler.

Other Activities

A huge thanks to Helen Trefry, Geoff Holroyd, Laurie Hunt and 5th St. Albert Venturer Scouts who spent a full day building six bat maternity roosts which will replace the smaller bat boxes which were put up last year that are used by solitary males. The smaller bat boxes will go to some of our Young Ornithologists later in the summer.



Figure 2. Bat box building bee at the Trefry farm in May 2018.

Student Interns

The BBO is very fortunate to have had 12 student interns this year!! Each group of interns has a mentor, who volunteers their time to ensure their project is successful. BBO board member Laurie Hunt organizes the BBO internship program, which is funded by SCiP (Serving Community internship Program). In early May, Laurie arranged an intern orientation at the lab, which allowed everyone to meet their mentors and get familiarized with their projects.

This year's Tree Swallows interns were Kerra Nisbet, Larissa Clayton, Maggie Chen, Krystal Hartog, and Bianca Unrau, mentored by Kevin Methuen; Breeding Bird Grid interns Erin Wood and Nicholas Helliker were mentored by Geoff Holroyd; House Wren interns Melissa Ghadially and Christine Duke were mentored by Sara Pearce Meijerink; Bat Box interns Veronique Caron and Jenna Hlewka were mentored by Erin Low and Lynne Burns; and Butterfly intern Shyla Golly was mentored by Steve Andersen.



Figure 3. Intern orientation day at BBO. (photo by Geoff Holroyd)

Great Canadian Birdathon

The BBO staff and volunteers had an epic birdathon this year! 121 species were identified in a 24 hour period, starting with banding followed by birding at Amisk Creek, Tofield Llama pond, and Elk Island. Highlights included Common Loon, 15 species of duck, Blackbellied and American Golden Plovers, Dunlin, and a Broad-winged Hawk. We raised \$825, thank you to all who donated and participated! Amelie Roberto-Charron also led a birdathon team for BBO, raising over \$5300! Geoff and Helen also completed a birdathon to support BBO, identifying 111 species (between the two of them!) and raising over \$1500!

Big Birding Breakfast

The Big Birding Breakfast was another fun event with great weather and enthusiastic kids! We had 58 guests with 23 children on June 2nd and 3rd, making for an unforgettable

fundraiser. Ricki (Saw-whet Owl) and Zeus (Peregrine Falcon) entertained guests between net checks. As always, the Big Birding Breakfast would not be possible without amazing volunteers, who are all recognized at the end of this report.



Education and Outreach

The BBO education team, led by Sara Pearce Meijerink, completed 17 off-site presentations in May. These presentations were the last in this year's education program, which ran from October 3rd 2017 until May 31st 2018. Overall, 178 presentations were given to audiences ranging from pre-kindergarten to seniors. Approximately 6920 students and 1200 adults were reached across Alberta! Presentation topics focused on climate change, owls of Alberta, and the main threats facing birds. Sara also attended a science fair at Queen Elizabeth School in May, reaching approximately 1000 students. Kevin, Amelie, Helen, Geoff and Sara attended three career fairs at three high schools in June.

Staff completed many other outreach activities this spring, all of which included Rickie our educational Saw-whet Owl! Kevin and Amelie represented BBO for an open house at the Wildbird General Store on May 5th, and Emily and Jeremy interacted with around 500

visitors at Big Lake for a nature event on May 19th. Kevin, Amelie and Helen conducted a banding demo and nature walk for Nature Conservancy volunteers on May 24th, and BBO hosted a Migratory Bird Day celebration with Nature Alberta at the banding lab for around 30 people. Other groups visited the lab for banding, including Scouts Canada and Ryley School. Helen Trefry produced a spring edition of our newsletter, the Willet!

Acknowledgements

Volunteers make BBO a special place to work, and are essential to our success.

For the Big Birding Breakfast, thank you to Helen Trefry who was the primary organizer of the event; Janos Kovacs and Claude Roberto with daughters Ariane and Amelie for ensuring everyone had great crepes and coffee. Joyce DeGroot for cooking bacon and Al DeGroot for delivering it. Helen Trefry, Thea Carpenter and Andra Bismanis for donating muffins and other food. Geoff Holroyd and Andra for leading Nature walks; Geoff for cutting the grass along the trails prior to the event. Kevin, Sara, Jeremy and Emily for setting up and cleaning up, operating the crafts table, and entertaining visitors while banding.



For supporting our day-to-day operations, thank you Al and Geoff for setting up solar panels and batteries; Geoff for setting up rain barrels and bringing water, filling and delivering propane, and cutting grass on all of our large trails with his riding mower; Helen Trefry for producing the Willet; Darren Macgregor for maintaining our website; Rose Scott for managing BBO's finances; Irene Crosland for being an awesome field mom to BBO staff; and Amelie Roberto-Charron for assisting with presentations and field work.

Thank you to Greg Ottway for coordinating a donation of four picnic tables through Alberta Parks.

Thank you to all other BBO volunteers, board members, and interns who visited and helped with banding, maintenance, and other activities. You make our work possible!

Thank you to **Steve and Kay** from the **Wildbird General Store** for providing us monthly in-kind support in the form of birdseed and suet. We feel humbled by your generosity!

The **Tofield Library** is the BBO afternoon office complete with couches to write reports, and the ability to scan and print. Thank you Connie, Diane, and Susan for your weekly support.

Finally, the BBO has to extend a massive thank you to our funders. Our 2018 spring operations were made possible by financial support from the Alberta Conservation Association, Alberta Liquor and Gaming Commission, TD Friends of the Environment, the Community Environment Action Grant Program, Serving Communities Internship Program (SCiP) Nature Canada's Labatiuk Fund, Bird Studies Canada's Baillie Fund, The Wildbird General Store, and personal donations.