McGill Bird Observatory
Annual Program Report 2011

Prepared by Marcel A. Gahbauer

December 2011

MIGRATION
RESEARCH FOUNDATION

Cover photo:
Common Redpoll perched near the winter nets in March 2011 during a record influx by the species (photo by Simon Duval)

Suggested citation for this report:
Gahbauer, M.A. 2011. McGill Bird Observatory Annual Program Report 2011. Migration Research Foundation, Ste-Anne-de-Bellevue QC. 71 pp.

Table of Contents

1. Executive Summary

McGill Bird Observatory (MBO) is a project of the Migration Research Foundation (MRF), focused on monitoring bird populations throughout the year at McGill University's Stoneycroft Wildlife Area, in Ste-Anne-de-Bellevue, Quebec. The primary research objective is to collect data that can be used to contribute to the understanding of bird movements and population trends, in collaboration with the Canadian Migration Monitoring Network (CMMN). MBO also pursues a variety of other research projects and delivers educational programs, ranging from training in field techniques to public presentations and development of identification resources.

This report summarizes all MBO activities for the 2011 project cycle, which spans from November 2010 through October 2011. It supplants the spring and fall seasonal reports published separately in previous years, and it also incorporates summaries of the winter and summer programs, as well as an overview of other MBO efforts throughout the year.

The winter program (31 October 2010 – 27 March 2011) overcame a snowy mid-season period, ending up with record high counts of 449 individuals and 19 species banded, including MBO's first Hoary Redpoll. The high total was largely due to record numbers of Slate-colored Junco (150), House Finch (61), and Common Redpoll (53). An above-average 52 species were observed over the course of the season, including the first winter sightings of Gadwall, Eastern Screech-Owl, Great Horned Owl, Red-bellied Woodpecker, and Evening Grosbeak.

The Spring Migration Monitoring Program (28 March – 5 June) was also a great success, with a record 906 birds of 64 species banded, and 140 species observed, which matched the six-year average. The banding numbers were boosted by a strong movement of warblers, with Yellow-rumped Warbler the most frequently banded bird this spring, joined by four others in the top ten. However, there were fewer returns than ever before in spring, raising questions about the survivorship of resident birds.

The summer program (6 June – 31 July) was for a third year operated as part of the international MAPS (Monitoring Avian Productivity and Survivorship) network. The 111 birds banded of 21 species were fewer than in either previous year. Black-and-white Warbler was a new species this summer, but formerly regular breeders Veery and Rose-breasted Grosbeak were scarce this year. However, among the 9 returns this summer was a six-year-old Veery banded at MBO as a juvenile in August 2005. An above-average 60 species were observed, including first summer records of Belted Kingfisher, Eastern Bluebird, and Slate-colored Junco.

The Fall Migration Monitoring Program (1 August – 30 October) continued the trend of subpar banding results, with a record low of 2789 birds banded, although the 77 species banded was above average. Warbler migration was strong, with record numbers banded of 8 species, but almost all sparrows were much scarcer than usual. Magnolia Warbler was the most frequently banded species of the season, with five other warblers in the top ten. While banding results were poor, the total of 146 species observed during the season was well above average, and a single-day record of 62 species was counted on September 18. Tundra Swan and Common Goldeneye were observed for the first time, increasing the site checklist to 204 species.

The Northern Saw-whet Owl Monitoring Program (26 September – 12 November) had full coverage for a second consecutive year, and yielded a record of 199 individuals banded, plus 9 foreign recoveries. Nearly 90% of captures were between October 4 and 27, including a record 32 on the night of October 22. The percentage of hatch-year owls was down to 48% this year, compared to 70% in 2010.

2. Introduction

McGill Bird Observatory (MBO) was founded in 2004 by graduate students in McGill University's Natural Resource Sciences department. It is operated by the Migration Research Foundation (MRF), and is a member of the Canadian Migration Monitoring Network (CMMN). Located at 45.43°N, 73.94°W, near the western tip of the island of Montreal, MBO is the only active migration monitoring station in southwestern Quebec. The nearest other sites are Innis Point Bird Observatory in Ottawa (175 km to the west), Prince Edward Point Bird Observatory in Quinte (300 km to the southwest), and l'Observatoire d'Oiseaux de Tadoussac (450 km to the northeast). Operations at MBO are patterned after those at other Canadian bird observatories, with a particular emphasis on standardized research protocols. In addition to collecting and analyzing valuable scientific data, MBO serves as a training facility for students and other individuals interested in developing practical skills in field ornithology.

This report summarizes all research activities at MBO during the 2011 project cycle, which began with the winter 2010-2011 season and concluded with the 2011 fall season. The Spring and Fall Migration Monitoring Programs are the most standardized and intensive surveys conducted at MBO, and are summarized in greatest detail in this report. The Migration Monitoring Programs follow a consistent protocol, most recently updated in 2011, but largely unchanged since 2005 (Gahbauer et al. 2011). Annual summaries of the winter and summer programs were in previous years published only on the MBO website, but in recognition of the growing value of these programs, they are now also included in this annual report. The Northern Saw-whet Owl monitoring project in fall is also described as a stand-alone project.

A view across the southern part of Stoneycroft Pond from MAPS net 9 near the census trail, with the conifer grove containing the owl nets at the background on the left. (Photo by Marcel Gahbauer)

3. Winter population monitoring program

The winter season at MBO spans the 21-week period from October 31 through March 27. Although relatively few species overwinter regularly at MBO, several of them are uncommon to absent in other seasons, and therefore winter provides the best opportunity to monitor them. Additionally, observations in early and late winter provide an opportunity to document lingering late fall migrants or early spring arrivals. Except at the beginning and end of the season, winter visits rarely occur more than twice per week, and scheduling of activities is much more weather-dependent than at other times of year. Banding effort is focused on a square of four nets surrounding a set of feeders, and is usually limited to three hours at a time.

3.1 Effort

Observations were recorded on 37 (25%) of the 148 days during the winter season, matching the mean rate of coverage in previous years. Visits were most frequent in November and January, whereas observations were recorded on just one day in December, largely due to the volume of work required to process the record volume of data generated during the 2010 Fall Migration Monitoring Program. Banding took place on 7 days during the first month of winter, and then was suspended for much of the core of winter due to extended periods of cold weather and deep snow, with only 3 more sessions later in the season; the total of 10 days banding also matched the mean from previous winters.

Table 3-1. Effort during the 2010-2011 winter population monitoring program, by month.

	Oct 31 – Nov 30	Dec 1 – 31	Jan 1-31	Feb 1-28	Mar 1-27	TOTAL
# days observing	10	1	12	6	8	37
# days banding	7	0	0	1	2	10

3.2 Site conditions

Temperatures throughout winter were on average close to normal, although there were some prolonged cold periods, and the coldest day of winter on 24 January matched the lowest temperature recorded since MBO began operation. It was an unusually snowy winter, with snow falling on 80% of days from December through February, and more snowfall than any other winter at MBO except 2007-2008, when 333 cm was recorded. There was also a record amount of rainfall in both November and December, which contributed to the ponds freezing at unusually high levels.

Table 3-2. Weather conditions during the 2010-2011 winter population monitoring program, by month.

	Oct 31 - Nov 30	Dec 1 – 31	Jan 1-31	Feb 1-28	Mar 1-27	TOTAL
Mean daily high (^{o}C)	6.3	-2.7	-6.1	-3.2	1.9	-0.6
Mean daily low (^{o}C)	-1.5	-9.0	-12.8	-11.9	-6.8	-8.4
Mean daily temp (^{o}C)	2.4	-5.8	-9.5	-7.6	-2.4	-4.6
Highest temp (^{o}C)	14 (Nov 23)	13 (Dec 1)	8 (Jan 2)	10 (Feb 18)	11 (Mar 18)	14 (Nov 23)
Lowest temp (^{o}C)	-9 (Nov 25)	-19 (Dec 10)	-28 (Jan 24)	-18 (Feb 22)	-20 (Mar 3)	-28 (Jan 24)
# days with rainfall	16	5	2	4	10	37
Total rain (mm)	93	52	4	12	83	244
# days with snowfall	7	25	24	23	15	94
Total snow (cm)	4	71	33	76	43	227
Mean snow depth (cm)	0	7.5	5.6	19.1	8.2	8.1
Max. snow depth (cm)	n/a	13 (Dec 8)	9 (Jan 26)	32 (Feb 14)	29 (Mar 10)	32 (Feb 14)

3.3 Results

The 449 birds banded was a significantly higher total than in any previous winter, and the old record of 317 was already broken before the end of November. The 19 species banded during the season was also a new record, although just by one. These totals were achieved despite a

below-average number of net hours for winter, and therefore the rate of birds banded was also far higher than in any previous winter. The number of species observed during the season was also above average, although below the record of 58 in 2009-2010.

Table 3-3. Summary results of the 2010-2011 winter population monitoring program, by month.

	Oct 31 - Nov 30	Dec 1 – 31	Jan 1-31	Feb 1-28	Mar 1-27	TOTAL
Birds (species) banded	378 (18)	n/a	n/a	4 (2)	67 (8)	449 (19)
Birds (species) repeat	68 (8)	n/a	n/a	0 (0)	8 (1)	76 (8)
Birds (species) return	11 (4)	n/a	n/a	3 (1)	21 (2)	35 (4)
# species observed	40	14	26	27	30	52
# net hours	109.0	--	--	1.0	22.0	132.0
Birds banded / 100 hrs	346.8	n/a	n/a	400.0	304.5	340.2

3.3.1 Birds banded

By far the most frequently banded species this winter was Slate-colored Junco, accounting for 33% of the season's total. This marked the first time that Slate-colored Junco took top place for winter, and largely reflects a prolonged fall migration extending well into November. American Goldfinch was the top species in every previous winter except 2008-09, when efforts were very limited; this winter it came in second. House Finches were also banded in record numbers (all in November) as were Common Redpolls (all but one in February/March).

Table 3-4. Top 11 species banded at MBO during the 2010-2011 winter population monitoring program, with comparison to the numbers banded in previous winters (rank in other years in parentheses). Dashes represent species not banded during a particular winter season.

	2010-11	2009-10	2008-09	2006-07	2005-06	2004-05
1. Slate-colored Junco	150	48 (3)	--	20 (3)	54 (2)	20 (4)
2. American Goldfinch	93	79 (1)	2 (4)	21 (1)	111 (1)	113 (1)
3. House Finch	61	31 (5)	--	21 (1)	5 (9)	58 (2)
4. Common Redpoll	53	--	21 (1)	--	41 (4)	1 (11)
5. Black-capped Chickadee	33	54 (2)	3 (2)	17 (4)	51 (3)	26 (4)
6. American Tree Sparrow	25	35 (4)	2 (4)	7 (5)	11 (5)	9 (5)
7. White-throated Sparrow	12	5 (9)	--	--	2 (11)	--
8. Fox Sparrow	6	7 (8)	--	--	1 (13)	--
9. Northern Cardinal	5	4 (11)	1 (6)	2 (8)	4 (10)	7 (6)
10. Mourning Dove	2	17 (6)	--	6 (6)	11 (5)	2 (10)
10. Downy Woodpecker	2	1 (13)	--	--	2 (11)	1 (11)

3.3.2 Birds recaptured

There were unusually few repeats this winter, with only 17% of the 449 birds banded recaptured at least once, compared to a mean of 45% over all previous winters. This may largely reflect the large number of late migrants still moving through in November this winter, and the relatively few banding opportunities later in the season. Black-capped Chickadees accounted for just under half of all repeats this winter, although that is below their overall rate of 64% across all winters at MBO. Nearly one in six of the juncos banded in November were caught again later that month, accounting for 30% of this winter's repeats. None of the other six species recorded as repeats accounted for more than 5% of this winter's total.

The number of returns this winter (35) was a record high, largely due to the 23 Black-capped Chickadees recaptured during the three banding sessions in February and March. Many of these individuals became classified as returns simply due to the nearly three-month mid-winter gap in banding; had weather permitted banding during that period, several of these individuals would have likely been recaptured more frequently, and would have remained categorized as

repeats. Omitting these chickadees, there were 12 other returns this winter, still just above the long-term mean of 11. Only 4 species were recorded as returns, matching the long-term mean. Other than Black-capped Chickadee, this winter's returns were Slate-colored Juncos and American Goldfinches (ranked second and third, respectively, for total returns during winter), and Blue Jay (the first time one has been recorded as a return during winter).

Table 3-5. List of returns captured during winter 2010-11, sorted by time elapsed.

Band number	Species	Age/sex in 2011	Age/sex at banding	Banding date	Previous capture	2010-11 return	Time elapsed		
1232-58596	BLJA	AHY-U	AHY-U	10 Aug 08	26 Apr 09	11 Nov	1 year	6 months	15 days
2600-15915	BCCH	ASY-U	SY-U	27 Mar 10	27 Mar 10	13 Mar		11 months	16 days
2600-16500	AMGO	AHY-M	HY-M	18 Nov 09	18 Nov 09	1 Nov		11 months	13 days
2600-15375	BCCH	AHY-U	ASY-U	21 Jan 10	21 Jan 10	25 Nov		10 months	4 days
2600-15378	BCCH	AHY-U	AHY-U	21 Jan 10	21 Jan 10	25 Nov		10 months	4 days
2600-15688	SCJU	AHY-M	HY-M	15 Nov 09	9 Mar 10	1 Nov		8 months	22 days
2600-15371	BCCH	AHY-U	HY-U	29 Nov 09	11 Feb 10	1 Nov		8 months	20 days
2600-15911	BCCH	AHY-U	SY-U	27 Mar 10	27 Mar 10	3 Nov		7 months	6 days
2560-25122	BCCH	ASY-U	HY-U	23 Jul 09	30 Jul 10	1 Mar		7 months	1 day
2600-15934	BCCH	SY-U	HY-U	13 Aug 10	13 Aug 10	1 Mar		6 months	18 days
2600-15944	BCCH	SY-U	HY-U	25 Aug 10	25 Aug 10	1 Mar		6 months	6 days
2490-24907	BCCH	AHY-U	HY-U	16 Aug 07	1 May 10	6 Nov		6 months	5 days
2600-15921	BCCH	SY-U	HY-U	1 Aug 10	6 Sep 10	1 Mar		5 months	25 days
2600-15370	BCCH	AHY-U	HY-U	29 Nov 09	15 May 10	8 Nov		5 months	23 days
2600-16479	AMGO	AHY-F	HY-F	18 Nov 09	10 May 10	1 Nov		5 months	21 days
2600-15961	BCCH	SY-U	HY-U	17 Sep 10	23 Sep 10	13 Mar		5 months	20 days
2600-15875	AMGO	AHY-F	ASY-F	20 May 10	20 May 10	8 Nov		5 months	18 days
2600-15926	BCCH	SY-U	HY-U	2 Aug 10	17 Sep 10	1 Mar		5 months	14 days
2600-15963	BCCH	SY-U	HY-U	19 Sep 10	19 Sep 10	1 Mar		5 months	12 days
1600-15925	BCCH	SY-U	HY-U	2 Aug 10	23 Sep 10	1 Mar		5 months	8 days
2600-15936	BCCH	SY-U	HY-U	13 Aug 10	22 Oct 10	13 Mar		4 months	21 days
2600-15943	BCCH	AHY-U	HY-U	23 Aug 10	29 Oct 10	13 Mar		4 months	14 days
2560-25135	BCCH	ASY-U	HY-U	18 Aug 09	1 Nov 10	13 Mar		4 months	12 days
2650-25466	BCCH	SY-U	HY-U	8 Nov 10	8 Nov 10	13 Mar		4 months	5 days
2650-25471	BCCH	SY-U	HY-U	8 Nov 10	8 Nov 10	13 Mar		4 months	5 days
2600-15941	BCCH	SY-U	HY-U	20 Aug 10	30 Oct 10	1 Mar		4 months	1 day
2600-15911	BCCH	ASY-U	SY-U	27 Mar 10	3 Nov 10	1 Mar		3 months	28 days
2600-15948	BCCH	SY-U	HY-U	9 Sep 10	8 Nov 10	1 Mar		3 months	23 days
2600-15378	BCCH	ASY-U	AHY-U	21 Jan 10	25 Nov 10	13 Mar		3 months	18 days
2650-25480	BCCH	SY-U	HY-U	16 Nov 10	25 Nov 10	13 Mar		3 months	18 days
2650-25484	BCCH	AHY-U	AHY-U	25 Nov 10	25 Nov 10	13 Mar		3 months	18 days
2650-25473	BCCH	SY-U	HY-U	11 Nov 10	16 Nov 10	1 Mar		3 months	15 days
2650-25474	BCCH	SY-U	HY-U	11 Nov 10	16 Nov 10	1 Mar		3 months	15 days
2650-25481	BCCH	SY-U	HY-U	16 Nov 10	25 Nov 10	1 Mar		3 months	6 days
2650-25743	SCJU	SY-F	HY-F	25 Nov 10	25 Nov 10	1 Mar		3 months	6 days

3.3.3 Daily estimated totals (DET)

The number of species observed daily ranged from a low of 5 on 3 January to a high of 27 on 6 November. Over the course of the season, 52 species were observed, above the winter mean of 47 species, but below the record of 58 recorded in the winter of 2009-2010. Five species were observed for the first time in winter (Gadwall, Eastern Screech-Owl, Great Horned Owl, Red-bellied Woodpecker, and Evening Grosbeak), bringing the cumulative winter total to 83. Several species were unusually abundant at times this winter. Record high mean counts of Canada Goose (525), Slate-colored Junco (36), and House Finch (31) were recorded during the first month. Later in winter, the mean daily counts of Common Redpolls (64 in February, 61 in March) were roughly double the previous highs during those periods yet, despite their abundance earlier in winter, only a single House Finch was observed during 14 visits over the final two months of the season.

4. Spring Migration Monitoring Program (SMMP)

The Spring Migration Monitoring Program has been operated at MBO annually since 2005. It covers the 10-week period from March 28 through June 5. Since 2007, the protocol has been to focus banding on a 45-day window from April 18 through June 1, recognizing that during the first three weeks of the season it is often too cold to permit for consistent effort, and that by the last four days of the season migrants are becoming scarce relative to local breeders; these periods are instead covered through census and supplementary observations.

4.1 Effort

Census was conducted on all 70 days of the season, while banding took place on 38 (84%) of the 45 scheduled days. Banding was cancelled on the other 7 days due to rain, including 4 consecutive days May 14-17. This was the first time during either spring or fall migration monitoring at MBO that more than three days in a row were lost to weather. On 11 additional days, rain and/or strong winds resulted in reduced net hours, leaving only 27 days (60%) of full operation according to the site protocol. This was the lowest level of coverage since 2007, and the total of 2446 net hours was the lowest of any full spring season (2006-2011).

Except for 6 Tree Swallows taken from nest boxes, all captures this spring were through the standard set of 16 mist nets used for migration monitoring, arranged as in previous years (net locations A1, A2, B2, N1, N3, B3, C1, C2, D1, D2, D3, D4, E1, E2, H1, and H2; see Gahbauer and Hudson 2008 for a map). Due to flooding of the back ponds, H2 was not available for the first 13 days of the season. All nets were 12 m long with 30 mm mesh, from Spidertech.

4.2 Site conditions

Weather can have a significant influence on migration, especially in spring. Following an unusually snowy winter, the first week of spring was colder than usual. The next two weeks were closer to normal, but then a persistent cold front resulted in the coldest week 4 in MBO's history, and the total of 10 cm of snow over the first month was more than in any previous spring. This was offset by an unusually warm week 5, during which several migrants arrived earlier than usual, but then week 6 was back to being below normal. For the remainder of spring, temperatures were relatively seasonal, although there was a noticeable jump to summer-like conditions during the final week.

Even more than the fluctuations in temperature, this spring was noteworthy for the amount of rain that fell, with the total of 274 mm only slightly behind the record of 294 in spring 2006, and roughly 40% above the spring mean. Four consecutive days with rain in mid-May (spanning weeks 7 and 8) were just before the typical peak of spring migration, and the inability to band during that period likely had an impact on the season totals.

Table 4-1. Weather conditions during the 2011 Spring Migration Monitoring Program, by week.

	1	2	3	4	5	6	7	8	9	10	SEASON
Mean daily high (^{o}C)	7.3	10.7	10.8	9.5	17.2	13.7	18.2	18.9	19.8	23.9	15.0
Mean daily low (^{o}C)	-1.8	-0.5	1.4	0.9	5.9	6.6	7.9	10.3	11.7	12.9	5.5
Mean daily temp (^{o}C)	2.8	5.1	6.1	5.2	11.6	10.2	13.0	14.6	15.8	18.4	10.3
Highest temp (^{o}C)	11	16	24	14	24	19	25	24	24	29	29
Lowest temp (^{o}C)	-6	-4	-4	-2	3	5	6	6	10	8	-6
# days with rainfall	2	3	5	3	4	5	3	7	6	1	39
Total rain (mm)	1	20	56	25	27	40	43	27	36	-	274
# days with snowfall	3	2	2	3	-	-	-	-	-	-	10
Total snow (cm)	1	2	1	3	-	-	-	-	-	-	6

4.3 Results and discussion

4.3.1 Birds banded

Despite the reduction of net hours due to poor weather, a record 906 birds were banded during SMMP 2011, and the 64 species involved were slightly above the six-year mean for spring. The busiest day of the season was 22 May, with 102 birds banded (Figure 4-1), a new single-day record for spring. On five other days, the count of birds banded exceeded 40; except for May 13, all of these days came within the week following the peak day and constituted the lone distinct peak of migration this spring. For SMMP 2011 the mean count of birds banded per day was 20.1 (or 23.8 during the 38 days with nets open).

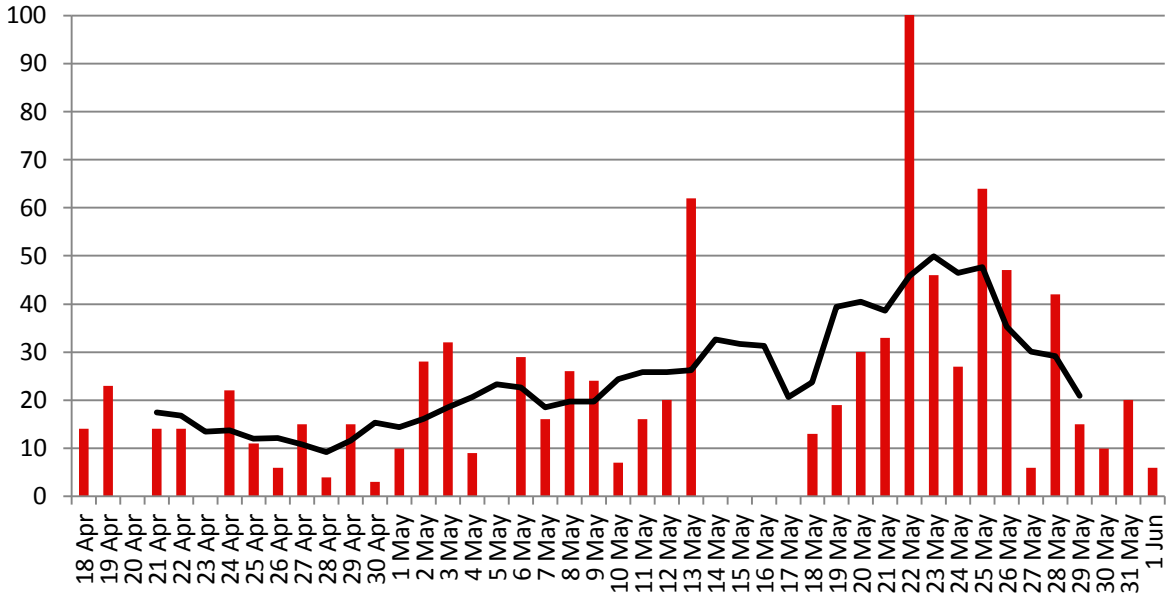

Figure 4-1. Number of individuals banded per day during the 2011 Spring Migration Monitoring Program, with a running 7-day average in black.

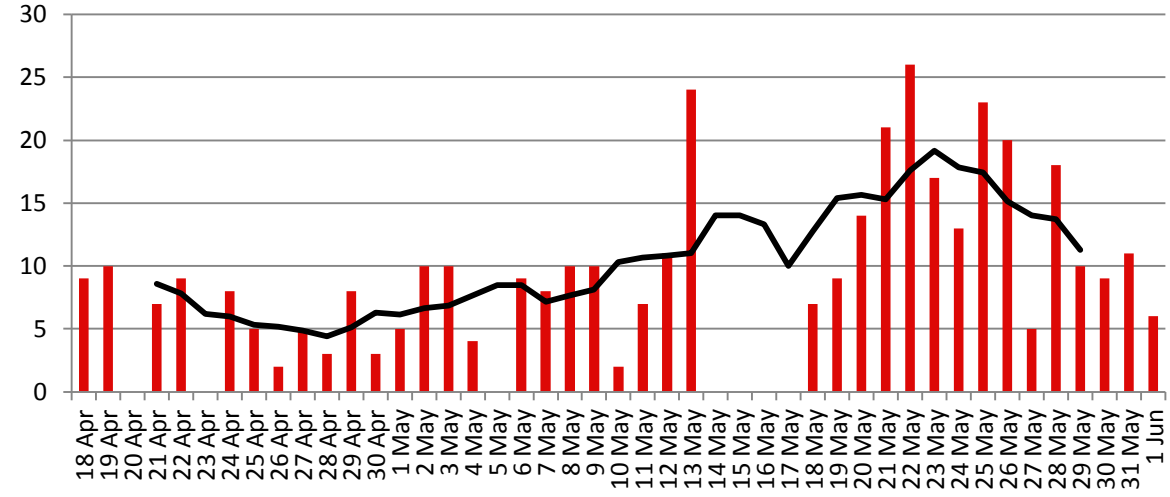

Figure 4-2. Number of species banded per day during the 2011 Spring Migration Monitoring Program, with a running 7-day average in black.

Species richness among banded bird peaked during the fourth week of May, showing a very similar pattern to the number of birds banded (Figure 4-2). The greatest variety banded in a single day was 26 species on May 22, a record high for spring. The mean number of species banded per day was 10.2, higher than in all previous years.

No new species were banded at MBO this spring. There were also no species this spring recorded only by virtue of being banded. Twelve species were banded just once this spring: Sharp-shinned Hawk, Black-billed Cuckoo, Pileated Woodpecker, Eastern Phoebe, Brown Creeper, Ovenbird, Black-throated Blue Warbler, Bay-breasted Warbler, Cape May Warbler, Palm Warbler, Black-throated Green Warbler, and Rose-breasted Grosbeak.

At the other extreme, Table 4-2 lists the 10 most frequently banded species, which account for 58.3% of all birds banded during SMMP 2011. Four of these (Ruby-crowned Kinglet, Yellow Warbler, Yellow-rumped Warbler, and Red-winged Blackbird) have been in the top 10 for spring annually since 2005. One other, American Goldfinch, had appeared in the top 10 in all previous years, but was slightly less prominent this year (15th place, with 17 individuals banded).

Yellow-rumped Warbler was the top species this year, marking the first time it has been so dominant in spring, and perhaps not surprisingly, given the record-shattering numbers recorded last fall. Tennessee Warbler was in second place, reminiscent of the strong migration in spring 2009. Red-winged Blackbird rounded out the top three, and is the only species that has ranked at least this high every spring. Of the remaining species in the top ten, two appear on the list for only the second time in 7 years: American Robin and Slate-colored Junco. The number of American Robins banded this spring was a record, as was the case for Common Yellowthroat. Warblers of 21 species were banded this spring, comprising 44% of all birds banded, similar to the 45% in spring 2009, but much higher than 24% in 2010.

Table 4-2. Top 10 species banded at MBO during SMMP 2011, as well as the numbers for 2005-2010. Numbers in parentheses indicate the rank in past years. Dashes represent species not banded in a given year.

	2011	2010	2009	2008	2007	2006	2005
1. Yellow-rumped Warbler	102	30 (5)	37 (8)	47 (4)	32 (5)	22 (8)	25 (7)
2. Tennessee Warbler	71	7 (22)	82 (1)	6 (27)	16 (11)	2 (40)	4 (28)
3. Red-winged Blackbird	70	85 (1)	50 (3)	114 (1)	154 (1)	169 (1)	73 (2)
4. White-throated Sparrow	51	22 (8)	34 (9)	79 (3)	13 (17)	42 (5)	29 (6)
5. Cedar Waxwing	50	72 (2)	14 (17)	29 (8)	17 (9)	17 (13)	59 (3)
6. Blackpoll Warbler	45	6 (23)	39 (7)	24 (10)	47 (4)	3 (37)	3 (31)
7. Ruby-crowned Kinglet	43	36 (4)	73 (2)	92 (2)	52 (2)	58 (3)	20 (9)
8. Slate-colored Junco	36	8 (20)	10 (23)	9 (21)	--	48 (4)	5 (21)
9. American Robin	30	17 (10)	5 (29)	8 (24)	12 (18)	18 (12)	16 (12)
9. Yellow Warbler	30	26 (7)	43 (5)	36 (6)	29 (6)	21 (10)	47 (4)
9. Common Yellowthroat	30	17 (10)	28 (10)	25 (9)	12 (18)	25 (7)	22 (8)

4.3.2 Birds recaptured

There were 129 repeats (individuals caught within 3 months of banding at MBO) of 25 species during SMMP 2011. This is the second-lowest total for a spring season next to 103 in 2007, and is well below the six-year mean of 178. Repeats can be subdivided into local residents caught repeatedly, and migrants captured twice or more during their stopover at MBO. As is often the case in spring, the majority of the species recaptured most frequently are ones with a local breeding population (Table 4-3). The lower than usual rate of repeats for some of these species may be explained in part by the reduced net hours this spring. However, other factors

must also be involved, as last year's top three species (Song Sparrow, 28; Yellow Warbler, 26; Red-winged Blackbird, 24) all dropped by more than half in 2011.

Table 4-3. Top 10 species recaptured most often during SMMP 2011. These represent the same individuals caught repeatedly in some cases. .

Species	# repeats	# individuals
1. Baltimore Oriole	14	8
2. Yellow Warbler	12	8
3. House Wren	11	5
4. Black-capped Chickadee	9	9
4. Gray Catbird	9	3
6. Song Sparrow	8	5
6. White-throated Sparrow	8	7
8. Red-winged Blackbird	7	5
9. Northern Waterthrush	6	5
9. Fox Sparrow	6	5

There were more recaptures this spring of Baltimore Oriole than any other species, but only 8 individuals were involved. The species with the greatest number of individuals recaptured (9) was Black-capped Chickadee. As in 2010, very few of the certain transients were recaptured more than three days after being banded. Among these were an American Tree Sparrow (7 days), 4 Fox Sparrows (4-6 days), and 2 Slate-colored Juncos (5-7 days), all of which might have been lingering overwintering birds. Later in spring, the only others recorded staying more than three days were 2 Ruby-crowned Kinglets (4-5 days), a Tennessee Warbler (4 days), 2 Blackpoll Warblers (4-5 days), and a Yellow-rumped Warbler (5 days).

There were only 63 returns of 17 species during SMMP 2011, the lowest total ever for spring (Table 4-4). This is a significant departure from the steady increasing trend over the previous five years, from 75 in 2006 to 112 in 2010. As with the repeats, the lower net hours this year might be somewhat of a factor, although given that these are local residents, the chance of them getting captured at least once over the course of the season to register as a return would not be expected to change much due to a roughly 15% drop in effort. Last year Black-capped Chickadee had the second highest count of returns, and in February and March this year 23 of them were recorded as returns during the winter program. However, only 3 of these birds were again recaptured during SMMP as repeats, therefore this had less impact on the spring returns total than might have been expected. Other drops in numbers are also difficult to explain – for example, as in 2010, Yellow Warbler accounted for the greatest number of returns this spring, but with only 13 compared to 29 last year. However, the number of Yellow Warblers banded was nearly identical in both years (26 in 2010, 28 in 2011), as was the mean number observed per day (4.33 over 32 days in 2010, 4.53 over 31 days in 2011). This suggests that some of the local breeders may have had a lower rate of over-winter survival.

Among the noteworthy returns this spring were 3 American Redstarts, all of which were previously captured in August 2010, and one of which was originally banded in August 2009. American Redstart was only confirmed as a breeding species at MBO in 2010, but these results suggest there may be more than one local pair. Also, there were 18 returns that had not been recorded at MBO for more than one year, including two Red-winged Blackbirds last recaptured in May 2008, and a Veery not recaptured since August 2007. The oldest bird recaptured this spring was a Yellow Warbler banded in August 2005 as an after-hatch-year bird, followed by a Common Yellowthroat and a Red-winged Blackbird each banded in May 2006. Among the returns were several individuals that were banded at MBO as juveniles, including Black-capped

Chickadee, Gray Catbird, American Redstart, Yellow Warbler, Common Yellowthroat, Song Sparrow, and Red-winged Blackbird.

No foreign-banded birds were captured at MBO during SMMP 2011. However, 3 birds banded at MBO were reported elsewhere during this period. A Common Grackle banded on 7 May 2007 was found nearby in Sainte-Anne-de-Bellevue on 21 April 2011. Another Common Grackle banded on 24 April 2010 was reported from Beaconsfield (roughly 8 km east of MBO) on 24 May 2011. The biggest traveler was an Indigo Bunting banded last fall on 9 September 2010 and recovered on 27 May 2011 in King City, Ontario (roughly 480 km west of MBO).

Table 4-4. List of returns captured during SMMP 2011, sorted by time elapsed.

Band number	Species	Age/sex in 2011	Age/sex at banding	Banding date	Previous capture	2011 return	Time elapsed		
2241-39480	VEER	ASY-U	AHY-U	8 Aug 06	16 Aug 07	12 May	3 years	9 months	26 days
1951-76663	RWBL	ASY-F	SY-F	7 May 07	29 May 08	12 May	2 years	11 months	13 days
1222-70395	RWBL	ASY-M	ASY-M	14 May 06	25 May 08	26 Apr	2 years	11 months	1 day
2291-10837	VEER	ASY-U	HY-U	27 Aug 08	19 May 09	21 May	2 years		2 days
2500-65380	YWAR	ASY-M	SY-M	27 May 08	26 May 09	23 May	1 year	11 months	27 days
1891-91394	BAOR	ASY-M	SY-M	25 May 09	27 May 09	23 May	1 year	11 months	26 days
1891-91391	BHCO	ASY-M	ASY-M	22 May 09	22 May 09	1 May	1 year	11 months	9 days
1212-69205	RWBL	ASY-M	JUV-U	19 Jun 09	19 Jun 09	19 May	1 year	11 months	
2341-57982	SOSP	ASY-M	AHY-M	1 Aug 08	4 Oct 09	24 Apr	1 year	6 months	20 days
2600-15729	ATSP	ASY-U	SY-U	21 Jan 10	21 Jan 10	19 Apr	1 year	2 months	28 days
2600-16002	YWAR	ASY-M	SY-M	15 May 10	15 May 10	29 May	1 year		14 days
1342-01047	RWBL	ASY-M	SY-M	2 May 10	2 May 10	9 May	1 year		7 days
1891-91514	RWBL	ASY-F	ASY-F	2 May 10	2 May 10	8 May	1 year		6 days
2490-24706	YWAR	ASY-F	ASY-F	11 May 07	14 May 10	20 May	1 year		6 days
2490-24858	COYE	ASY-M	AHY-M	9 Aug 07	16 May 10	21 May	1 year		5 days
2460-40364	COYE	ASY-M	ASY-M	25 May 06	25 May 10	29 May	1 year		4 days
2600-16686	YWAR	ASY-F	AHY-F	4 Aug 09	19 May 10	23 May	1 year		4 days
1891-91374	BAOR	ASY-F	SY-F	18 May 09	19 May 10	22 May	1 year		3 days
2600-16015	YWAR	ASY-F	SY-F	17 May 10	17 May 10	20 May	1 year		3 days
1212-69219	RWBL	ASY-M	JUV-U	24 Jun 09	20 Apr 10	21 Apr	1 year		1 day
2600-16066	YWAR	ASY-M	SY-M	30 May 10	30 May 10	30 May	1 year		
1891-91513	RWBL	ASY-F	SY-F	1 May 10	1 May 10	29 Apr		11 months	28 days
2500-65533	YWAR	ASY-F	AHY-F	1 Aug 08	23 May 10	20 May		11 months	27 days
1840-76953	YWAR	ASY-M	AHY-M	12 Aug 05	29 May 10	24 May		11 months	25 days
2030-67522	TRES	ASY-F	ASY-F	20 Apr 10	29 Apr 10	24 Apr		11 months	25 days
2500-65500	AMGO	ASY-M	SY-M	16 May 09	15 May 10	7 May		11 months	22 days
1891-91350	BAOR	ASY-M	SY-M	11 May 09	30 May 10	20 May		11 months	20 days
2600-16048	YWAR	ASY-F	SY-F	24 May 10	24 May 10	13 May		11 months	19 days
2030-67533	TRES	ASY-F	SY-F	1 May 10	1 May 10	19 Apr		11 months	18 days
2560-25347	YWAR	ASY-F	ASY-F	9 May 09	13 Jun 10	22 May		11 months	9 days
1891-91604	BAOR	ASY-M	SY-M	27 Jun 10	27 Jun 10	13 May		10 months	16 days
2600-16056	COYE	ASY-F	SY-F	25 May 10	1 Aug 10	30 May		9 months	29 days
1891-91588	GRCA	SY-U	HY-U	1 Aug 10	1 Aug 10	23 May		9 months	22 days
2550-58374	AMRE	SY-U	HY-U	5 Aug 10	9 Aug 10	27 May		9 months	18 days
2341-58999	SOSP	ASY-M	HY-U	26 Sep 09	15 Aug 10	1 Jun		9 months	17 days
2600-15891	AMGO	ASY-F	AHY-F	8 Aug 10	8 Aug 10	25 May		9 months	17 days
2600-16061	YWAR	ASY-M	ASY-M	27 May 10	15 Aug 10	30 May		9 months	15 days
2600-16226	COYE	SY-M	HY-U	5 Aug 10	5 Aug 10	20 May		9 months	15 days
2600-16228	YWAR	SY-U	HY-U	6 Aug 10	6 Aug 10	18 May		9 months	12 days
2231-66134	GRCA	ASY-M	HY-U	11 Aug 07	12 Aug 10	21 May		9 months	9 days
2600-16270	COYE	SY-M	HY-U	11 Aug 10	11 Aug 10	19 May		9 months	8 days
2530-54951	AMRE	ASY-M	HY-M	7 Aug 09	8 Aug 10	13 May		9 months	5 days
2550-58398	AMRE	SY-M	HY-M	9 Aug 10	17 Aug 10	22 May		9 months	5 days
2500-65557	YWAR	ASY-M	AHY-M	4 Aug 08	9 Aug 08	12 May		9 months	3 days
1891-91451	GRCA	ASY-U	SY-F	6 Aug 09	18 Aug 10	20 May		9 months	2 days
2500-65534	YWAR	ASY-M	AHY-M	1 Aug 08	13 Aug 10	12 May		8 months	29 days
2431-74127	SOSP	AHY-U	HY-U	25 Jul 10	25 Jul 10	22 Apr		8 months	27 days

Band number	Species	Age/sex in 2011	Age/sex at banding	Banding date	Previous capture	2011 return	Time elapsed	
2600-16392	COYE	SY-F	HY-F	30 Aug 10	30 Aug 10	25 May	8 months	25 days
2431-74079	SOSP	AHY-U	HY-U	8 Aug 10	8 Aug 10	18 Apr	8 months	10 days
2431-74037	SOSP	AHY-U	AHY-F	1 Jun 10	15 Aug 10	19 Apr	8 months	4 days
2600-16242	COYE	ASY-M	AHY-M	7 Aug 10	3 Sep 10	1 May	7 months	28 days
2421-70506	NOCA	AHY-F	HY-U	4 Aug 10	13 Sep 10	7 May	7 months	24 days
2600-16677	HOWR	ASY-U	AHY-F	3 Aug 09	26 Sep 10	30 Apr	7 months	4 days
2600-15928	BCCH	SY-M	HY-U	4 Aug 10	20 Oct 10	30 Apr	6 months	10 days
2500-65183	BCCH	ASY-U	HY-U	16 Aug 08	17 Oct 10	26 Apr	6 months	9 days
2600-16128	BCCH	ASY-F	AHY-F	30 Jul 10	29 Oct 10	24 Apr	5 months	25 days
2500-65165	BCCH	ASY-U	HY-U	2 Aug 08	1 Nov 10	24 Apr	5 months	23 days
2431-86863	DOWO	ATY-F	SY-F	8 Nov 10	8 Nov 10	1 May	5 months	23 days
2650-25517	SCJU	SY-F	HY-F	1 Nov 10	1 Nov 10	18 Apr	5 months	17 days
2560-25168	BCCH	ASY-F	HY-U	28 Sep 08	11 Nov 10	26 Apr	5 months	15 days
2490-24915	BCCH	ASY-U	AHY-U	14 Sep 07	25 Nov 10	7 May	5 months	12 days
2650-25744	SCJU	SY-M	HY-M	25 Nov 10	25 Nov 10	22 Apr	4 months	27 days
2650-25739	SCJU	SY-F	HY-F	25 Nov 10	25 Nov 10	19 Apr	4 months	24 days

4.3.3 Census

One or more experienced observers walked the standardized census route daily during SMMP, often recording species not otherwise documented during the course of the morning and greatly contributing to the documentation of migration through MBO. This year 9 species (compared to 14 last year) were observed only through census: Northern Pintail, Green-winged Teal, Great Horned Owl, Carolina Wren, Marsh Wren, Swainson's Thrush, Eastern Towhee, Purple Finch, and Evening Grosbeak.

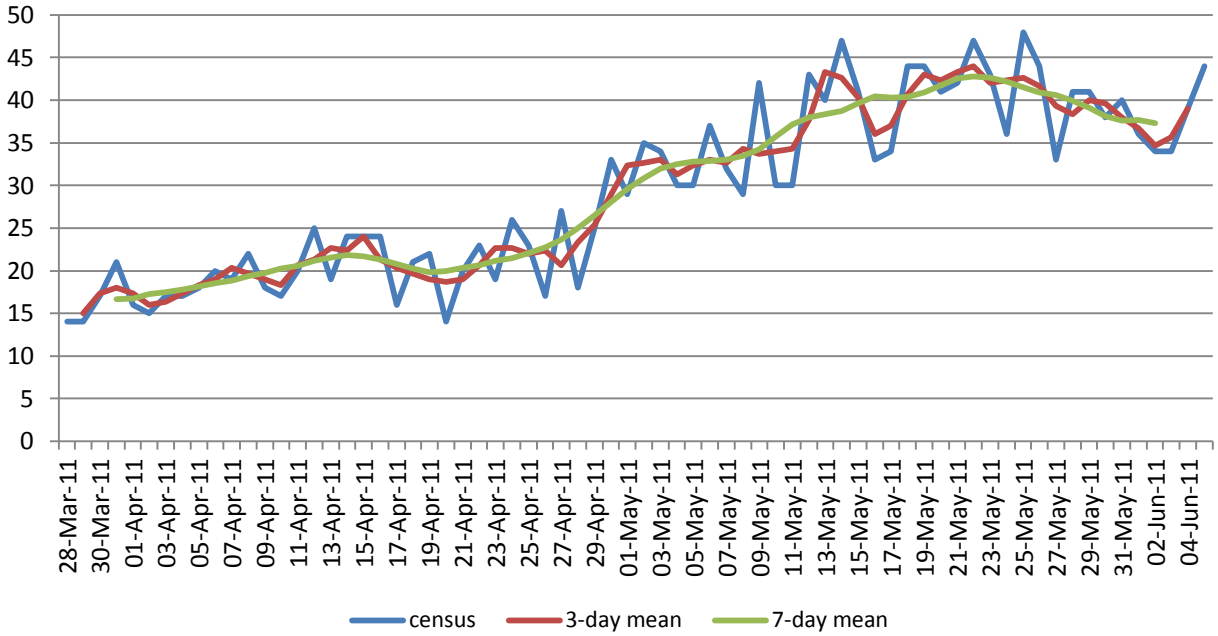

Figure 4-3. Number of species recorded on the daily census during SMMP 2011 at MBO, including a 3-day and 7-day running mean.

As shown in Figure 4-3, there was considerable daily variation in the number of species observed during the census, ranging from a low of 14 on March 28, March 29, and April 20, to a high of 48 on May 25. This reflects not only actual changes in the bird population from day to day, but also variation due to weather and among observers. To account for this, 3-day and 7-day running means were calculated and plotted. As usual, diversity on census peaked in the

third week of May, and by the end of the season, most species being observed were likely those remaining at MBO to breed.

4.3.4 Daily estimated totals (DET)

The DET reflects not only banding and census data, but also all supplemental observations made by participants throughout each morning. It is particularly important for waterfowl and raptors, which are not targeted by the banding program, and are only marginally sampled by the census, since many are more active later in the morning. However, the DET is also valuable for passerines, both to monitor infrequently captured species, and as a means to evaluate the percentage of individuals of each species that are caught and banded. Thirteen species (two fewer than last year) were only observed during these incidental observations this spring, highlighting their importance for the DET. The species this year were American Wigeon, Black-crowned Night Heron, Cooper's Hawk, Broad-winged Hawk, American Kestrel, Peregrine Falcon, Lesser Yellowlegs, Herring Gull, Great Black-backed Gull, Chimney Swift, Orange-crowned Warbler, Eastern Meadowlark, and House Finch.

During SMMP 2011, 140 species were recorded, matching both the total from 2010 and the six-year spring mean. There were 15 species seen on just a single day, highlighting the importance of full daily coverage throughout the season. No new species were added to the all-time MBO checklist this spring.

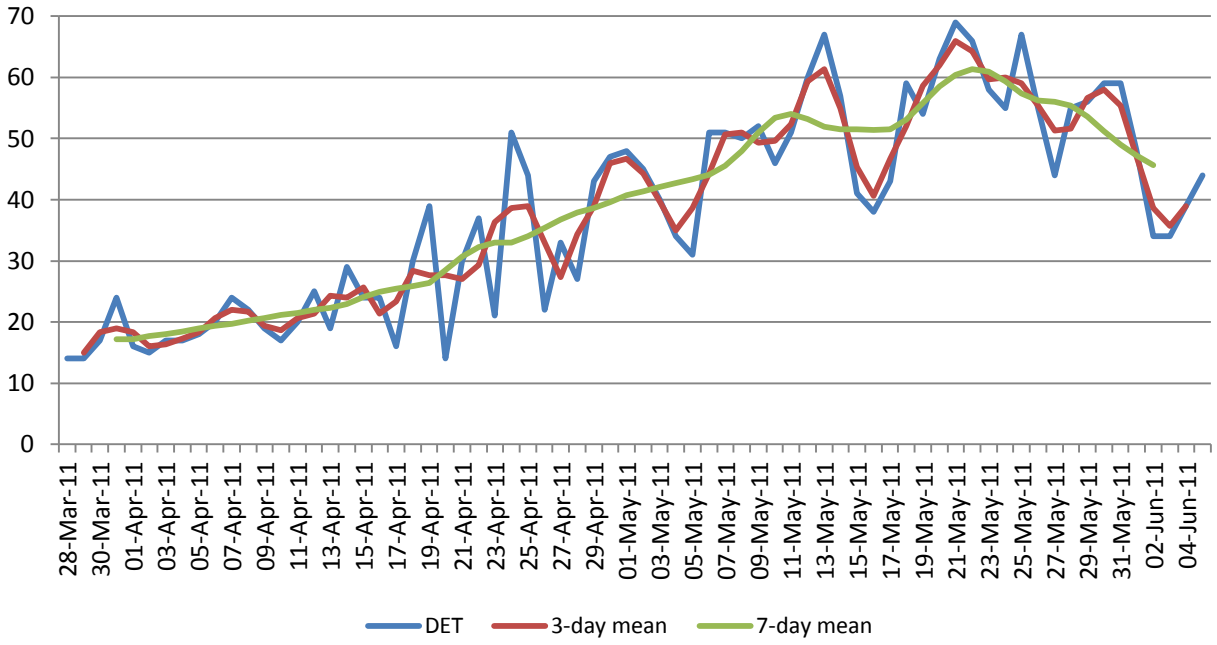

Figure 4-4. Number of species observed daily during SMMP 2011 at MBO, including a 3-day and 7-day running mean.

The highest single day total, 69 species, was recorded on May 21, while the lowest count of 14 was repeated on the first two days of the season (Figure 4-4). There was considerable variation in daily estimated totals from day to day, again due to weather and observer effects. A clearer pattern is shown by the 7-day running average, which increased very steadily until around May 10, hit a plateau for another ten days, and then peaked during the fourth week of May, getting as high as 61 species on May 22 (the same date as last year's peak).

This year 18 species were observed during all 10 weeks of the spring season: Canada Goose, Mallard, Great Blue Heron, Ring-billed Gull, Downy Woodpecker, Hairy Woodpecker, Pileated Woodpecker, Blue Jay, American Crow, Black-capped Chickadee, American Robin, European Starling, Cedar Waxwing, Northern Cardinal, Song Sparrow, Red-winged Blackbird, Common Grackle, and American Goldfinch. This list is similar to last year's, except for Wood Duck, Northern Flicker, Tree Swallow, and Brown-headed Cowbird dropping off, and Great Blue Heron, Downy Woodpecker, and European Starling being added. Only Red-winged Blackbird was banded during each week of the banding period.

4.3.5 Coverage of priority species

MBO has produced a list of 62 target species for priority monitoring (Gahbauer and Hudson 2008). The list is based on priority rankings proposed by Bird Studies Canada, with an emphasis on species poorly studied by the Breeding Bird Survey due to their northern breeding distribution, and on neotropical migrants, recognized as being at elevated conservation risk due to threats to their wintering grounds. The MBO list has been modified to eliminate western species not expected to occur at the site.

Table 4-5. Summary of priority species observed and banded during SMMP 2011. Detailed category definitions are provided in Gahbauer and Hudson (2008).

	Priority A	Priority B	Priority C	Priority D
Number of species in category	15	10	18	19
Number of species observed	14	10	18	19
Number of species banded	11	9	14	13
Number of individuals banded	224	288	121	195

All but one of the species on the MBO priority list were observed during SMMP 2011 (Gray-cheeked Thrush was missed), and 76% were banded (Table 4-5). Nearly 92% of individuals banded were priority species, which is higher than last year, largely due to the influx of Tennessee Warblers and Yellow-rumped Warblers, which fall under categories A and B, respectively. Of the top 10 species banded at MBO during SMMP 2011, all are designated as priority species, including 6 that are priority A or B, indicating the program is effective at documenting these otherwise poorly monitored birds.

4.3.6 Net productivity

As in previous seasons, the productivity of nets during SMMP 2011 was assessed. Table 4-6 summarizes the usage and productivity of all nets. The nets are clustered into three main groups. C and D (six nets total) are along the east and north edges of Stoneycroft Pond. Four nets sample the shrubby areas east of Stoneycroft Pond (A and E). H and B/N (six nets total) are along the back ponds. Under normal weather and personnel conditions, all nets are operated for five hours daily. However, the B/N nets are more vulnerable to wind, and are closed when conditions are unfavourable. They are also omitted when human resources are limited and/or bird volume warrants operations being scaled back, resulting in a core group of 12 nets (C-A-D-E-H) that allows for sampling from each area while minimizing walking time.

The overall capture rate for SMMP 2011 was 37.2 new birds per 100 net hours, much higher than the rate of 20.2 in 2010, and significantly better than the range of 25.8 to 28.6 in other previous years. An additional 7.9 birds per 100 net hours were recaptured.

The relative effectiveness of nets varies from year to year, although typically the A and H nets along with E2 are the most productive in spring. This year was normal in that regard, with the top four nets by rate of capture being H1, A1, H2, and A2. Also above average this spring were D1, C1, and E2. The strong performance of D1 was in sharp contrast to D2, which had the

second-lowest capture rate of all nets. D3, D4, and E1 all were similarly low. The B/N nets were generally poor, but N3 stood out, nearly reaching the overall average for the season.

Table 4-7. Net usage and capture rates during SMMP 2011

Net	Hours open	New captures	Repeats+ Returns	Total captures	Birds / 100 net hours New	Birds / 100 net hours Total
A1	162.8	90	15	105	55.3	64.5
A2	162.8	80	21	101	49.1	62.0
A - TOTAL	**325.6**	**170**	**36**	**206**	**52.2**	**63.3**
B2	140.0	31	5	36	22.1	25.7
N1	140.0	33	5	38	23.6	27.1
N3	140.0	48	7	55	34.3	39.3
B3	140.0	24	8	32	17.1	22.9
B/N – TOTAL	**560.0**	**136**	**25**	**161**	**24.3**	**28.9**
C1	162.8	76	16	92	46.7	56.5
C2	162.8	59	16	75	36.2	46.1
C – TOTAL	**325.6**	**135**	**32**	**167**	**41.5**	**51.3**
D1	162.8	80	12	92	49.1	56.5
D2	162.8	32	7	39	19.7	24.0
D3	162.8	46	21	67	28.3	41.2
D4	162.8	50	17	67	30.7	41.2
D – TOTAL	**651.2**	**208**	**57**	**265**	**31.9**	**40.7**
E1	155.3	38	4	42	24.5	27.0
E2	162.8	68	10	78	41.8	47.9
E - TOTAL	**318.1**	**106**	**14**	**120**	**33.3**	**37.7**
H1	94.5	61	9	70	64.6	74.1
H2	161.5	87	14	101	53.9	62.5
H - TOTAL	**256.0**	**148**	**23**	**171**	**57.8**	**66.8**
SUBTOTAL	**2436.0**	**903**	**187**	**1090**	**37.1**	**44.7**
Nest Boxes	-	3	3	6	n/a	n/a
Unknown	-	-	2	2	n/a	n/a
GRAND TOTAL	**2436.0**	**906**	**192**	**1098**	**37.2**	**45.1**

4.4 Summary and analysis

Banding effort was at a record low this spring, due primarily to a near record amount of rainfall during the season, and also some early cold spells and flooding. Despite that, a record high total of 906 birds were banded, and the 64 species banded was also a new high for spring. This included a single-day spring record of 102 individuals on May 22. It may be that the rain actually grounded some migrants that would have otherwise overflown MBO. The number of species observed this spring was 140, which is average for the season. The peak of 69 species on May 21 was the third best day in MBO's history.

Warblers were dominant this spring, comprising 44% of birds banded, including the top two species (Yellow-rumped and Tennessee Warbler) and three others in the top ten. The number of Yellow-rumped Warblers was unprecedented for spring, but was almost certainly a carryover from the immense southbound flight last fall. Meanwhile, Tennessee Warbler has shown an order of magnitude fluctuation between odd and even years since 2008, with only 6 banded in 2008 and 7 in 2010, but 82 in 2009 and 71 this year.

Repeats and returns were both below normal this spring. The number of spring returns increased annually from 2006 through 2010, reflecting in part the growing proportion of breeding adults at MBO that were banded. The 63 returns this spring were barely more than half of last year's count of 112, and the drop was significant across all of the species that usually dominate the list, including Gray Catbird, Yellow Warbler, and Song Sparrow. While it is possible that some birds were simply missed due to reduced banding effort, the difference was proportionate to that mechanism. It will be interesting to see in 2012 whether any individuals return that were missed in 2011.

5. Summer (MAPS) program

Summer at MBO spans an 8-week period between migration periods, from June 6 through July 31. In earlier years, observations during this period were on a casual basis, but since 2009 data have been collected in a more standardized manner through the Monitoring Avian Productivity and Survivorship (MAPS) program. Banding takes place at 9 nets around the southern half of Stoneycroft Pond, used only for MAPS.

5.1 Effort

Seven visits were conducted between June 6 and July 31. Each visit involved six hours of banding using the MAPS nets, as well as incidental observations of all species present.

5.2 Site conditions

Temperatures in June were close to normal but there was more rain than usual. July was both hotter and drier than normal. Since only seven visits were required during the season, per the MAPS protocol, it was possible to choose suitable weather in each case. However, the degree to which the weather had an impact on nesting success is unknown.

Table 5-1. Weather conditions during the 2011 MAPS program, by week.

	1 *Jun 6-12*	2 *Jun 13-19*	3 *Jun 20-26*	4 *Jun 26-Jul 3*	5 *Jul 4-10*	6 *Jul 11-17*	7 *Jul 18-24*	8 *Jul 25-31*	SEASON
Mean daily high (^{o}C)	25.5	24.8	24.0	25.9	27.3	28.6	30.7	27.4	26.8
Mean daily low (^{o}C)	15.6	13.8	15.3	16.4	16.7	16.9	20.1	16.5	16.4
Mean daily temp (^{o}C)	20.6	19.3	19.3	21.2	22.0	22.7	25.4	22.0	21.6
Highest temp (^{o}C)	31	30	27	31	30	32	36	30	36
Lowest temp (^{o}C)	14	10	12	14	15	13	17	15	10
# days with rainfall	4	4	6	4	3	3	3	3	30
Total rain (mm)	42	15	35	16	11	17	6	11	153

5.3 Results

5.3.1 Birds banded

Both the number of individuals (111) and species (21) banded were fewer than in either of the previous years of MAPS. However, there is a reasonable amount of consistency from year to year, with six species in the top ten in all three years: Downy Woodpecker, Black-capped Chickadee, American Robin, Yellow Warbler, Song Sparrow, and Baltimore Oriole (Table 5-2).

Table 5-2. Top 12 species banded at MBO during MAPS 2011, as well as the numbers for 2005-2010 (note that 2005-2008 did not follow the MAPS protocol). Numbers in parentheses indicate the rank within the top 10 in past years. Dashes represent species not banded in a given year.

	2011	2010	2009	2008	2007	2006	2005
1. Song Sparrow	18	20 (1)	10 (5)	--	3 (4)	10 (1)	4 (1)
2. American Robin	14	13 (3)	13 (3)	--	--	--	--
3. Red-eyed Vireo	12	9 (5)	4 (12)	--	--	--	--
4. Yellow Warbler	11	8 (6)	10 (5)	--	--	3 (4)	4 (1)
5. Baltimore Oriole	9	6 (7)	7 (8)	--	--	1 (6)	--
6. Black-capped Chickadee	8	14 (2)	11 (4)	--	--	--	--
7. Gray Catbird	7	3 (13)	4 (12)	--	--	--	2 (5)
8. Downy Woodpecker	6	6 (7)	6 (9)	--	--	--	--
9. House Wren	3	1 (18)	2 (15)	--	6 (2)	1 (6)	--
9. Black-and-white Warbler	3	--	--	--	--	--	--
9. Common Yellowthroat	3	--	5 (10)	--	--	--	--
9. Swamp Sparrow	3	5 (10)	2 (15)	--	--	4 (3)	2 (5)

Black-and-white Warbler was the only species banded this year that had not previously been banded during MAPS. Veery (4 banded in each of 2009 and 2010) and Rose-breasted Grosbeak (5 banded in each of 2009 and 2010) were the most notable absences this summer.

5.3.2 Birds recaptured

There were 17 repeats of 7 species and 9 returns of 6 species during MAPS. The oldest of the returns was a Veery banded as a juvenile in August 2005.

Table 5-3. List of returns captured during MAPS 2011, sorted by time elapsed.

Band number	Species	Age/sex in 2011	Age/sex at banding	Banding date	Previous capture	2011 return	Time elapsed		
1891-91400	GCFL	ASY-F	ASY-F	31 May 09	31 May 09	26 Jun	2 years		26 days
2241-30943	VEER	AHY-U	JUV-U	10 Aug 05	20 Aug 09	31 Jul	1 year	11 months	11 days
2600-15369	BCCH	AHY-F	HY-U	29 Nov 09	4 Dec 09	25 Jul	1 year	7 months	21 days
1342-01016	RWBL	ASY-M	ASY-M	27 Mar 10	27 Mar 10	26 Jun	1 year	2 months	29 days
2341-57968	SOSP	AHY-M	AHY-M	24 May 09	25 Jul 10	6 Jun		10 months	11 days
2600-16372	COYE	SY-M	HY-M	23 Aug 10	23 Aug 10	6 Jun		9 months	13 days
2460-40095	BCCH	AHY-U	HY-U	2 Aug 07	27 Oct 10	21 Jul		8 months	24 days
2600-15955	BCCH	AHY-F	HY-U	12 Sep 10	8 Nov 10	21 Jul		8 months	13 days
2650-25467	BCCH	AHY-F	HY-U	8 Nov 10	25 Nov 10	21 Jul		7 months	26 days

5.3.3 Daily estimated totals (DET)

The number of species observed daily ranged from a low of 29 on 31 July to a high of 45 on 6 June. Over the course of the season, 60 species were observed, well above the mean of 50 during the previous two years of MAPS, but below the counts from 2005-2007 when there were more frequent summer visits, reflecting the impact of increased effort on this result. Belted Kingfisher, Eastern Bluebird, and Slate-colored Junco were observed for the first time in summer, bringing the cumulative list for the season to 100 species.

A look back at Veery 2241-30943 when it was first banded shortly after fledging in August 2005. Since then it has likely flown at least 70,000 km, based on the core of Veery winter range being in the Amazon basin.
(Photo by Marcel Gahbauer)

6. Fall Migration Monitoring Program (FMMP)

The Fall Migration Monitoring Program has been operated at MBO annually since 2004, with standardized operations since 2005. It covers the 13-week period from August 1 through October 30, with census, observations, and a five-hour banding period daily (weather permitting).

6.1 Effort

Census was conducted on all 91 days of the season, while banding took place on 85 (93%) of the 91 scheduled days. Banding was cancelled on the other 6 days due to rain, including 3 days between October 14 and 20. On 10 additional days, rain and/or strong winds resulted in reduced net hours, leaving an above-average 75 days (82%) of full operation according to the site protocol. As a result of the generally favourable conditions, the banding effort of 6395 net hours was the highest ever for FMMP.

All captures this fall were through the standard set of 16 mist nets used for migration monitoring, arranged as in previous years (net locations A1, A2, B2, N1, N3, B3, C1, C2, D1, D2, D3, D4, E1, E2, H1, and H2; see Gahbauer and Hudson 2008 for a map). Most nets were 12 m long with 30 mm mesh, from Spidertech. Several were quite faded and in other years would have been replaced, but Spidertech was not able to deliver nets in 2011, and other suppliers could not provide a net with sufficiently similar characteristics, so the decision was made to continue with most of the existing nets despite them being somewhat more visible than usual. However, an Avinet net was tested at A2, a nylon net from the Eastern Bird Banding Association was employed at E1, an Ecotone net was used at N1, lightly-used Spidertech nets from the MAPS program were used in September to replace faded nets at D2 and D3, and D1 was replaced with a Manomet net in mid-October, leaving only A1, E2, and the C and H sets as brown nets.

6.2 Site conditions

Weather can have a significant influence on migration. Temperatures this fall were generally close to normal, with the only noteworthy deviation being a late warm spell through most of weeks 11 and 12. It was the wettest fall since 2005, but much of the rain came outside of banding hours and therefore did not affect operations as much as might have been expected. However, the rain, especially when it fell overnight, may still have had an impact on migration.

Table 6-1. Weather conditions during the 2011 Fall Migration Monitoring Program, by week.

	1	2	3	4	5	6	7	8	9	10	11	12	13	SEASON
Mean daily high (^{o}C)	27.9	26.4	26.1	23.3	25.7	21.4	19.7	22.6	19.4	17.6	18.0	12.2	8.9	20.7
Mean daily low (^{o}C)	17.7	17.2	16.4	15.0	16.6	12.8	10.2	13.5	11.0	7.6	9.8	6.7	0.2	11.9
Mean daily temp (^{o}C)	22.8	21.8	21.3	19.1	21.2	17.1	15.0	18.1	15.2	12.6	13.9	9.5	4.6	16.3
Highest temp (^{o}C)	31	28	29	27	30	26	27	25	25	24	24	14	16	31
Lowest temp (^{o}C)	16	15	11	12	13	9	6	9	7	1	8	3	-4	-4
# days with rainfall	4	5	6	4	4	3	4	5	5	2	5	6	2	55
Total rain (mm)	34	69	53	68	18	16	39	11	52	3	39	27	3	432

6.3 Results

6.3.1 Birds banded

Despite the record number of net hours this fall, the total of 2789 birds banded was lower than in all previous years, and was only 41% of the total from FMMP 2010. However, the 77 species banded was near the upper end of the range of 74 to 78 in previous years. The busiest day of the season was 26 August, with 112 birds banded (Figure 6-1). By comparison, during FMMP 2010 there were 22 days with higher counts. This year there were two distinct peaks of banding

activity, one from late August to early September, and the other one from late September into early October. For FMMP 2011 the mean count of birds banded per day was 30.6 (or 32.8 during the 85 days with nets open).

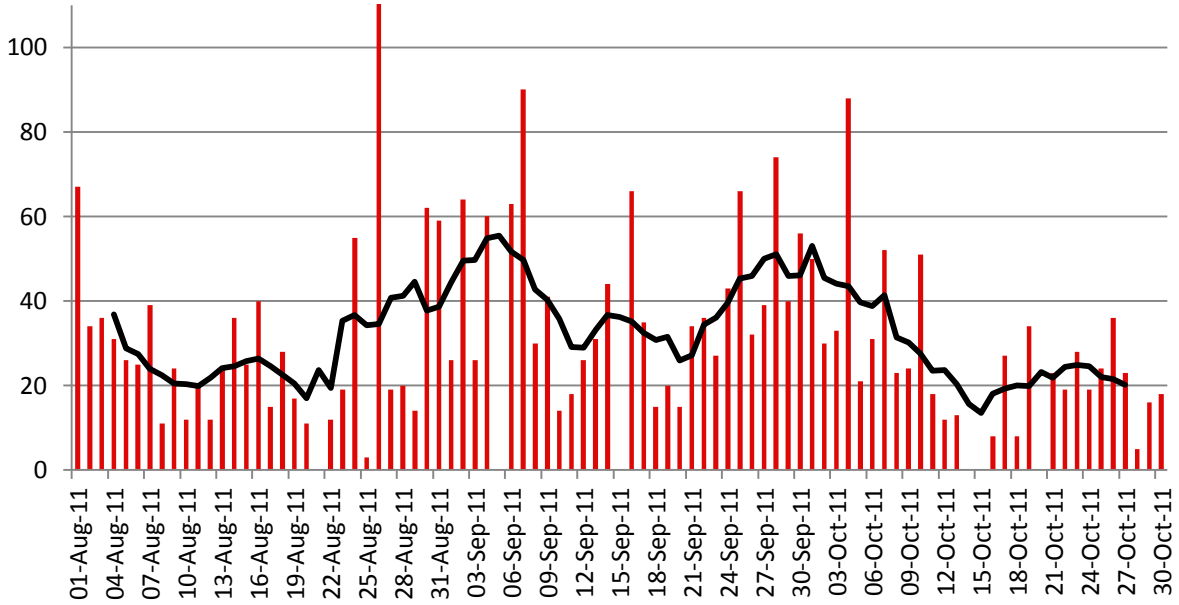

Figure 6-1. Number of individuals banded per day during the 2011 Fall Migration Monitoring Program, with a running 7-day mean in black.

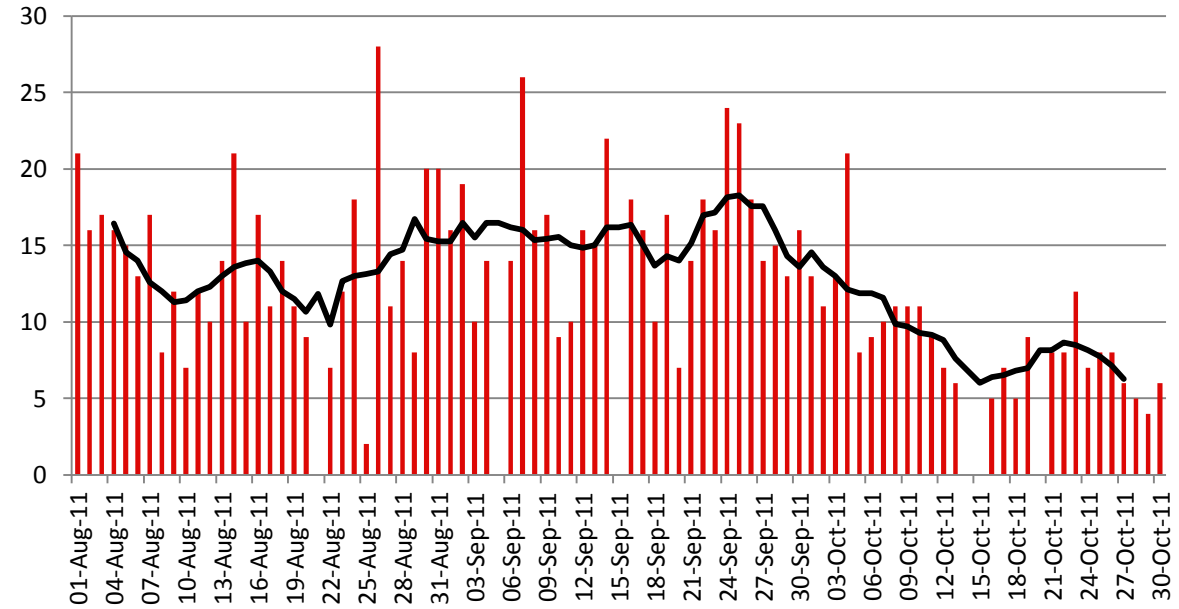

Figure 6-2. Number of species banded per day during the 2011 Fall Migration Monitoring Program, with a running 7-day mean in black.

Species richness among banded bird peaked in late September, but was fairly steady through most of September, and then declined sharply through October (Figure 6-2). The greatest variety banded in a single day was 28 species on August 26. The mean number of species banded per day was 12.8.

No new species were banded at MBO as part of FMMP 2011, although in August a non-standard capture of 3 Wood Ducks boosted the list of species banded at the site to 108. Bicknell's Thrush was the only species this fall to be detected just through banding. Ten species were banded just once this fall: Cooper's Hawk, Pileated Woodpecker, Great Crested Flycatcher, Northern Shrike, White-breasted Nuthatch, Bicknell's Thrush, Brown Thrasher, Scarlet Tanager, Brown-headed Cowbird, and Pine Siskin.

At the other extreme, Table 6-2 lists the 10 most frequently banded species, which account for 56.8% of all birds banded during FMMP 2011. Five of these (Ruby-crowned Kinglet, American Robin, Magnolia Warbler, Song Sparrow, and White-throated Sparrow) have been in the top 10 for fall annually since 2005. Among this year's top 10, the only species to have never made the list in previous years is Tennessee Warbler. This is the first time that six warblers have appeared in the top ten; overall 23 warbler species were banded, comprising 49% of individuals banded this fall.

Magnolia Warbler was the top species this fall, marking the first time it has ranked higher than fifth place. Its position this fall is largely due to the scarcity of other species, as highlighted by the similar count of Magnolia Warblers last fall, good enough only for seventh place. The count of White-throated Sparrows was the lowest since 2006, but still enough for second place this fall. The record count of Tennessee Warblers rounded out the top three. Fewer Ruby-crowned Kinglets and Song Sparrows were banded this fall than any previous year, but they still came in fourth and fifth place, respectively. The number of American Redstarts banded increased for the fifth consecutive year, and the sixth place ranking is the highest yet for this species. Nashville Warbler had a good total for the third time in four years, and ended up in seventh place this fall. After a record-shattering fall in 2010, the number of Yellow-rumped Warblers dropped to almost perfectly match the 2009 count, landing in eighth place. Common Yellowthroat numbers were just above average this fall, but due to the lower counts of other species, it made the top ten for the third time. The number of American Robins was over 70% lower than the six-year fall mean, and just enough to still squeak into this year's top ten.

Table 6-2. Top 10 species banded at MBO during FMMP 2011, as well as the numbers for 2005-2010. Numbers in parentheses indicate the rank in past years.

	2011	2010	2009	2008	2007	2006	2005
1. Magnolia Warbler	252	260 (7)	103 (9)	264 (5)	74 (10)	157 (6)	192 (5)
2. White-throated Sparrow	216	351 (5)	428 (1)	315 (4)	318 (2)	187 (5)	354 (1)
3. Tennessee Warbler	208	114 (12)	23 (32)	86 (11)	18 (31)	57 (11)	46 (18)
4. Ruby-crowned Kinglet	180	271 (6)	257 (4)	319 (3)	375 (1)	435 (2)	245 (2)
5. Song Sparrow	170	219 (8)	322 (3)	199 (7)	198 (4)	302 (3)	212 (4)
6. American Redstart	150	149 (10)	104 (8)	99 (9)	77 (9)	48 (13)	66 (13)
7. Nashville Warbler	141	161 (9)	58 (16)	158 (8)	50 (15)	98 (7)	164 (7)
8. Yellow-rumped Warbler	108	2359 (1)	106 (7)	1732 (1)	68 (11)	522 (1)	157 (8)
9. Common Yellowthroat	80	100 (13)	77 (11)	93 (10)	51 (14)	77 (8)	76 (12)
10. American Robin	79	394 (4)	200 (5)	346 (2)	318 (2)	299 (4)	119 (9)

6.3.2 Birds recaptured

There were 607 repeats (individuals caught within 3 months of banding at MBO) of 47 species during FMMP 2011. The number of individuals is a bit below the six-year mean of 648, but the number of species is well above the six-year mean of 41. Repeats can be subdivided into local residents caught repeatedly, and migrants captured twice or more during their stopover at MBO. Among the most frequently recaptured species (Table 6-3), only Gray Catbird was not also among the top ten species banded this fall. Many of the Black-capped Chickadees, Gray

Catbirds, Common Yellowthroats, and Song Sparrows are likely local birds, whereas most to all of the individuals of other species are transients stopping over at MBO.

Table 6-3. Top 10 species recaptured most often during FMMP 2011. These represent the same individuals caught repeatedly in some cases. .

Species	# repeats	# individuals
1. Black-capped Chickadee	124	35
2. Ruby-crowned Kinglet	66	41
3. Tennessee Warbler	55	44
4. Song Sparrow	52	42
5. White-throated Sparrow	47	39
6. Gray Catbird	35	22
7. American Redstart	25	21
8. Magnolia Warbler	24	22
9. Nashville Warbler	23	19
10. Common Yellowthroat	19	15

Repeats were most frequent the day after banding (12% of total), and 53% of repeats were within one week of banding. Discounting birds likely to be locals, individuals stopping over for a month or longer were a Hermit Thrush (37 days), a Swainson's Thrush (41 days), and 4 Nashville Warblers (33 to 44 days).

There were 38 returns of 10 species during FMMP 2011 (Table 6-4). The number of individuals almost matches the six-year mean of 39, while the count of species matches the record low from 2005 and 2006, and is well below the six-year mean of 14. The lack of a spike in returns this fall suggests that the abnormally few returns during SMMP 2011 reflected a true pattern, and was not just an artifact of below-average spring net hours.

Among the noteworthy returns this fall were five individuals last captured approximately two years earlier (Blue Jay, Veery, Indigo Bunting, Song Sparrow, and Swamp Sparrow); 14 others had not been recaptured in more than a year. The oldest bird recaptured this fall was a Song Sparrow banded on the first day of the 2006 fall season.

No foreign-banded birds were captured at MBO during FMMP 2011. The only bird banded at MBO and reported elsewhere during this period was a House Finch banded on 1 November 2010 and found in nearby Laval on 2 August 2011.

Table 6-4. List of returns captured during FMMP 2011, sorted by time elapsed.

Band number	Species	Age/sex in 2011	Age/sex at banding	Banding date	Previous capture	2011 return	Time elapsed		
2341-58042	SOSP	AHY-U	HY-U	14 Aug 09	14 Aug 09	9 Oct	2 years	1 month	25 days
2341-58846	VEER	AHY-U	HY-U	3 Aug 09	3 Aug 09	14 Aug	2 years		11 days
2351-40264	INBU	AHY-M	HY-U	21 Sep 09	21 Sep 09	1 Oct	2 years		10 days
1212-69278	BLJA	AHY-U	HY-U	3 Sep 09	20 Oct 09	17 Oct	1 year	11 months	27 days
2351-40212	SWSP	AHY-U	HY-U	13 Sep 09	13 Sep 09	19 Aug	1 year	11 months	6 days
2560-25133	BCCH	AHY-U	AHY-U	17 Aug 09	11 Feb 10	7 Oct	1 year	7 months	26 days
2600-15760	SCJU	AHY-F	SY-F	18 Apr 10	21 Apr 10	27 Oct	1 year	6 months	6 days
2241-39525	SOSP	AHY-U	HY-U	1 Aug 06	25 Apr 10	3 Oct	1 year	5 months	8 days
2500-65171	BCCH	AHY-U	HY-U	5 Aug 08	26 Apr 10	30 Sep	1 year	5 months	4 days
1272-07818	BLJA	AHY-F	HY-U	5 Sep 08	29 Apr 10	29 Sep	1 year	5 months	
2600-16648	YWAR	AHY-F	HY-U	15 Jul 09	28 May 10	18 Aug	1 year	2 months	20 days
2431-74023	SOSP	AHY-U	AHY-U	22 Apr 10	19 May 10	2 Aug	1 year	2 months	13 days
2600-16293	COYE	AHY-M	HY-U	16 Aug 10	29 Aug 10	21 Sep	1 year		22 days
2351-48619	OVEN	AHY-U	HY-U	13 Aug 10	13 Aug 10	4 Sep	1 year		21 days

Band number	Species	Age/sex in 2011	Age/sex at banding	Banding date	Previous capture	2011 return	Time elapsed	
2550-58395	TEWA	AHY-U	AHY-U	8 Aug 10	9 Aug 10	30 Aug	1 year	21 days
2600-16326	COYE	AHY-M	HY-M	18 Aug 10	28 Aug 10	13 Sep	1 year	15 days
2431-74604	SOSP	AHY-U	HY-U	25 Sep 10	25 Sep 10	7 Oct	1 year	12 days
2341-49503	SOSP	AHY-U	HY-U	24 Aug 08	4 Oct 10	10 Oct	1 year	6 days
2600-15947	BCCH	AHY-U	AHY-U	1 Sep 10	17 Oct 10	19 Oct	1 year	2 days
2600-16271	COYE	AHY-M	HY-M	11 Aug 10	28 Aug 10	27 Aug	11 months	29 days
2550-58707	AMRE	AHY-F	HY-F	26 Aug 10	26 Aug 10	24 Aug	11 months	28 days
2650-25511	SCJU	AHY-M	HY-M	1 Nov 10	1 Nov 10	26 Oct	11 months	25 days
2560-25130	BCCH	AHY-U	HY-U	4 Aug 09	24 Oct 10	28 Sep	11 months	5 days
2650-25748	SCJU	AHY-M	HY-M	25 Nov 10	25 Nov 10	30 Oct	11 months	5 days
2560-25150	BCCH	AHY-U	U-U	2 Sep 09	9 Oct 10	7 Sep	10 months	28 days
2431-74480	SOSP	AHY-F	HY-U	11 Sep 10	11 Sep 10	7 Aug	10 months	26 days
2431-74483	SOSP	AHY-U	AHY-U	11 Sep 10	11 Sep 10	6 Aug	10 months	25 days
2431-74413	SOSP	AHY-U	HY-U	14 Aug 10	11 Sep 10	4 Aug	10 months	23 days
2401-74323	INBU	AHY-M	AHY-M	19 Sep 10	19 Sep 10	2 Aug	10 months	13 days
2431-74117	DOWO	SY-M	HY-M	12 Jul 10	16 Nov 10	15 Aug	8 months	29 days
2650-25486	BCCH	AHY-U	SY-U	20 Feb 11	1 Mar 11	19 Oct	7 months	18 days
2600-15941	BCCH	AHY-U	HY-U	20 Aug 10	1 Mar 11	28 Sep	6 months	27 days
2600-15925	BCCH	AHY-U	HY-U	2 Aug 10	1 Mar 11	27 Sep	6 months	26 days
2500-65165	BCCH	AHY-U	HY-U	2 Aug 08	26 Apr 11	16 Oct	5 months	20 days
2600-15926	BCCH	AHY-U	HY-U	2 Aug 10	25 Apr 11	27 Sep	5 months	2 days
2431-74079	SOSP	AHY-U	HY-U	8 Aug 10	9 May 11	4 Oct	4 months	25 days
2421-70506	NOCA	AHY-F	HY-U	4 Aug 10	7 May 11	29 Sep	4 months	22 days
2431-74664	SOSP	AHY-U	AHY-F	26 May 11	26 May 11	21 Sep	3 months	25 days

6.3.3 Census

One or more experienced observers walked the standardized census route daily during FMMP, often recording species not otherwise documented during the course of the morning and greatly contributing to the documentation of migration through MBO. Just two species this fall were observed only through census: Clay-colored Sparrow and Field Sparrow.

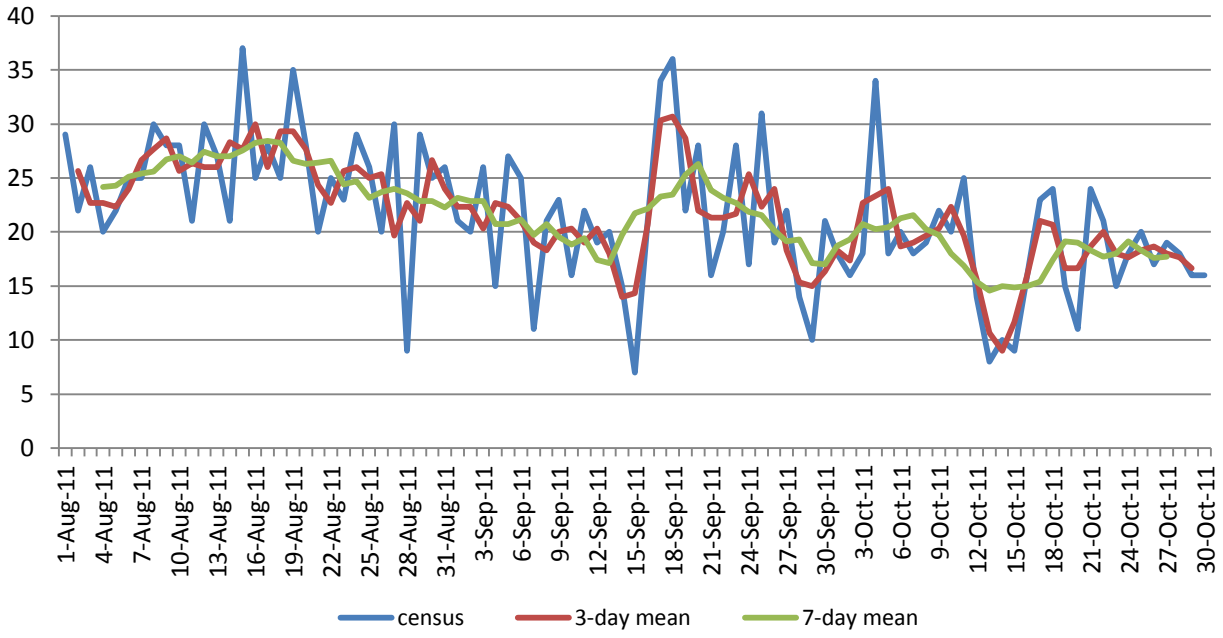

Figure 6-3. Number of species recorded on the daily census during SMMP 2011 at MBO, including a 3-day and 7-day running mean.

As shown in Figure 6-3, there was considerable daily variation in the number of species observed during the census, ranging from a low of 7 on a rainy September 15 to a high of 37 on August 15. This reflects not only actual changes in the bird population from day to day, but also variation due to weather and among observers. To account for this, 3-day and 7-day running means were calculated and plotted. Census numbers peaked in mid-August and then declined until mid-September before spiking again briefly and then tapering off to lower levels in October.

6.3.4 Daily estimated totals (DET)

The DET reflects not only banding and census data, but also all supplemental observations made by participants throughout each morning. It is particularly important for waterfowl and raptors, which are not targeted by the banding program, and are only marginally sampled by the census, since many are more active later in the morning. However, the DET is also valuable for passerines, both to monitor infrequently captured species, and as a means to evaluate the percentage of individuals of each species that are caught and banded. A record high 34 species were observed only as incidental observations, highlighting their importance for the DET. The species were: Tundra Swan, Greater Snow Goose, American Black Duck, Green-winged Teal, Common Goldeneye, Common Merganser, Great Egret, Green Heron, American Bittern, Osprey, Bald Eagle, Rough-legged Hawk, Turkey Vulture, Golden Eagle, Spotted Sandpiper, Solitary Sandpiper, American Woodcock, Herring Gull, Great Black-backed Gull, Common Tern, Yellow-billed Cuckoo, Common Nighthawk, Chimney Swift, all of the swallows (Purple Martin, Tree, Northern Rough-winged, Barn, Cliff, Bank), Eastern Kingbird, Eastern Wood-Pewee, Olive-sided Flycatcher, Eastern Bluebird, and White-winged Crossbill.

During FMMP 2011, 146 species were recorded, well above the six-year fall mean of 142, and second only to the 151 species counted during FMMP 2005. There were 20 species seen on just a single day, highlighting the importance of full daily coverage throughout the season. Tundra Swan and Common Goldeneye were new additions to the all-time MBO checklist this fall, bringing the count of species observed to 204.

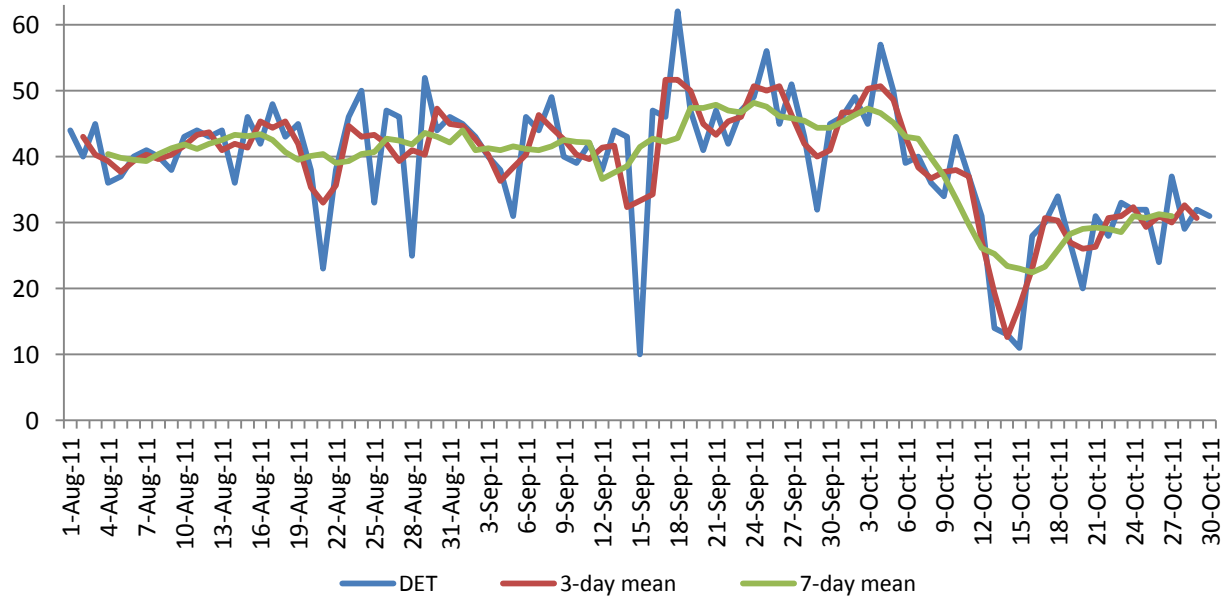

Figure 6-4. Number of species observed daily during FMMP 2011 at MBO, including a 3-day and 7-day running mean.

The highest single day total, 62 species, was recorded on September 18, while the lowest count of 10 occurred three days earlier on September 15 under heavy rain (Figure 6-4). There was considerable variation in daily estimated totals from day to day, again due to weather and observer effects. A clearer pattern is shown by the 7-day running average, which remained largely steady around 40 species for the first half of the season, increased to the mid/high 40s in late September and into early October, then declined sharply and tapered off to around 30 toward the end of the season.

This year 21 species were observed during all 13 weeks of the fall season: Canada Goose, Mourning Dove, Rock Pigeon, Downy Woodpecker, Hairy Woodpecker, Pileated Woodpecker, Northern Flicker, Blue Jay, American Crow, Common Raven, Black-capped Chickadee, White-breasted Nuthatch, American Robin, European Starling, Cedar Waxwing, Northern Cardinal, Song Sparrow, White-throated Sparrow, Red-winged Blackbird, Common Grackle, and American Goldfinch. Red-shouldered Hawk and Nashville Warbler deserve honourable mention for missing out only on the final week. Only Black-capped Chickadee, Song Sparrow, and White-throated Sparrow were banded in all 13 weeks.

6.3.5 Coverage of priority species

MBO has produced a list of 62 target species for priority monitoring (Gahbauer and Hudson 2008). The list is based on priority rankings proposed by Bird Studies Canada, with an emphasis on species poorly studied by the Breeding Bird Survey due to their northern breeding distribution, and on neotropical migrants, recognized as being at elevated conservation risk due to threats to their wintering grounds. The MBO list has been modified to eliminate western species not expected to occur at the site.

Table 6-5. Summary of priority species observed and banded during SMMP 2011. Detailed category definitions are provided in Gahbauer and Hudson (2008).

	Priority A	Priority B	Priority C	Priority D
Number of species in category	15	10	18	19
Number of species observed	14	10	18	19
Number of species banded	14	9	14	14
Number of individuals banded	681	655	513	500

All but one of the species on the MBO priority list were observed during FMMP 2011 (Savannah Sparrow was missed), and 82% were banded (Table 6-5). Nearly 84% of individuals banded were priority species, which is near the low end of the range of 83% to 91% in previous years. Of the top 10 species banded at MBO during FMMP 2011, all but Nashville Warbler are designated as priority species, including 5 that are priority A or B, indicating the program is effective at documenting these otherwise poorly monitored birds.

6.3.6 Net productivity

As in previous seasons, the productivity of nets during FMMP 2011 was assessed. Table 6-7 summarizes the usage and productivity of all nets. The nets are clustered into three main groups. C and D (six nets total) are along the east and north edges of Stoneycroft Pond. Four nets sample the shrubby areas east of Stoneycroft Pond (A and E). H and B/N (six nets total) are along the back ponds. Under normal weather and personnel conditions, all nets are operated for five hours daily. However, the B/N nets are more vulnerable to wind, and are closed when conditions are unfavourable. They are also omitted when human resources are limited and/or bird volume is sufficient to warrant operations being scaled back, resulting in a core group of 12 nets (C-A-D-E-H) that allows for sampling from each area while minimizing walking time.

The overall capture rate for FMMP 2011 was 43.6 new birds per 100 net hours, much lower than the rate of 112.7 in 2010, and far below the six-year mean of 79.2. An additional 10.1 birds per 100 net hours were recaptured.

The relative effectiveness of nets varies from year to year, although typically the A and H nets along with C2 and E2 are the most productive in fall. This year C2 was exceptionally productive, and was the top net for the first time. It was followed by E2, H1, and B3, which had never previously ranked higher than tenth. H2 rounded out the top five, and reflecting that net's generally high value, that was the lowest it has ever ranked in fall. The B/N nets overall were more productive than ever before, with N1 and N3 also with average or above average capture rates this fall; only B2 was typically slow. The capture rate at E1 was above average for the season, for the first time ever in fall. Overall the D nets were by far the weakest performers this fall, although both A nets also yielded atypically below average results.

Of note, three new net types were tested this fall at A2, E1, and N1 (the Manomet net at D1 was not in place long enough to evaluate). The capture rate of the Avinet sample at A2 was lower than usual, perhaps reflecting the shallower shelves, although the Spidertech net at A1 also was below average this fall. The results at E1 were better than usual, suggesting that the Eastern Bird Banding Association net was effective. The capture rate at N1 was somewhat above normal, but not as much so as nearby nets N3 and B3, making it difficult to draw conclusions about the Ecotone net, although it too had shallower pockets and was substantially less successful than adjacent nets at catching larger birds. The H nets were quite faded, yet still effective, indicating that net colour may not be critical. New nets will be required in 2012; based on the limited trials, continued use of Spidertech nets is preferred, but the Eastern Bird Banding Association nets hold the most promise as an alternative.

Table 6-7. Net usage and capture rates during FMMP 2011

Net	Hours open	New captures	Repeats+ Returns	Total captures	Birds / 100 net hours	
					New	Total
A1	406.4	171	25	196	42.1	48.2
A2	406.4	133	33	166	32.7	40.8
A – TOTAL	**812.8**	**304**	**58**	**362**	**37.4**	**44.5**
B2	382.9	64	7	71	16.7	18.5
N1	382.9	168	66	234	43.9	61.1
N3	382.9	177	54	231	46.2	60.3
B3	382.9	217	66	283	56.7	73.9
B/N – TOTAL	**1531.6**	**626**	**193**	**819**	**40.9**	**53.5**
C1	407.9	159	35	194	39.0	47.6
C2	407.9	378	56	434	92.7	106.4
C – TOTAL	**815.8**	**537**	**91**	**628**	**65.8**	**77.0**
D1	401.4	57	9	66	14.2	16.4
D2	401.4	50	13	63	12.5	15.7
D3	401.4	89	21	110	22.2	27.4
D4	401.4	91	12	103	22.7	25.7
D – TOTAL	**1605.6**	**287**	**55**	**342**	**17.9**	**21.3**
E1	406.1	206	73	279	50.7	68.7
E2	406.1	325	68	393	80.0	96.8
E – TOTAL	**812.2**	**531**	**141**	**672**	**65.4**	**82.7**
H1	407.9	289	61	350	70.9	85.8
H2	407.9	214	46	260	52.5	63.7
H – TOTAL	**815.8**	**503**	**107**	**610**	**61.7**	**74.8**
SUBTOTAL	**6393.1**	**2788**	**645**	**3433**	**43.6**	**53.7**
Unknown	-	1	1	2	n/a	n/a
GRAND TOTAL	**6393.1**	**2789**	**646**	**3435**	**43.6**	**53.7**

6.4 Summary and analysis

Although it was the wettest fall since 2005, relatively little of the rain came during the morning, and a record amount of banding effort was possible. However, the total of 2789 individuals banded was the lowest ever for fall, even though the 77 species banded was above average. While numbers were expected to be lower this year, given the apparent trend for higher totals in even years, the total was still more than 10% below the odd-year average of 3164. The peak day of the season was August 26, with 112 individuals banded, and after the first five weeks, the cumulative total was higher at that point than in any previous season. However, the traditional mid-September to mid-October peak of migration never materialized this year, with far below average banding totals week after week.

As in spring, warblers dominated the season, comprising 49% of birds banded, and six of the top ten species. More Magnolia Warblers (252) were banded than any other species, the first time this species has topped the fall list, and by far the lowest "winning total" of any fall. Except for a record flight of Chipping Sparrows, all other sparrows were unusually scarce this fall, with record low counts for three species and near record lows for two others, most notably Slate-colored Junco with just 58 individuals banded compared to a fall average of 369 over the past three years. Also especially surprising was the scarcity of American Goldfinches, with just 17 banded, compared to a previous record low of 35, and a fall average of 65.

Despite the lower number of birds banded, repeats were only slightly below average. As usual, a few species (most notably Hermit and Swainson's Thrushes, and Tennessee and Nashville Warblers) stopped over for extended periods as molt migrants. Returns were close to average, and included 19 individuals not documented for more than one year, perhaps including a few of those missed in spring.

The number of species observed this fall was 146, which is above average, and second only to the 151 counted in 2005. Included were two new species for the site, Tundra Swan and Common Goldeneye. The 62 species observed on September 18 was a record high for any day in fall. With fewer birds captured, the bander-in-charge and other volunteers were able to spend more time outside observing; considering that 20 species were seen on just one day this fall, it is easily possible that some of those might have been missed in a year with higher banding totals. This emphasizes the need for observers to be alert not only during census, but throughout each morning, and for the bander-in-charge to ensure that at least one volunteer each day is keeping an eye out for birds overhead in particular.

7. Northern Saw-whet Owl Migration Monitoring Program

Nocturnal banding of Northern Saw-whet Owls has been undertaken at MBO during fall migration annually since 2004, except in 2006 and 2008. For the first four years, efforts were sporadic, largely limited by availability of banders. In 2010, an effort was made to standardize the program by focusing on full coverage of a six-week season from late September to early November, omitting only nights compromised by rain or high winds. A similar approach was taken in 2011, covering the final five weeks of the Fall Migration Monitoring Program and extending one week beyond (September 26 – November 6). Banding takes place using a roughly elliptical array of nets including five 60-mm owl nets O1 to O5, and 30-mm passerine nets E1 and E2. A standard audiolure is played on a FoxPro broadcaster to attract owls. The standard banding period is 4 hours beginning 30 minutes after sunset, but when conditions are promising, non-standard banding often continues later into the night.

7.1 Effort

Banding was possible on 35 (83%) of 42 nights during the standard season, although in some cases only by starting one to several hours late after rain and/or wind had subsided. Additionally, banding took place on 3 supplementary nights between November 7 and 12, in an attempt to identify the end of migration.

7.2 Site conditions

Temperatures were normal to begin the season, but then were a bit above average in weeks 11 and 12, and much warmer than usual throughout the final three weeks, with conditions more typical of mid-October than November. The first half of the season was relatively wet, while the second half was quite dry. Weather had the greatest impact on owling in mid-October, when four of the six nights between October 14 and 19 were lost to rain and wind.

Table 7-1. Weather conditions during the 2011 Northern Saw-whet Owl Monitoring Program, by week.

	9 *Sep 26-Oct 2*	10 *Oct 3-9*	11 *Oct 10-16*	12 *Oct 17-23*	13 *Oct 24-30*	14 *Oct 31-Nov 6*	15 *Nov 7-13*	16 *Nov 14-20*	SEASON
Mean daily high (^{o}C)	19.4	17.6	18.0	12.2	8.9	11.1	12.3	10.9	13.8
Mean daily low (^{o}C)	11.0	7.6	9.8	6.7	0.2	-0.3	3.6	1.9	5.1
Mean daily temp (^{o}C)	15.2	12.6	13.9	9.5	4.6	5.4	8.0	6.4	9.5
Highest temp (^{o}C)	25	24	24	14	16	16	16	19	25
Lowest temp (^{o}C)	7	1	8	3	-4	-2	1	-2	-4
# days with rainfall	5	2	5	6	2	1	2	3	26
Total rain (mm)	52	3	39	27	3	2	8	9	143

7.3 Results

The only species captured this year was Northern Saw-whet Owl, although Eastern Screech-Owl, Long-eared Owl, and Great Horned Owl were heard in the area, as in other years. The overall capture rate of 7.7 owls per 100 net hours was lower than in 2010 (9.4).

Table 7-2. Summary results of the 2011 Northern Saw-whet Owl Monitoring Program, by week.

	9	10	11	12	13	14	15	16	TOTAL
# owls banded	2	75	15	64	30	9	4		199
# owls repeat			2	3		2			7
# owls return	1	1							2
# owls foreign		2	2	4	1				9
# net hours	149.3	399.7	231.6	327.3	448.0	500.5	456.7	75.3	2588.4
Owls banded / 100 hrs	1.3	18.8	12.2	19.6	6.7	1.8	0.9	0	7.7

7.3.1 Birds banded

A record 199 Northern Saw-whet Owls were banded this fall, 89% of them between October 4 and 27. The biggest movements came after the passage of large and persistent low fronts. Over three nights, October 4-6, 63 owls were captured, following five days of rain during which only two partial nights of owling were possible. Similarly, 17 owls were banded on October 18, after another four day period of rain, and another 51 owls were captured over the following five nights. That period included a record capture of 32 owls on the night of October 22, including two foreign birds. There were only 6 nights out of 35 during the standard season without any owls banded.

Just under half of this year's owls were hatch-year birds, while another 40% were second-year, and 12% were older, a somewhat different breakdown compared to 70% / 20% / 10% last year. As usual, females dominated (81%), with only a few males (7%), and a fair number of intermediates that could not be sexed (12%).

7.3.2 Birds recaptured

Two owls banded at MBO in 2010 were recaptured this fall (Table 7-3). One of them was among the few individuals recaptured several days after banding last fall, and combined with this year's recapture, this suggests it might be a local resident. The other appears to have undergone a sex change, highlighting the occasional risk of using weight as an indicator of sex! Additionally, seven of the owls banded this fall were recaptured between 2 and 17 days later.

Table 7-3. List of Northern Saw-whet Owl returns captured in 2011, sorted by time elapsed.

Band number	Species	Age/sex in 2011	Age/sex at banding	Banding date	Previous capture	2011 return	Time elapsed	
1014-18020	NSWO	SY-F	HY-F	2 Oct 10	7 Oct 10	26 Sep	11 months	19 days
0924-66214	NSWO	SY-M	TY-F	7 Nov 11	7 Nov 11	10 Oct	11 months	3 days

A record 9 foreign owls were recaptured at MBO this fall (Table 7-4). Three of them were from Prince Edward Point Bird Observatory in Ontario, one of the busiest Northern Saw-whet Owl banding stations anywhere. The one from Thunder Cape Bird Observatory in northwestern Ontario is the longest distance recovery of any bird to date at MBO. Four others were originally banded in northeastern states, while the origin of the last has not yet been determined.

Table 7-4. List of foreign Northern Saw-whet Owls captured in 2011, sorted by time elapsed.

Band number	Age/sex in 2011	Age/sex at banding	Banding date	2011 capture		Time elapsed		Banding location	Distance (km)
1014-01834	TY-F	HY-F	25 Oct 09	6 Oct	1 year	11 months	11 days	Pr. Ed. Point ON	290
0924-64977	TY-F	SY-U	8 Oct 10	30 Oct	1 year		22 days	Thunder Cape ON	1180
1014-08661	SY-F	HY-F	17 Oct 10	22 Oct	1 year		5 days	Pr. Ed. Point ON	290
1014-07024	ASY-F	ASY-F	13 Oct 10	11 Oct		11 months	28 days	Hampshire MA	360
1014-01881	ASY-U	n/a	28 Oct 09	22 Oct		11 months	24 days	Pr. Ed. Point ON	290
1014-33312	SY-F	HY-F	13 Oct 10	4 Oct		11 months	21 days	Fulton Cty PA	640
1014-26965	TY-F	ASY-F	1 Nov 10	21 Oct		11 months	20 days	Friedensburg PA	570
1014-12027	ATY-F	ASY-F	10 Nov 10	11 Oct		11 months	1 day	Bentonville VA	830
1014-33802	SY-F	n/a	n/a	23 Oct		n/a		n/a	n/a

7.3.3 Net productivity

The nets used for owl banding include five (O1-O5) that are 60-mm nets used exclusively for the owl program, and two (E1-E2) that are 30-mm nets shared with the Fall Migration Monitoring Program. O1-O4 and E1 are all within 10 m of the audiolure, while O5 is approximately 15 m away, and E2 is nearly 30 m away. O4 is entirely within a conifer grove, while O1-O3, O5, and E1 are along the periphery of the grove, and E2 is within a cluster of hawthorns.

Capture rates varied substantially among nets (Table 7-5). O1 and O4 accounted for more than half of all captures (23% and 32% respectively); notably these nets are oriented east-west, while the other three nets near the audiolure are oriented north-south, and on average comprised 10% of captures each. The more distant nets were ranked fifth and last in terms of total captures. The two owls caught during diurnal FMMP operations were not included in analysis.

Orientation, cover, proximity to the audiolure, and mesh size are all likely to have an influence on capture rate, and it is difficult to separate the relative influence of these factors with results from just seven nets. The most exposed nets (O2, O3, O5) all had significantly below-average results, but O1 is nearly as open yet was the second-most productive. Despite being in line with the audiolure rather than perpendicular to it, E1 was the third-most productive net, suggesting that the smaller mesh size was still effective at capturing owls. Given the small size of the conifer grove, there is limited potential to adjust net placement, although if O5 continues to have limited value, consideration might be given to moving it to another location further from the audiolure but in denser cover.

Table 7-5. Net usage and capture rates during 2011 Northern Saw-whet Owl monitoring.

Net	Hours open	New captures	Repeats+ Returns	Total captures	Birds / 100 net hours	
					New	Total
O1	374.0	46	4	50	12.3	13.4
O2	374.0	19	4	23	5.1	6.1
O3	374.0	15		15	4.0	4.0
O4	374.0	65	4	69	17.4	18.4
O5	374.0	9	1	10	2.4	2.7
O - TOTAL	**1870.0**	**154**	**13**	**167**	**8.9**	**8.9**
E1	359.2	26	1	27	7.2	7.5
E2	359.2	17	4	21	4.7	5.8
E - TOTAL	**718.4**	**43**	**5**	**48**	**6.0**	**6.7**
SUBTOTAL	**2588.4**	**197**	**18**	**215**	**7.6**	**8.3**
FMMP nets	n/a	2	-	2	n/a	n/a
GRAND TOTAL	**2588.4**	**199**	**18**	**217**	**7.7**	**8.4**

One of the two Northern Saw-whet Owls banded during daylight hours in October. (Photo by Simon Duval)

8. Other MBO programs

Although the seasonal monitoring programs are the primary focus at MBO, they also provide opportunities to pursue a number of secondary objectives, including education and training, improvement identification techniques, and more detailed research on particular species.

8.1 Education and training

MBO provides ongoing training in avian research techniques to McGill University students and other interested individuals. This is implemented through an annual spring internship, and training throughout the spring and fall programs in all aspects of migration monitoring from field identification skills and data recording to practice in extraction and banding. To keep learning opportunities accessible, we continued in 2011 to limit the number of volunteers per day to two experienced extractors and up to three additional assistants, who could get one-on-one training from either the extractors or the bander-in-charge. Experienced extractors able to work independently are a limiting factor for banding operations, and thus helping volunteers improve their skills at extraction is a priority at MBO. However, observers with good identification skills are also critical to effective migration monitoring, and greater effort needs to be made to attract and retain experienced birders as volunteers, as well as training newer volunteers in this way.

There is also an ongoing effort to share results with the local, national, and international communities, to illustrate how migration monitoring data can contribute to understanding and conservation of boreal birds. This year we again welcomed several groups for tours of MBO, including members of Bird Protection Quebec, Club d'ornithologie de la région des Moulins, and Club d'ornithologie de Mirabel. Local presentations on MBO research were given at meetings of Bird Protection Quebec, Société d'Ornithologie de Lanaudière, and the McGill Wildlife Association. An overview of MBO's first six years of migration monitoring was presented at the annual meeting of the Society of Canadian Ornithologists in Moncton, New Brunswick, and a two-year update on research was given at the biennial meeting of the Canadian Migration Monitoring Network in Penticton, British Columbia. The MBO website attracted 38,000 visitors during the year, from over 130 countries.

8.2 Photo documentation

MBO continues to photo document all rarities captured, as well as any individuals showing abnormalities, such as aberrant pigmentation or moult, deformities, or healed injuries. Photos were also taken throughout the year to augment MBO's online resource for bird identification, posted at www.migrationresearch.org/mbo/id/index.html, which features 63 species accounts, 35 of which were updated with new content in 2011. The aim is continue developing this collection, to provide diagnostic photos of the upper body, wing, and tail of each age and sex class of every species banded regularly at MBO. These photos, supplemented by related commentary pointing out key differences between ages and sexes, are intended as a complement to the information presented by Pyle (1997).

8.3 Research projects

Especially for species banded in large numbers at MBO, there is potential to analyze standard morphometric data, or collect additional measurements that could be analyzed to improve the accuracy of ageing/sexing techniques or provide other insights. Among the topics under investigation in 2011 were the colour of the mouth lining in Black-capped Chickadees, tail spot size in Magnolia Warblers, and tail colour and pattern in American Goldfinches. The mouth lining study will be expanded to Blue Jays and vireos in 2012, while there is potential to refine the Magnolia Warbler study with additional data or genetic testing to assess the reliability of plumage features. Brief summaries of past projects and a list of current research is maintained at http://www.migrationresearch.org/mbo/researchtopics.html.

9. Acknowledgments

The operation of MBO is possible only through the support of many dedicated people volunteering their time throughout the year. Over 3900 hours of service on site were contributed by 120 participants in our migration monitoring, MAPS, and winter monitoring programs. While many volunteers fulfilled multiple roles, they are listed below only under the first heading that applies to them. Special thanks to those who put in extra time fundraising, planning, and assisting with site maintenance, and especially to the banders-in-charge, who each contributed additional hours off-site to coordinate volunteers, manage data, and generate website updates.

Executive Director: *The licensed master permit holder, responsible for overseeing research activities.*
Marcel Gahbauer

Director: *Sub-permit holder and bander-in-charge (see below for details), responsible for coordinating volunteers, implementing policies, updating protocols, overseeing finances, and long-term planning*
Gay Gruner

Coordinator: *Sub-permit holder and bander-in-charge (see below for details), responsible for data entry and reporting, site maintenance, and implementation of research projects*
Simon Duval

Banders-in-charge: *Sub-permit holder, responsible for directing the activities of volunteers, ensuring adherence to protocols, prioritizing the safety of birds at all times, banding birds, and directly supervising other trainees who are banding birds.*
Bob Barnhurst, Barbara Frei, Lance Laviolette

Banders-in-training: *Experienced volunteers trained specifically in extraction, capable of safely removing birds from nets with minimal or no supervision These volunteers are also seasoned observers able to conduct the census and are being trained as banders.*
Christine Barrie, Nicki Fleming, Rodger Titman, Matthew von Bornhoft

Extractors: *Experienced volunteers trained specifically in extraction, capable of safely removing birds from nets with minimal or no supervision.*
Nicolas Bernier, Leah Den Besten, Amélie Drolet, Andrée Dubois-Laviolette, Steve Dumont, Marie-France Julien, Marie-Melissa Kalamaras, Lima Kayello, Lisa Keelty, Kristen Keyes, Le Duing Lang, Meghan Laviolette, Alex Stone

Census / observation leaders: *Experienced birders able to recognize the majority of local species by sight and sound, responsible for conducting the daily census and playing a leadership role in observing birds throughout the morning, and assisting less experienced volunteers with identification.*
Mike Beaupré, Sue Bishop, Joel Coutu, Jean Demers, Frédéric Hareau, Jeff Harrison, Barbara and Don MacDuff, Betsy McFarlane, Chris Murphy, Greg Rand, Ahmad Shah, Clémence Soulard

Assistants: *Volunteers and visitors of all levels, responsible for recording data, transporting birds, providing direct assistance to extractors and banders as requested, learning to become extractors, banders, or censusers, and helping with any other observation/monitoring/maintenance tasks that arise.*
David Anderson, Kenzie Azmi, Eva Banlaki, Nathalie Barbeau, Benoit Berard, David Bird, Geneviève Blanchet, Kaitlin Broadhurst, Skye Burgan, Lindsay Burkhart, Alistair Chan, Shannon Christianson, Chris Cloutier, Stephanie Cote, Ian Craig, David Davey, Rui de Jesus, Andrée-Anne Deschamps, Marianna Dimauro, Sarah Dixon, Philippe Dunn, Réjean Duval, Tammy Elliott, Kristian Fidrych, Maryse Forest-Tremblay, Liette Fortier, Thomas Glover, Ian Goodfellow, Sean Goodwin, Samantha Guerard, Alison Hackney, Myriam Haineault, Lindsey Jones, Greg Kaiman, Diana Kirkwood, Tony James

Kouach, Erik Kudelka, Benoit Laliberté, Noemie Laplante, Louise Lebel, Catherine Leclerc, Christie Lovat, Marie-Pier Lussier, Charlotte Maloney, Francine Marcoux, Daniel Martin, Pierre Molina, Kevin Mongey, Armin Nazemi, Joey O'Connor, Kenn Olivier, Emily Pedersen, Scott Pemberton, Casey Pendergast, Alysse Perrault, Benoit Piquette, Kevin Poirier, Khaled Rashid, Michelle Reeves, Charles Reznier, Mary Robichaud, Sabrina Rochefort, Amanda Rollinson, Lisa Rosenberger, François Rousseaux, Catherine Russell, Sarah Saldanha, Kate St-Jean, Marilou Skelling, Bonnie Soutar, Gordon Southward, Cat Spina, Patricia Stotland, Alexandra Summer, Pierrot Tellier-Machabee, Elise Titman, Alex Tran, Monique Venne, Anne-Marie Von Geenhoven, Jessica Ward, Brian Wilson, Tim Zarins, Tiera Zukerman

Maintenance: *Last but certainly not least – responsible for maintaining the facilities and trails in good and safe working condition*
Malcolm Johnson

In addition, we extend our sincere thanks to all who donated materials or funds to MBO in 2011, especially:

This year's five Baillie Birdathon Teams, who covered various parts of Ontario and Quebec in May, and raised nearly $10,000 in support of MBO's operations in 2012:

Laughing Bonapartes: Martin Bowman, Joel Coutu, Alain Goulet, Frédéric Hareau
MBO Green Team: Mike Beaupré, Simon Duval, Gay Gruner, Barbara MacDuff, and Chris Murphy
Ottawa Team: Marcel Gahbauer and Marie-Anne Hudson
Raven Loon-a-ticks: David Bird, Simon Duval, Marcel Gahbauer, and Rodger Titman
Red-eyed Wearios: Sue Bishop, Averill Craig, Gay and Peter Gruner, Betsy McFarlane, and Ahmad Shah

Bird Protection Quebec, for a donation in support of MBO, publicity, and continuing to encourage members to become MBO volunteers
Canada Steamship Lines, for a donation in support of MBO
Centre de conservation de la faune ailée, for donating all seeds for the winter feeders
Environment Canada, for a donation in support of MBO
Avian Science and Conservation Centre, for logistical and equipment support

10. References

American Ornithologists' Union. 2011. The AOU Check-list of North American Birds. Available at http://www.aou.org/checklist/north/full.php

Gahbauer, M.A. 2010. McGill Bird Observatory Five-Year Report #1: 2005-2009. Migration Research Foundation, Ste-Anne-de-Bellevue QC, 145 pp. Available at http://www.migrationresearch.org/documents/MBO5-yearreport2005-2009.pdf

Gahbauer, M.A. and M-A. Hudson. 2011. McGill Bird Observatory Field Protocol for Migration Monitoring Program (Revised). Migration Research Foundation, Ste-Anne-de-Bellevue QC, 23 pp. Available at: http://www.migrationresearch.org/mbo/documents/MBO_Protocol_2011.pdf

Pyle, P. 1997. Identification Guide to North American Birds, Part 1. Slate Creek Press, Bolinas, California.

Appendix A. Seasonal occurrence of species

The charts below summarize the pattern of occurrence of each of the 163 species observed during the 2011 Spring and/or Fall Migration Monitoring Programs, which had daily coverage for 10 and 13 weeks, respectively. Brief text-only summaries are also provided for the 7 species observed during the 2011 winter and/or summer monitoring periods, but missed during migration monitoring. Species are listed according to the latest taxonomic revisions by the American Ornithologists' Union (AOU 2011). The # processed includes: individuals banded, returns, and repeats, in that order (or banded only, if no returns or repeats occurred). Summary notes accompanying each species overview, describing patterns of occurrence throughout the period covered in this report (31 October 2010 to 30 October 2011), and often comparing them to data presented in *MBO Five-year Report #1: 2005-2009* (Gahbauer 2010).

GSGO: Greater Snow Goose / Oie des neiges (*Chen caerulescens atlanticus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	501.43	36.43		21.43	0.14						**55.94**
# DAYS OBSERVED	3	2		1	1						**7**
	FIRST OBSERVED: April 1			LAST OBSERVED: April 29			PEAK DATE: April 1			NUMBER OF INDIVIDUALS: 3250	

	AUGUST				SEPTEMBER				OCTOBER					
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY									25.43					**1.96**
# DAYS OBSERVED									2					**2**
	FIRST OBSERVED: October 1				LAST OBSERVED: October 2				PEAK DATE: October 2			NUMBER OF INDIVIDUALS: 135		

Notes: Spring migrants were somewhat earlier than usual, except for a small flock in week 4 and a lone straggler on April 29. The only two fall observations were on the first two days of October, also somewhat earlier than normal. No winter or summer observations.

CACG: Cackling Goose / Bernache de Hutchins (*Branta hutchinsii*)

	AUGUST				SEPTEMBER				OCTOBER					
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY											0.43			**0.03**
# DAYS OBSERVED											3			**3**
	FIRST OBSERVED: October 10				LAST OBSERVED: October 15				PEAK DATE: Oct 10, Oct 12, Oct 15			NUMBER OF INDIVIDUALS: 1		

Notes: The only observations this year were three lone individuals flying with flocks of Canada Geese in mid-October.

CANG: Canada Goose / Bernache du Canada (*Branta canadensis*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	454.43	509.57	52.14	125.86	95.57	142.86	119.71	9.86	7.00	35.57	**155.26**
# DAYS OBSERVED	6	7	7	7	7	7	7	7	6	7	**68**
	FIRST OBSERVED: March 29			LAST OBSERVED: June 5			PEAK DATE: April 4			NUMBER OF INDIVIDUALS: 784	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY		1.00	1.43	5.29	35.57	65.29	122.43	147.29	2361.0	928.0	306.29	682.14	485.86	**395.51**
# DAYS OBSERVED		2	2	5	7	7	7	7	7	7	7	7	7	**72**
	FIRST OBSERVED: August 11				LAST OBSERVED: October 30				PEAK DATE: October 1			NUMBER OF INDIVIDUALS: 10300		

Notes: Spring numbers were unusually low in weeks 3 to 6, but then remained elevated through week 7, by which time the flocks have usually disappeared. The spike in numbers in the final week of spring was also highly unusual. The fall pattern was fairly typical, although numbers began to build earlier in September than usual, and the peak in week 9 was higher than ever before, thanks to a record count of 10,300 individuals streaming past throughout the morning of October 1. Numbers were also above average in winter, with a mean daily count of 150 individuals, largely due to more than 5000 individuals counted during the 10 November visits. Observed during just the first two of the 7 summer visits.

TUSW: Tundra Swan / Cygne siffleur (*Cygnus columbianus*)

	AUGUST				SEPTEMBER				OCTOBER					
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY								0.14						**0.01**
# DAYS OBSERVED								1						**1**
	FIRST OBSERVED: September 19				LAST OBSERVED: September 19				PEAK DATE: September 19			NUMBER OF INDIVIDUALS: 1		

Notes: A single individual seen flying fairly low on September 19. This was the first observation for the site, increasing the MBO checklist to 203 species.

WODU: Wood Duck / Canard branchu (*Aix sponsa*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY		13.00	9.71	8.14	5.43	6.29	7.00	5.14	4.71	6.43	**6.59**
# DAYS OBSERVED		7	7	7	7	7	7	7	7	7	**63**
	FIRST OBSERVED: April 4			LAST OBSERVED: June 5			PEAK DATE: April 7			NUMBER OF INDIVIDUALS: 26	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	4.43	2.86	2.14	4.86	1.86	1.71		4.29	4.14	4.86	1.86	4.71	0.43	**2.93**
# DAYS OBSERVED	7	7	6	6	5	4		3	6	6	5	5	2	**62**
# PROCESSED														
	FIRST OBSERVED: August 1				LAST OBSERVED: October 29			PEAK DATE: September 22			NUMBER OF INDIVIDUALS: 21			

Notes: Missing during the first week of spring for just the second time, but then seen daily throughout the rest of the season, with numbers around normal. Fall observations split in two, with near daily observations in August tapering off in early September, and then a gap of a week before sightings resumed in week 8, leading to speculation that perhaps the resident Wood Ducks moved out by mid-season, and the birds later on were migrants from elsewhere. There was only one winter record, a lone lingering individual on November 6. Observed during just the first two of the MAPS visits in summer. Banded for the first time this year, on August 8, an incidental capture of 3 individuals outside of the MMP protocol. Wood Duck became the 108th species banded at MBO.

GADW: Gadwall / Canard chipeau (*Anas strepera*)

Notes: The only observation this year was a lone individual on November 6, the first sighting at MBO since May 2009.

AMWI: American Wigeon / Canard d'Amérique (*Anas americana*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY						0.29					**0.03**
# DAYS OBSERVED						1					**1**
	FIRST OBSERVED: May 8			LAST OBSERVED: May 8			PEAK DATE: May 8			NUMBER OF INDIVIDUALS: 2	

Notes: The only observation this year was two individuals on May 8, the first sighting at MBO since April 2009.

ABDU: American Black Duck / Canard noir (*Anas rubripes*)

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY									0.14					**0.01**
# DAYS OBSERVED									1					**1**
	FIRST OBSERVED: October 2				LAST OBSERVED: October 2			PEAK DATE: Oct 2			NUMBER OF INDIVIDUALS: 1			

Notes: Missed in spring for the second time in three years, and for the first time limited to a single sighting in fall. There was only one other record this year, a lone individual observed on November 20.

MALL: Mallard / Canard colvert (*Anas platyrhynchos*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	1.14	9.43	6.71	6.43	6.43	6.29	6.57	3.14	3.00	4.57	**5.37**
# DAYS OBSERVED	2	7	7	7	7	7	7	7	7	6	**64**
	FIRST OBSERVED: March 31			LAST OBSERVED: June 5			PEAK DATE: April 10			NUMBER OF INDIVIDUALS: 27	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.14	0.29	0.29	0.43		0.14	0.14	0.57	9.71	7.14	0.57	8.86	22.71	**3.92**
# DAYS OBSERVED	1	2	2	1		1	1	3	4	5	2	6	7	**34**
	FIRST OBSERVED: August 5				LAST OBSERVED: October 30			PEAK DATE: October 24			NUMBER OF INDIVIDUALS: 51			

Notes: Present weekly in spring, peaking in week 2, and then with consistent numbers until mid-May before tapering off somewhat. As usual, less common in the first half of fall, but with numbers picking up earlier than usual in week 9. There was an unusual dip in numbers in week 11, but for the fifth year in a row, numbers peaked in the final week of fall. Winter observations were limited to 9 of 10 visits in November. Observed during 5 of 7 MAPS visits in summer.

NOPI: Northern Pintail / Canard pilet (*Anas acuta*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	1.29	4.57									**0.59**
# DAYS OBSERVED	1	2									**3**
	FIRST OBSERVED: March 31			LAST OBSERVED: April 5			PEAK DATE: April 5			NUMBER OF INDIVIDUALS: 30	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY										0.14			1.57	**0.13**
# DAYS OBSERVED										1			1	**2**
	FIRST OBSERVED: October 6				LAST OBSERVED: October 27			PEAK DATE: October 27			NUMBER OF INDIVIDUALS: 11			

Notes: Three sightings within the first 9 days of spring were promising, but after that no more were seen until early October. Both the spring and fall counts are below the long-term means, but consistent with the relative scarcity of the species over the past couple of years. No winter or summer sightings.

AGWT: American Green-winged Teal / Sarcelle d'hiver (*Anas crecca carolinensis*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY		0.71	0.29								**0.10**
# DAYS OBSERVED		1	1								**2**
	FIRST OBSERVED: April 6			LAST OBSERVED: April 12			PEAK DATE: April 6			NUMBER OF INDIVIDUALS: 5	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY											0.14			**0.01**
# DAYS OBSERVED											1			**1**
	FIRST OBSERVED: October 11				LAST OBSERVED: October 11			PEAK DATE: October 11			NUMBER OF INDIVIDUALS: 1			

Notes: Scarce again this year, with just two observations six days apart in the first half of April, and a lone bird observed on October 11. No winter or summer sightings.

COGO: Common Goldeneye / Garrot à oeil d'or (*Bucephala clangula*)

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY											0.14			**0.01**
# DAYS OBSERVED											1			**1**
	FIRST OBSERVED: October 1				LAST OBSERVED: October 1			PEAK DATE: October 1			NUMBER OF INDIVIDUALS: 1			

Notes: A single individual seen by two observers on October 1, flying fairly high but readily identifiable. This was the first observation for the site, increasing the MBO checklist to 204 species.

HOME: Hooded Merganser / Harle couronné (*Lophodytes cucullatus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY		0.57			0.71	0.57				0.14	**0.20**
# DAYS OBSERVED		2			2	2				1	**7**
	FIRST OBSERVED: April 8			LAST OBSERVED: June 1			PEAK DATE: April 29			NUMBER OF INDIVIDUALS: 3	

Notes: More observations this spring than in any previous season, spread over a span of nearly two months. No winter or summer sightings.

RBME: Red-breasted Merganser / Harle huppé (*Mergus serrator*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY				0.43							**0.04**
# DAYS OBSERVED				1							**1**
	FIRST OBSERVED: April 24			LAST OBSERVED: April 24			PEAK DATE: April 24			NUMBER OF INDIVIDUALS: 3	

Notes: A flock of 3 individuals passing overhead on April 24 was only the third record in the history of MBO.

COME: Common Merganser / Grand Harle (*Mergus merganser*)

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY					0.14									**0.01**
# DAYS OBSERVED					1									**1**
	FIRST OBSERVED: August 29				LAST OBSERVED: August 29			PEAK DATE: August 29			NUMBER OF INDIVIDUALS: 1			

Notes: A lone individual flying overhead on August 29 was the only record this year, and marked the third consecutive year with at least one observation during fall.

RUGR: Ruffed Grouse / Gélinotte huppée (*Bonasa umbellus*)

Notes: Observations this year limited to a lone individual seen on February 21 and March 14.

COLO: Common Loon / Plongeon huard (*Gavia immer*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY				0.57	0.57	1.29	0.43	0.14	0.14		**0.31**
# DAYS OBSERVED				3	3	5	2	1	1		**15**
	FIRST OBSERVED: April 19			LAST OBSERVED: May 25		PEAK DATE: May 2			NUMBER OF INDIVIDUALS: 5		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY				0.14				0.14	0.43	0.43				**0.09**
# DAYS OBSERVED				1				1	2	2				**6**
	FIRST OBSERVED: August 25				LAST OBSERVED: October 7			PEAK DATE: Oct 1, Oct 5			NUMBER OF INDIVIDUALS: 2			

Notes: Spring observations spanned the usual range of weeks 4 through 9, and peaked in week 6, which is also typical. Aside from one early individual on August 25, fall observations were clustered between weeks 8 and 10, which also fits the long-term pattern. No winter or summer observations.

DCCO: Double-crested Cormorant / Cormoran à aigrettes (*Phalacrocorax auritus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY					2.00	0.43		0.29	0.29		**0.30**
# DAYS OBSERVED					1	2		2	1		**6**
	FIRST OBSERVED: April 25			LAST OBSERVED: May 24		PEAK DATE: April 25			NUMBER OF INDIVIDUALS: 14		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY					0.14		2.00	0.14					1.00	**0.25**
# DAYS OBSERVED					1		1	1					1	**4**
	FIRST OBSERVED: September 3				LAST OBSERVED: October 27			PEAK DATE: September 13			NUMBER OF INDIVIDUALS: 14			

Notes: Spring observations scattered over a one-month period, mostly limited to lone individuals or pairs, except for a bigger flock on April 25. Fall observations limited to four occasions, with lone birds on two of them, and again a peak flock size of 14, on September 13. No winter or summer sightings.

AMBI: American Bittern / Butor d'Amérique (*Botaurus lentiginosus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY								0.71	1.00	0.43	**0.21**
# DAYS OBSERVED								4	7	3	**14**
	FIRST OBSERVED: May 17			LAST OBSERVED: June 5		PEAK DATE: May 21			NUMBER OF INDIVIDUALS: 2		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY			0.14											**0.01**
# DAYS OBSERVED			1											**1**
	FIRST OBSERVED: August 20				LAST OBSERVED: August 20			PEAK DATE: August 20			NUMBER OF INDIVIDUALS: 1			

Notes: Unusually common in spring, likely involving a single bird lingering around Stoneycroft Pond and heard calling most mornings, suggesting potential territoriality. Only one fall record, on August 20. No winter or summer sightings.

GBHE: Great Blue Heron / Grand Héron (*Ardea herodias*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	0.14	0.29	0.14	1.14	0.43	0.43	0.29	0.57	0.43	1.00	**0.49**
# DAYS OBSERVED	1	1	1	2	2	2	1	2	1	4	**17**
	FIRST OBSERVED: March 31			LAST OBSERVED: June 5		PEAK DATE: June 1			NUMBER OF INDIVIDUALS: 4		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.71	1.29	0.71	0.43	0.29	0.29	0.71	0.14	0.14	0.14		0.14	0.14	**0.40**
# DAYS OBSERVED	1	3	3	3	1	2	3	1	1	1		1	1	**21**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 29			PEAK DATE: August 12			NUMBER OF INDIVIDUALS: 6			

Notes: Observed weekly in spring for just the second time, although overall abundance for the season was lower than in any previous spring, and the typical week 9 peak was missing. On the contrary, slightly more common than average in fall, peaking in week 2 but appearing occasionally throughout most of the season, including the first ever record for week 13. No winter or summer sightings.

GREG: Great Egret / Grande Aigrette (*Ardea alba*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY								0.14		0.29	**0.04**
# DAYS OBSERVED								1		2	**3**
FIRST OBSERVED: May 22				LAST OBSERVED: June 1			PEAK DATE: 3 dates			NUMBER OF INDIVIDUALS: 1	

AUGUST				SEPTEMBER					OCTOBER				
WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
										0.14			**0.01**
										1			**1**
FIRST OBSERVED: October 12				LAST OBSERVED: October 12			PEAK DATE: October 12			NUMBER OF INDIVIDUALS: 1			

Notes: Observed for the second consecutive year, with three sightings in spring and one in fall, all of lone individuals.

GRHE: Green Heron / Héron vert (*Butorides virescens*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY						0.14	0.71	0.86	0.29	0.43	**0.24**
# DAYS OBSERVED						1	3	4	2	3	**13**
FIRST OBSERVED: May 7				LAST OBSERVED: June 5			PEAK DATE: 4 dates			NUMBER OF INDIVIDUALS: 2	

AUGUST				SEPTEMBER					OCTOBER				
WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
	0.14		0.14	0.57									**0.07**
	1		1	2									**4**
FIRST OBSERVED: August 12				LAST OBSERVED: September 4			PEAK DATE: September 2			NUMBER OF INDIVIDUALS: 3			

Notes: Typically uncommon in spring, with occasional observations throughout the final month of the season. Unusually scarce in fall for the second year in a row, and disappearing earlier than ever before. No winter records, but the species was observed during 2 of 7 MAPS sessions in summer, though it appears no pair bred at MBO this year.

BCNH: Black-crowned Night Heron / Bihoreau gris (*Nycticorax nycticorax*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY							0.14				**0.01**
# DAYS OBSERVED							1				**1**
FIRST OBSERVED: May 13				LAST OBSERVED: May 13			PEAK DATE: May 13			NUMBER OF INDIVIDUALS: 1	

Notes: Limited to a single sighting on May 13, just the fifth observation at MBO, and the first one outside of April.

TUVU: Turkey Vulture / Urubu à tête rouge (*Cathartes aura*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY		0.86	1.00	1.71	1.43	3.14	3.00	1.00	0.14	0.86	**1.31**
# DAYS OBSERVED		3	4	4	4	6	5	5	1	2	**34**
FIRST OBSERVED: April 4				LAST OBSERVED: June 1			PEAK DATE: May 9			NUMBER OF INDIVIDUALS: 7	

AUGUST				SEPTEMBER					OCTOBER				
WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
0.57	0.29	0.14	0.29	0.29	0.43	1.29	0.29	2.57	2.29	0.14		1.00	**0.74**
3	1	1	1	1	2	2	2	5	4	1		2	**25**
FIRST OBSERVED: August 1				LAST OBSERVED: October 27			PEAK DATE: Sep 18, Oct 5			NUMBER OF INDIVIDUALS: 8			

Notes: Higher spring numbers than ever before, largely due to regular sightings of a pair nesting along the B/N nets. Although their one egg was predated (likely by a raccoon), it was the first confirmed nesting attempt on the island of Montreal. Fall observations were also above average, and peaked in early October, somewhat later than usual. Winter observations were limited to two early spring migrants on March 27. Only one summer observation on June 26.

OSPR: Osprey / Balbuzard pêcheur (*Pandion haliaetus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY				0.43	0.71						**0.11**
# DAYS OBSERVED				3	2						**5**
FIRST OBSERVED: April 18				LAST OBSERVED: April 30			PEAK DATE: April 25			NUMBER OF INDIVIDUALS: 4	

AUGUST				SEPTEMBER					OCTOBER				
WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
					0.29	0.29	0.14	0.57					**0.10**
					1	1	1	3					**6**
FIRST OBSERVED: September 8				LAST OBSERVED: October 1			PEAK DATE: Sep 8, Sep 18, Oct 1			NUMBER OF INDIVIDUALS: 2			

Notes: All spring migrants were observed in the second half of April, while fall migration was also quite compressed, showing a slight peak in week 9. No winter or summer sightings.

BAEA: Bald Eagle / Pygargue à tête blanche (*Haliaeetus leucocephalus*)

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY							0.14		0.43					**0.04**
# DAYS OBSERVED							1		2					**3**
	FIRST OBSERVED: September 17				LAST OBSERVED: October 1				PEAK DATE: October 1			NUMBER OF INDIVIDUALS: 2		

Notes: Observed in fall for just the third year out of seven, and on multiple dates for the first time. The only other observation during the year was an impressive count of 4 late migrants on November 19.

NOHA: Northern Harrier / Busard Saint-Martin (*Circus cyaneus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY				0.14		0.43	0.29	0.14			**0.10**
# DAYS OBSERVED				1		3	2	1			**7**
	FIRST OBSERVED: April 24			LAST OBSERVED: May 20			PEAK DATE: 7 dates			NUMBER OF INDIVIDUALS: 1	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY					0.14		0.29	0.29	0.43		0.57			**0.13**
# DAYS OBSERVED					1		1	1	1		2			**6**
	FIRST OBSERVED: August 31				LAST OBSERVED: October 11				PEAK DATE: October 1			NUMBER OF INDIVIDUALS: 3		

Notes: Single individuals were observed on seven dates spanning a month in mid-spring, with a slight peek in week 6, slightly later than usual. Scarcer than normal in fall, with a slight peak in week 11. No winter or summer sightings.

SSHA: Sharp-shinned Hawk / Épervier brun (*Accipiter striatus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY				0.29	0.29		0.14				**0.07**
# DAYS OBSERVED				2	2		1				**5**
# PROCESSED					1						
	FIRST OBSERVED: April 19			LAST OBSERVED: May 12			PEAK DATE: 5 dates			NUMBER OF INDIVIDUALS: 1	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY				0.29	0.43	1.14	0.71	1.29	1.86	1.14	0.86	0.86	0.71	**0.71**
# DAYS OBSERVED				1	2	3	3	3	7	3	3	4	3	**32**
# PROCESSED				1		1	1	1			1	1		**6**
	FIRST OBSERVED: August 27				LAST OBSERVED: October 29				PEAK DATE: September 25			NUMBER OF INDIVIDUALS: 6		

Notes: Scarcer than usual in spring, but with only the second banding record in seven years. Numbers more typical in fall, but missing from the first three weeks for the first time ever. The fall peak around weeks 8 and 9 matched the norm over the past six years. The 6 individuals banded this fall matched the six-year mean, and included one of the few after-hatch-year Sharp-shinned Hawks banded to date. Winter records were limited to lone individuals on January 4 and March 27. There were no summer observations this year.

COHA: Cooper's Hawk / Épervier de Cooper (*Accipiter cooperi*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY				0.57	0.29				0.29		**0.11**
# DAYS OBSERVED				1	2				2		**5**
	FIRST OBSERVED: April 24			LAST OBSERVED: May 25			PEAK DATE: April 28			NUMBER OF INDIVIDUALS: 4	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.14	0.29	0.71		0.14	0.71	1.00	0.86	1.29	0.71	0.43	0.29	0.29	**0.53**
# DAYS OBSERVED	1	2	4		1	4	5	4	5	3	2	1	2	**34**
# PROCESSED								1						**1**
	FIRST OBSERVED: August 3				LAST OBSERVED: October 30				PEAK DATE: September 27			NUMBER OF INDIVIDUALS: 3		

Notes: Scarcer than in any previous spring, with only one good flight of migrants on April 24, and four other dates with lone individuals observed. Observed weekly in fall except for week 4, with overall numbers only slightly below the six-year mean. There was a slight peak in week 9, and observations were more frequent in September than other months. There were three winter sightings of lone individuals, on November 25, January 29, and February 17, but no summer observations.

NOGO: Northern Goshawk / Autour des palombes (*Accipiter gentilis*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY		0.14						0.14			**0.03**
# DAYS OBSERVED		1						1			**2**
	FIRST OBSERVED: April 9			LAST OBSERVED: May 28			PEAK DATE: April 9, May 28			NUMBER OF INDIVIDUALS: 1	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY						0.14	0.14	0.29	0.43	0.14		0.14	0.14	**0.11**
# DAYS OBSERVED						1	1	2	3	1		1	1	**10**
	FIRST OBSERVED: September 8				LAST OBSERVED: October 30			PEAK DATE: 10 dates			NUMBER OF INDIVIDUALS: 1			

Notes: The two scattered sightings of lone individuals on April 9 and May 28 were only the second and third spring records of Northern Goshawk at MBO, following the first last spring. Fall observations were concentrated over the second half of the season and comprised ten sightings of lone individuals. No winter or summer sightings.

RSHA: Red-shouldered Hawk / Buse à épaulettes (*Buteo lineatus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY			0.43	1.29	1.14	0.71	0.43	0.14	0.43	0.29	**0.49**
# DAYS OBSERVED			2	3	4	4	3	1	3	1	**21**
	FIRST OBSERVED: April 14			LAST OBSERVED: May 31			PEAK DATE: April 27			NUMBER OF INDIVIDUALS: 7	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.29	0.43	0.14	0.14	0.43	0.71	0.43	0.43	0.43	0.14	0.29	0.29		**0.32**
# DAYS OBSERVED	2	3	1	1	2	3	3	3	2	1	1	1		**23**
	FIRST OBSERVED: August 2				LAST OBSERVED: October 19			PEAK DATE: September 9			NUMBER OF INDIVIDUALS: 3			

Notes: Spring numbers somewhat below average, with the reduced frequency of observations in May suggesting that the local nesting pair was likely deeper in the Arboretum this year. Observed weekly in fall except for the final week, but in low numbers, and without any distinct peak. The only winter observation was a lone individual on November 20. Present during all but one of the MAPS visits in summer.

BWHA: Broad-winged Hawk / Petite Buse (*Buteo platypterus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY				2.29	1.43			0.14			**0.39**
# DAYS OBSERVED				1	3			1			**5**
	FIRST OBSERVED: April 24			LAST OBSERVED: May 21			PEAK DATE: April 28			NUMBER OF INDIVIDUALS: 16	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY						44.00	0.14	0.14						**3.41**
# DAYS OBSERVED						3	1	1						**5**
	FIRST OBSERVED: September 8				LAST OBSERVED: September 19			PEAK DATE: September 10			NUMBER OF INDIVIDUALS: 300			

Notes: Spring numbers peaked in week 4 as in most years, thanks to a good flight of 16 individuals on April 24. Smaller groups moved through on three days the next week, and there was one late migrant on May 21. Fall migration was very concentrated, with the first two individuals observed on September 8, a record 300 flying past on September 10, 6 more the following day, and then lone stragglers in each of the two following weeks. No winter or summer sightings.

RTHA: Red-tailed Hawk / Buse à queue rousse (*Buteo jamaicensis*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY			0.14	0.43	0.43	0.86	1.29	0.29	0.43	0.14	**0.40**
# DAYS OBSERVED			1	2	1	3	5	2	3	1	**18**
	FIRST OBSERVED: April 14			LAST OBSERVED: May 30			PEAK DATE: May 12			NUMBER OF INDIVIDUALS: 5	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.14	0.29		0.43	0.29	0.71	1.43	1.00	2.86	3.57	1.57	1.00	9.43	**1.75**
# DAYS OBSERVED	1	2		3	2	3	5	4	4	4	4	3	6	**41**
	FIRST OBSERVED: August 2				LAST OBSERVED: October 29			PEAK DATE: October 27			NUMBER OF INDIVIDUALS: 56			

Notes: Somewhat more common than usual in spring. Observed weekly from week 3 onward, and peaking a week later than usual in week 7. Observed weekly in fall except for week 3, with overall numbers higher than in any previous year and more than double the six-year mean. Numbers peaked in the final week due to a record flight of 56 individuals on October 27. Six observations of lone individuals were scattered throughout winter, but there were no summer sightings.

RLHA: Rough-legged Hawk / Buse pattue (*Buteo lagopus*)

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY													0.14	**0.01**
# DAYS OBSERVED													1	**1**
	FIRST OBSERVED: October 29				LAST OBSERVED: October 29				PEAK DATE: October 29			NUMBER OF INDIVIDUALS: 1		

Notes: The only sighting of the year came with just one day to spare, on October 29. This was the third fall in a row with at least one sighting, after having been missed in three of the first four fall seasons.

GOEA: Golden Eagle / Aigle royal (*Aquila chrysaetos*)

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY											0.14			**0.01**
# DAYS OBSERVED											1			**1**
	FIRST OBSERVED: October 10				LAST OBSERVED: October 10				PEAK DATE: October 10			NUMBER OF INDIVIDUALS: 1		

Notes: A lone bird on October 10 was the only sighting of the year, and marked just the second time that Golden Eagle was recorded at MBO in fall.

AMKE: American Kestrel / Crécerelle d'Amérique (*Falco sparverius*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY						0.14					**0.01**
# DAYS OBSERVED						1					**1**
	FIRST OBSERVED: May 8			LAST OBSERVED: May 8			PEAK DATE: May 8			NUMBER OF INDIVIDUALS: 1	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY							0.29	0.29						**0.04**
# DAYS OBSERVED							2	2						**4**
	FIRST OBSERVED: September 16				LAST OBSERVED: September 25				PEAK DATE: 4 dates			NUMBER OF INDIVIDUALS: 1		

Notes: A lone sighting in mid-spring marked the third consecutive year with at least one spring sighting, after none the previous two years. Fall sightings were compressed within a 10-day period in September. No winter or summer sightings.

MERL: Merlin / Faucon émerillon (*Falco columbarius*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY			0.14				0.14				**0.03**
# DAYS OBSERVED			1				1				**2**
	FIRST OBSERVED: April 12			LAST OBSERVED: May 11			PEAK DATE: April 12, May 11			NUMBER OF INDIVIDUALS: 1	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.14		0.14	0.43	0.14	0.29		0.14	0.29	0.29	0.14		0.14	**0.16**
# DAYS OBSERVED	1		1	3	1	2		1	2	2	1		1	**15**
	FIRST OBSERVED: August 3				LAST OBSERVED: October 25				PEAK DATE: 15 dates			NUMBER OF INDIVIDUALS: 1		

Notes: Typically scarce in spring, with just two sightings one month apart. More common in fall, with fifteen observations of lone individuals scattered across throughout the season. No winter or summer sightings.

PEFA: Peregrine Falcon / Faucon pèlerin (*Falco peregrinus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY								0.14			**0.01**
# DAYS OBSERVED								1			**1**
	FIRST OBSERVED: May 20			LAST OBSERVED: May 20			PEAK DATE: May 20			NUMBER OF INDIVIDUALS: 1	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY									0.29	0.14				**0.03**
# DAYS OBSERVED									1	1				**2**
	FIRST OBSERVED: October 2				LAST OBSERVED: October 4				PEAK DATE: October 2			NUMBER OF INDIVIDUALS: 2		

Notes: The lone individual observed on May 20 was just the second spring record in the past five years. Fall observations were limited to a three-day span in early October, and two of them likely involved the same juvenile. No winter or summer sightings.

VIRA: Virginia Rail / Râle de Virginie (*Rallus limicola*)

MARCH	APRIL				MAY						JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY					0.14	1.00	1.29	0.86	0.71	0.57	**0.46**
# DAYS OBSERVED					1	6	6	4	5	4	**26**
	FIRST OBSERVED: May 1			LAST OBSERVED: June 4			PEAK DATE: May 19			NUMBER OF INDIVIDUALS: 3	

Notes: Observed weekly in spring from week 5 onward, with most sightings likely involving the breeding pair on Stoneycroft Pond, although there were no summer sightings this year. No winter sightings.

KILL: Killdeer / Pluvier kildir (*Charadrius vociferus*)

MARCH	APRIL				MAY						JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY		0.29	0.14	0.43	0.29	1.00	1.00	0.86	2.86	1.29	**0.81**
# DAYS OBSERVED		2	1	1	2	4	4	4	5	6	**29**
	FIRST OBSERVED: April 5			LAST OBSERVED: June 5			PEAK DATE: May 24			NUMBER OF INDIVIDUALS: 8	

Notes: Observed weekly in spring from week 2 onward, with overall numbers slightly above average, and peaking in week 9, much later than usual. Absent in fall for the first time ever. No winter sightings, but observed during 3 of 7 MAPS visits.

SPSA: Spotted Sandpiper / Chevalier grivelé (*Actitis macularius*)

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY		0.14	0.14											**0.02**
# DAYS OBSERVED		1	1											**2**
	FIRST OBSERVED: August 11				LAST OBSERVED: August 21			PEAK DATE: Aug 11, Aug 21			NUMBER OF INDIVIDUALS: 1			

Notes: Limited this year to two sightings 10 days apart in mid-August. Missed in spring for the first time ever.

SOSA: Solitary Sandpiper / Chevalier solitaire (*Tringa solitaria*)

MARCH	APRIL				MAY						JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY						0.57	1.14	1.00			**0.27**
# DAYS OBSERVED						4	7	4			**15**
	FIRST OBSERVED: May 5			LAST OBSERVED: May 20			PEAK DATE: May 19			NUMBER OF INDIVIDUALS: 3	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.29	0.43	0.14	0.29	0.14	0.29				0.14				**0.13**
# DAYS OBSERVED	1	2	1	2	1	2				1				**10**
	FIRST OBSERVED: August 4				LAST OBSERVED: October 5			PEAK DATE: Aug 4, Aug 10			NUMBER OF INDIVIDUALS: 2			

Notes: Spring observations concentrated within a 16-day period in May, with peak numbers corresponding to the typical week 7-8 period. Observed weekly for the first six weeks of fall, a more consistent pattern than in any previous year, even though there were no more than two sightings in any week. The lone sighting on October 5 was the first ever for October. No winter or summer sightings.

GRYE: Greater Yellowlegs / Grand Chevalier (*Tringa melanoleuca*)

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY					0.14	0.14			0.29	1.71				**0.18**
# DAYS OBSERVED					1	1			1	1				**4**
	FIRST OBSERVED: September 1				LAST OBSERVED: October 4			PEAK DATE: October 4			NUMBER OF INDIVIDUALS: 12			

Notes: Observed more frequently than in any previous fall. Most were lone individuals, except for a relatively low-flying flock of 12 on October 4. No winter or summer sightings.

LEYE: Lesser Yellowlegs / Petit Chevalier (*Tringa flavipes*)

MARCH	APRIL				MAY						JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY							0.14				**0.01**
# DAYS OBSERVED							1				**1**
	FIRST OBSERVED: May 13			LAST OBSERVED: May 13			PEAK DATE: May 13			NUMBER OF INDIVIDUALS: 1	

Notes: Limited to a lone individual observed on May 13. This was just the second spring record of Lesser Yellowlegs at MBO, the previous one occurring almost exactly three years earlier, on May 12, 2008.

WISN: Wilson's Snipe / Bécassine des marais (*Gallinago delicata*)

Notes: Not observed during any of the standard spring or fall migration monitoring, but present on at least two nights during the early part of the owl banding season in early October, with up to 4 individuals one night.

AMWO: American Woodcock / Bécasse d'Amérique (*Scolopax minor*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	0.14	0.14				0.14					**0.04**
# DAYS OBSERVED	1	1				1					**3**
	FIRST OBSERVED: April 1			LAST OBSERVED: May 4		PEAK DATE: 3 dates			NUMBER OF INDIVIDUALS: 1		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY		0.14												**0.01**
# DAYS OBSERVED		1												**1**
	FIRST OBSERVED: August 8				LAST OBSERVED: August 8			PEAK DATE: August 8			NUMBER OF INDIVIDUALS: 1			

Notes: Lone individuals were observed three times in spring, marking the third time in four years that spring sightings were recorded. The one in week 6 was the first ever May record. For the second year in a row, there was a lone fall sighting, this time on August 8. No winter or summer sightings.

RBGU: Ring-billed Gull / Goéland à bec cerclé (*Larus delawarensis*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	15.29	28.86	9.43	17.00	3.57	5.00	21.71	14.29	17.29	25.43	**15.79**
# DAYS OBSERVED	7	7	7	6	7	7	5	7	7	6	**66**
	FIRST OBSERVED: March 28			LAST OBSERVED: June 5		PEAK DATE: June 3			NUMBER OF INDIVIDUALS: 114		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.43	1.14	0.14		0.43	2.71	5.71	44.14	15.00	14.14	1.00	1.29	2.43	**6.81**
# DAYS OBSERVED	3	3	1		1	5	6	7	7	7	4	5	5	**54**
	FIRST OBSERVED: August 2				LAST OBSERVED: October 30			PEAK DATE: September 21			NUMBER OF INDIVIDUALS: 150			

Notes: Spring numbers were below average, although above last year's record low. Numbers peaked on three occasions in weeks 2, 7, and 10, and there was a significant dip in numbers during weeks 5 and 6, at a time when numbers are usually high. Seen weekly in fall except for week 4. Fall numbers reached a significant peak in week 8, much earlier than usual, and were unusually low for the final three weeks of the season. Winter observations were recorded on 7 of 10 visits in November, and on the final three March visits. Observed during 5 of 7 MAPS visits in summer.

HERG: Herring Gull / Goéland argenté (*Larus argentatus*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY				0.14	0.29			0.43			**0.09**
# DAYS OBSERVED				1	1			1			**3**
	FIRST OBSERVED: April 24			LAST OBSERVED: May 21		PEAK DATE: May 21			NUMBER OF INDIVIDUALS: 3		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY				0.29			0.14		0.14	0.29				**0.07**
# DAYS OBSERVED				1			1		1	2				**5**
	FIRST OBSERVED: August 23				LAST OBSERVED: October 4			PEAK DATE: August 23			NUMBER OF INDIVIDUALS: 2			

Notes: Spring sightings were scarce for a third straight year, with observations on just three dates. Fall observations were also relatively few, although more consistent with past years. No winter or summer sightings.

GBBG: Great Black-backed Gull / Goéland marin (*Larus marinus*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY				0.14	0.57		0.29				**0.10**
# DAYS OBSERVED				1	1		1				**3**
	FIRST OBSERVED: April 24			LAST OBSERVED: May 10		PEAK DATE: May 1			NUMBER OF INDIVIDUALS: 4		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY									0.43	0.86				**0.10**
# DAYS OBSERVED									3	4				**7**
	FIRST OBSERVED: September 27				LAST OBSERVED: October 7			PEAK DATE: Oct 3, Oct 7			NUMBER OF INDIVIDUALS: 2			

Notes: Observed in spring for the fifth time in seven years, and for the first time in more than two weeks. Fall observations were more concentrated, all coming in weeks 9 and 10. No winter or summer sightings.

COTE: Common Tern / Sterne pierregarin (*Sterna hirundo*)

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY							0.29							**0.02**
# DAYS OBSERVED							1							**1**
	FIRST OBSERVED: September 12				LAST OBSERVED: September 12			PEAK DATE: September 12			NUMBER OF INDIVIDUALS: 2			

Notes: Two individuals flying overhead on September 12 marked just the second record of Common Tern for MBO, after the first in August 2010.

ROPI: Rock Pigeon / Pigeon biset (*Columba livia*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY				0.14	1.14	1.00	0.43	1.71	0.71	0.29	**0.54**
# DAYS OBSERVED				1	2	2	1	3	1	1	**11**
	FIRST OBSERVED: April 19			LAST OBSERVED: May 30			PEAK DATE: May 2			NUMBER OF INDIVIDUALS: 6	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.14	0.57	1.00	0.71	0.14	1.43	0.86	1.57	1.29	2.00	1.71	1.57	3.57	**1.27**
# DAYS OBSERVED	1	1	1	2	1	3	2	3	3	6	3	2	3	**31**
	FIRST OBSERVED: August 5				LAST OBSERVED: October 28			PEAK DATE: October 27			NUMBER OF INDIVIDUALS: 14			

Notes: Seen weekly in spring from week 4 onward, although infrequently and generally in small numbers. Observed weekly in fall for just the second time, but with numbers generally remaining low. Somewhat more numerous in October than other months. Winter observations limited to three dates in November and one in January. Observed just once in summer.

MODO: Mourning Dove / Tourterelle triste (*Zenaida macroura*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	0.29	0.14		0.57	0.29	0.43	0.71	0.43	0.71	0.14	**0.37**
# DAYS OBSERVED	2	1		1	2	2	3	2	2	1	**16**
	FIRST OBSERVED: March 28			LAST OBSERVED: June 1			PEAK DATE: April 19			NUMBER OF INDIVIDUALS: 4	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	1.00	0.86	1.57	0.86	1.00	0.29	0.43	1.86	1.71	3.43	5.71	5.00	5.29	**2.23**
# DAYS OBSERVED	3	4	5	4	4	1	3	5	5	6	5	7	7	**59**
	FIRST OBSERVED: August 2				LAST OBSERVED: October 30			PEAK DATE: October 11			NUMBER OF INDIVIDUALS: 18			

Notes: Relatively scarce in spring for a third consecutive year, appearing in most weeks, but in small numbers and with no distinct peak. Observed weekly in fall, as in every previous year except 2010. Significantly more common in October than other months, peaking a bit earlier than usual in week 11, but with good numbers during the typical peak of week 13. Observed on 26 dates throughout winter, and 2 banded during the season. Sightings during 3 of 7 MAPS visits in summer.

YBCU: Yellow-billed Cuckoo / Coulicou à bec jaune (*Coccyzus americanus*)

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY					0.14									**0.01**
# DAYS OBSERVED					1									**1**
	FIRST OBSERVED: September 4				LAST OBSERVED: September 4			PEAK DATE: September 4			NUMBER OF INDIVIDUALS: 1			

Notes: The only observation of the year was on September 4, just the fourth record overall for MBO.

BBCU: Black-billed Cuckoo / Coulicou à bec noir (*Coccyzus erythropthalmus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY									0.14	0.29	**0.04**
# DAYS OBSERVED									1	2	**3**
# PROCESSED									1		**1**
	FIRST OBSERVED: May 29			LAST OBSERVED: May 31			PEAK DATE: 3 dates			NUMBER OF INDIVIDUALS: 1	

Notes: Three observations in the final days of May were possibly all the same individual, banded the first day it appeared. This was the fifth spring with Black-billed Cuckoo records. No winter or summer sightings.

EASO: Eastern Screech-Owl / Petit-duc maculé (*Megascops asio*)

Notes: The only observation of the year was during a snowy hike on February 17. This was the first winter sighting at MBO.

GHOW: Great Horned Owl / Grand Duc d'Amérique (*Bubo virginianus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY						0.14					**0.01**
# DAYS OBSERVED						1					**1**
	FIRST OBSERVED: May 8			LAST OBSERVED: May 8			PEAK DATE: May 8			NUMBER OF INDIVIDUALS: 1	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY		0.14	0.14		0.14	0.29	0.29		0.43	0.14	0.29	0.14	0.14	**0.16**
# DAYS OBSERVED		1	1		1	1	2		3	1	2	1	1	**14**
	FIRST OBSERVED: August 8				LAST OBSERVED: October 30			PEAK DATE: September 6			NUMBER OF INDIVIDUALS: 2			

Notes: A lone observation on May 8 was the second spring record in the past five years. On the contrary, there were observations in all but three weeks in fall, by far the most frequent records in MBO's history. The only winter record was of two individuals on February 21. No summer records.

NSWO: Northern Saw-whet Owl / Petite Nyctale (*Aegolius acadicus*)

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY										0.14		0.14		**0.02**
# DAYS OBSERVED										1		1		**2**
# PROCESSED										1		1		**2**
	FIRST OBSERVED: October 4				LAST OBSERVED: October 23			PEAK DATE: Oct 4, Oct 23			NUMBER OF INDIVIDUALS: 1			

Notes: Although hundreds of Northern Saw-whet Owls have been banded at MBO nocturnally, the two individuals caught during diurnal migration monitoring this fall were the first ones ever observed at MBO in daylight.

CONI: Common Nighthawk / Engoulevent d'Amérique (*Chordeiles minor*)

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY				0.14				0.14						**0.02**
# DAYS OBSERVED				1				1						**2**
# PROCESSED														
	FIRST OBSERVED: August 22				LAST OBSERVED: September 19			PEAK DATE: Aug 22, Sep 19			NUMBER OF INDIVIDUALS: 1			

Notes: For the third time in four years, a lone Common Nighthawk was observed in the second half of August. The second individual on September 19 was a surprise, as it was the first record at MBO outside of August.

CHSW: Chimney Swift / Martinet ramoneur (*Chaetura pelagica*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY									0.14		**0.01**
# DAYS OBSERVED									1		**1**
	FIRST OBSERVED: May 24			LAST OBSERVED: May 24			PEAK DATE: May 24			NUMBER OF INDIVIDUALS: 1	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	2.14	1.43	1.86											**0.42**
# DAYS OBSERVED	4	3	2											
	FIRST OBSERVED: August 4				LAST OBSERVED: August 19			PEAK DATE: August 11			NUMBER OF INDIVIDUALS: 8			

Notes: For a second consecutive year, spring sightings were limited to a single day in week 9. As usual, fall observations were limited to the early part of the season, this year peaking in the first week. No winter sightings, but observed twice in July.

RTHU: Ruby-throated Hummingbird / Colibri à gorge rubis (*Archilochus colubris*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY							0.57	1.14	1.14	1.29	**0.41**
# DAYS OBSERVED							3	4	5	5	**17**
# PROCESSED											
	FIRST OBSERVED: May 11			LAST OBSERVED: June 5			PEAK DATE: 3 dates			NUMBER OF INDIVIDUALS: 3	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	3.43	3.86	5.71	5.43	3.00	2.00	0.86	0.14						**1.88**
# DAYS OBSERVED	7	7	7	6	6	6	5	1						**45**
# PROCESSED														
	FIRST OBSERVED: August 1				LAST OBSERVED: September 23			PEAK DATE: August 24			NUMBER OF INDIVIDUALS: 16			

Notes: Observed over the final four weeks of spring as in most year, with a slight peak in week 10. Present weekly in fall through week 8, the first time this species was present past week 7. The fall peak in week 3 matched the norm from previous years. Although none were banded in any season, 19 were captured in fall. Observed on the first 4 summer visits.

BEKI: Belted Kingfisher / Martin-pêcheur d'Amérique (*Megaceryle alcyon*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY				0.43	0.29	0.71	0.29	0.43	0.14	0.29	**0.26**
# DAYS OBSERVED				3	2	4	1	1	1	2	**14**
	FIRST OBSERVED: April 22			LAST OBSERVED: June 1			PEAK DATE: May 22		NUMBER OF INDIVIDUALS: 3		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY			0.43		0.29	0.29	0.14			0.14				**0.10**
# DAYS OBSERVED			2		2	1	1			1				**7**
	FIRST OBSERVED: August 17				LAST OBSERVED: October 5			PEAK DATE: Aug 18, Sep 9			NUMBER OF INDIVIDUALS: 2			

Notes: Observed weekly in spring from week 4 onward, but in small numbers and with no distinct peak. Typically scarce in fall, with 9 individuals observed over a span of 8 weeks. The individual observed on October 5 was the latest fall record. No winter sightings, but observed twice this summer, for the first time ever.

RBWO: Red-bellied Woodpecker / Pic à ventre roux (*Melanerpes carolinus*)

Notes: The only record this year was a lone individual observed on March 14.

YBSA: Yellow-bellied Sapsucker / Pic maculé (*Sphyrapicus varius*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY			0.43	1.43	1.71	0.43	1.00	0.29	0.71	0.14	**0.61**
# DAYS OBSERVED			2	3	5	2	4	2	4	1	**23**
# PROCESSED									3		**3**
	FIRST OBSERVED: April 14			LAST OBSERVED: May 30			PEAK DATE: April 30		NUMBER OF INDIVIDUALS: 5		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY			0.14		0.14		0.43	0.14						**0.07**
# DAYS OBSERVED			1		1		1	1						**4**
# PROCESSED					1		1							**2**
	FIRST OBSERVED: August 17				LAST OBSERVED: October 25			PEAK DATE: September 18			NUMBER OF INDIVIDUALS: 3			

Notes: Present weekly in spring from week 3 onward, although only slightly above last year's record low numbers. Fall observations were lower than ever before, with only four individuals recorded. No winter sightings, and just one in summer.

DOWO: Downy Woodpecker / Pic mineur (*Picoides pubescens*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	1.00	0.29	1.86	1.57	2.0	1.71	2.14	1.71	0.57	0.14	**1.30**
# DAYS OBSERVED	5	2	5	5	6	5	7	6	3	1	**45**
# PROCESSED				1	0-1-0	1	2	1			**5-1-0**
	FIRST OBSERVED: March 28			LAST OBSERVED: May 30			PEAK DATE: April 15		NUMBER OF INDIVIDUALS: 6		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	4.14	2.14	3.43	1.57	1.86	1.29	2.43	3.00	2.43	2.29	1.29	1.57	2.00	**2.26**
# DAYS OBSERVED	7	7	7	6	7	6	7	6	7	7	4	6	7	**84**
# PROCESSED	6-0-2	0-0-1	1-1-1	1	1-0-1			1	2			1-0-2	0-0-1	**13-1-8**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 30			PEAK DATE: August 19			NUMBER OF INDIVIDUALS: 7			

Notes: Observed weekly in both spring and fall. Numbers observed and banded in each season were close to the six-year means for the species. Observed on 19 days in winter and 4 days in summer. One banded in winter and 6 banded in summer.

HAWO: Hairy Woodpecker / Pic chevelu (*Picoides villosus*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	0.14	0.29	0.29	1.14	0.57	1.29	0.71	0.86	0.14	0.29	**0.57**
# DAYS OBSERVED	1	2	2	5	4	5	4	4	1	2	**30**
# PROCESSED				1		2		1			**4**
	FIRST OBSERVED: March 31			LAST OBSERVED: June 5			PEAK DATE: May 3		NUMBER OF INDIVIDUALS: 4		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.57	0.86	1.29	0.57	1.29	0.86	3.14	1.86	1.86	2.00	0.57	1.29	1.29	**1.34**
# DAYS OBSERVED	3	4	4	4	4	4	6	7	7	6	3	5	6	**63**
# PROCESSED	2-0-1	2			1							0-0-1		**5-0-2**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 30			PEAK DATE: September 12			NUMBER OF INDIVIDUALS: 9			

Notes: Observed weekly in both spring and fall. Numbers observed in each season were close to the six-year means, while numbers banded were higher than usual. Observed on 15 days in winter and 4 days in summer.

YSFL: Yellow-shafted Flicker / Pic flamboyant (*Colaptes auratus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY		0.14	0.57	2.29	3.29	1.71	1.57	0.57	0.43	1.43	**1.20**
# DAYS OBSERVED		1	3	6	7	6	6	2	3	5	**39**
# PROCESSED				2	1						**3**
	FIRST OBSERVED: April 10			LAST OBSERVED: June 5			PEAK DATE: April 29			NUMBER OF INDIVIDUALS: 7	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	2.00	2.00	2.00	1.14	3.71	4.43	4.14	9.57	7.86	3.86	0.71	1.14	0.29	**3.30**
# DAYS OBSERVED	7	7	6	5	7	7	6	7	7	7	3	4	2	**75**
# PROCESSED		1-0-1			2		1							
	FIRST OBSERVED: August 1				LAST OBSERVED: October 28			PEAK DATE: September 22			NUMBER OF INDIVIDUALS: 16			

Notes: Observed weekly in spring from week 2 onward, peaking in week 5 as in every previous year except 2010. Present weekly throughout fall, peaking as usual in week 8. The high count of 16 individuals on September 22 was unusually large for this species. No winter sightings, but observed during 4 of 7 MAPS visits in summer.

PIWO: Pileated Woodpecker / Grand Pic (*Dryocopus pileatus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	0.29	0.29	0.57	1.14	1.00	1.43	0.71	0.57	0.29	0.86	**0.71**
# DAYS OBSERVED	2	2	4	4	4	7	4	3	1	5	**36**
# PROCESSED						1					**1**
	FIRST OBSERVED: March 30			LAST OBSERVED: June 5			PEAK DATE: April 24			NUMBER OF INDIVIDUALS: 4	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.57	0.71	0.57	1.00	0.43	0.57	2.14	2.14	2.00	1.86	0.71	0.86	1.57	**1.16**
# DAYS OBSERVED	3	3	4	6	3	3	7	7	6	6	3	4	6	**61**
# PROCESSED													1	**1**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 30			PEAK DATE: 10 dates			NUMBER OF INDIVIDUALS: 3			

Notes: Observed weekly in both spring and fall. Numbers observed in spring were close to the six-year mean, while those in fall were somewhat higher. This was the first year with an individual banded in both spring and fall. Observed on 10 days in winter and 5 days in summer.

OSFL: Olive-sided Flycatcher / Moucherolle a côtés olive (*Contopus cooperi*)

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY			0.14											**0.01**
# DAYS OBSERVED			1											**1**
	FIRST OBSERVED: August 20			LAST OBSERVED: August 20			PEAK DATE: August 20			NUMBER OF INDIVIDUALS: 1				

Notes: The only observation this year was a lone individual on August 20.

EAWP: Eastern Wood-Pewee / Pioui de l'Est (*Contopus virens*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY								0.57	0.43	0.71	**0.17**
# DAYS OBSERVED								3	2	4	**9**
	FIRST OBSERVED: May 19			LAST OBSERVED: June 2			PEAK DATE: 3 dates			NUMBER OF INDIVIDUALS: 2	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.14	0.29	0.14	0.71	1.00									**0.18**
# DAYS OBSERVED	1	1	1	2	5									**10**
	FIRST OBSERVED: August 3				LAST OBSERVED: September 4			PEAK DATE: August 24			NUMBER OF INDIVIDUALS: 4			

Notes: Spring observations were limited to the final three weeks of the season as in all previous years, and peaked in week 10 as usual. In fall there were records weekly through week 5, a welcome increase from the lone individual observed during FMMP 2010. Although the peak movement of individuals occurred on August 24, observations were most frequent the following week, marking the first time that numbers peaked this late in fall. None banded for the second straight year. No winter or summer sightings.

YBFL: Yellow-bellied Flycatcher / Moucherolle à ventre jaune (*Empidonax flaviventris*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY						0.14			0.71		**0.09**
# DAYS OBSERVED						1			3		**4**
# PROCESSED									5		**5**
	FIRST OBSERVED: May 6			LAST OBSERVED: May 28			PEAK DATE: May 28			NUMBER OF INDIVIDUALS: 3	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY		0.14	0.86	0.57	1.29	1.14	0.29	0.29						**0.35**
# DAYS OBSERVED		1	3	3	5	4	2	2						**20**
# PROCESSED		1	5	3	8	6	0-0-1	1-0-1						**24-0-2**
	FIRST OBSERVED: August 14				LAST OBSERVED: September 20			PEAK DATE: August 30			NUMBER OF INDIVIDUALS: 4			

Notes: Typically scarce in spring, with a record early individual on May 6, and all others in week 9. Fall numbers observed and banded both set new records. The fall peak was right on schedule in week 5. The week 8 records were unusually late, although there was one later bird in week 10 in 2008. No winter or summer sightings.

TRFL: Traill's Flycatcher / Moucherolle des aulnes ou des saules (*Empidonax alnorum/traillii*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY								0.14	3.86	1.57	**0.56**
# DAYS OBSERVED								1	6	4	**11**
# PROCESSED									17	2	**19**
	FIRST OBSERVED: May 16			LAST OBSERVED: June 5			PEAK DATE: 3 dates			NUMBER OF INDIVIDUALS: 4	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.29	0.71	1.00	0.43	0.71	0.14								**0.25**
# DAYS OBSERVED	2	3	2	2	3	1								**13**
# PROCESSED	2	5	7	2	1	1								**18**
	FIRST OBSERVED: August 6				LAST OBSERVED: September 7			PEAK DATE: August 15			NUMBER OF INDIVIDUALS: 6			

Notes: Much more numerous than ever in spring, with a record number of individuals banded. Most week 9 and 10 records were of Alder Flycatchers, but some individuals were silent. Fall records were concentrated in August, with just a few extending into September. The number banded in fall was average. No winter sightings, but observed on the first two summer visits.

LEFL: Least Flycatcher / Moucherolle tchébec (*Empidonax minimus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY							1.71	2.29	1.29	0.29	**0.56**
# DAYS OBSERVED							3	5	4	2	**14**
# PROCESSED							4	2	3		**9**
	FIRST OBSERVED: May 12			LAST OBSERVED: June 1			PEAK DATE: May 13			NUMBER OF INDIVIDUALS: 9	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY		0.29	0.14	1.00	0.43	0.14		0.29						**0.18**
# DAYS OBSERVED		2	1	4	2	1		2						**12**
# PROCESSED		1		2										**3**
	FIRST OBSERVED: August 8				LAST OBSERVED: September 21			PEAK DATE: August 22			NUMBER OF INDIVIDUALS: 3			

Notes: As usual, present for the final four weeks of spring and peaking in week 8, but with numbers twice as high as usual. Fall numbers slightly below average, and with a record low of 3 individuals banded. Observed later than ever, with two sightings in week 8 for the first time. No winter or summer sightings.

EAPH: Eastern Phoebe / Moucherolle phébi (*Sayornis phoebe*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	0.29	0.29	0.57	0.71	0.43		0.29	1.00	0.43	0.57	**0.46**
# DAYS OBSERVED	2	1	3	4	3		2	4	3	3	**25**
# PROCESSED				1							**1**
	FIRST OBSERVED: March 30			LAST OBSERVED: June 3			PEAK DATE: May 19			NUMBER OF INDIVIDUALS: 3	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.29	0.29		0.43	1.00	1.00	1.57	2.14	0.43	0.43		0.14		**0.59**
# DAYS OBSERVED	2	2		2	5	4	5	7	2	2		1		**32**
# PROCESSED						1	2-0-2							**3-0-2**
	FIRST OBSERVED: August 2				LAST OBSERVED: October 18			PEAK DATE: 5 dates			NUMBER OF INDIVIDUALS: 3			

Notes: Observed most weeks in both spring and fall, with numbers far below normal in spring, but slightly above average in fall. The fall peak in week 8 was within the typical week 8-10 range. No winter or summer observations.

GCFL: Great-crested Flycatcher / Tyran huppé (*Myiarchus crinitus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY						0.29	2.00	3.57	6.29	4.43	**1.66**
# DAYS OBSERVED						2	4	7	7	7	**27**
# PROCESSED									1	1	**2**
	FIRST OBSERVED: May 2			LAST OBSERVED: June 5			PEAK DATE: May 24			NUMBER OF INDIVIDUALS: 10	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.71	2.00	2.29	0.57	0.29									**0.45**
# DAYS OBSERVED	3	6	5	3	2									**19**
# PROCESSED			1											**1**
	FIRST OBSERVED: August 1				LAST OBSERVED: September 2			PEAK DATE: August 18			NUMBER OF INDIVIDUALS: 7			

Notes: Observed over the final five weeks of spring, as in the past two years. Peak numbers in week 9 as usual, but with overall abundance more than double the six-year mean for spring. Fall numbers more typical, peaking in weeks 2 and 3 as in most years. No winter sightings. Observed on 5 days in summer, and 2 individuals banded during MAPS.

EAKI: Eastern Kingbird / Tyran tritri (*Tyrannus tyrannus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY					0.14	0.57	3.57	3.00	2.43	2.14	**1.19**
# DAYS OBSERVED					1	4	7	7	7	7	**33**
# PROCESSED									2	1	**3**
	FIRST OBSERVED: May 1			LAST OBSERVED: June 5			PEAK DATE: May 9			NUMBER OF INDIVIDUALS: 6	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	3.71	3.43	1.71	1.14	0.14									**0.78**
# DAYS OBSERVED	7	7	5	4	1									**24**
	FIRST OBSERVED: August 1				LAST OBSERVED: August 30			PEAK DATE: August 7			NUMBER OF INDIVIDUALS: 7			

Notes: Like most flycatchers, present in record numbers this spring. The peak in week 7 was two weeks earlier than usual. Fall numbers were close to typical, and dropped steadily from a peak in week 1 to a single individual in week 5, as in four of six previous years. No winter sightings. Observed on 5 days in summer.

NSHR: Northern Shrike / Pie-grièche grise (*Lanius excubitor*)

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY													1.00	**0.08**
# DAYS OBSERVED													6	**6**
# PROCESSED													1-0-2	**1-0-2**
	FIRST OBSERVED: October 24				LAST OBSERVED: October 30			PEAK DATE: October 30			NUMBER OF INDIVIDUALS: 2			

Notes: Observed almost daily during the final week of fall, with most observations likely involving the same individual that was banded and recaptured twice. There were 5 observations of lone individuals in winter. No summer sightings.

BHVI: Blue-headed Vireo / Viréo à tête bleue (*Vireo solitarius*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY					0.29	0.57	0.29	0.86	0.14	0.14	**0.23**
# DAYS OBSERVED					2	2	2	4	1	1	**12**
# PROCESSED					1	1					**2**
	FIRST OBSERVED: April 29			LAST OBSERVED: May 31			PEAK DATE: May 6			NUMBER OF INDIVIDUALS: 3	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.14		0.14		0.14		0.86	1.00	0.86	0.71				**0.30**
# DAYS OBSERVED	1		1		1		5	3	3	2				**16**
# PROCESSED							4	2	4	2				**12**
	FIRST OBSERVED: August 6				LAST OBSERVED: October 4			PEAK DATE: September 25			NUMBER OF INDIVIDUALS: 5			

Notes: Observed weekly in spring from week 5 onward, but in small numbers and with only a slight peak during the usual week 8 height of migration for this species. In fall, less numerous and with fewer individuals banded than in any previous year. No winter or summer sightings.

WAVI: Warbling Vireo / Viréo mélodieux (*Vireo gilvus*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY							0.71	2.00	3.29	1.57	**0.76**
# DAYS OBSERVED							3	6	7	7	**23**
# PROCESSED							1	1	1		**3**
	FIRST OBSERVED: May 13			LAST OBSERVED: June 5			PEAK DATE: May 29		NUMBER OF INDIVIDUALS: 10		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	1.71	0.14		0.29	0.14			0.14						**0.19**
# DAYS OBSERVED	5	1		1	1			1						**9**
# PROCESSED	4													**4**
	FIRST OBSERVED: August 1				LAST OBSERVED: September 25			PEAK DATE: August 2			NUMBER OF INDIVIDUALS: 4			

Notes: Present during the final four weeks of spring, with a fairly distinct peak during week 9, as usual. Fall abundance peaked in week 1, with only five more sightings over the next seven weeks. No winter sightings. Observed during just one of the MAPS visits, and may not have nested at MBO this summer.

PHVI: Philadelphia Vireo / Viréo de Philadelphie (*Vireo philadelphicus*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY									0.29	0.14	**0.04**
# DAYS OBSERVED									2	1	**3**
	FIRST OBSERVED: May 25			LAST OBSERVED: June 3			PEAK DATE: 3 dates		NUMBER OF INDIVIDUALS: 1		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY				0.14	0.14	0.43	0.57	0.43		0.14				**0.14**
# DAYS OBSERVED				1	1	2	3	2		1				**10**
# PROCESSED				1	1	3	2	3		1				**11**
	FIRST OBSERVED: August 26				LAST OBSERVED: October 4			PEAK DATE: Sep 8, Sep 18, Sep 22			NUMBER OF INDIVIDUALS: 2			

Notes: Only three sightings in spring, all after the typical week 8 peak. Most fall sightings were scattered between weeks 4 and 8, with one straggler banded on October 4, becoming the first October record for this species. No winter or summer sightings.

REVI: Red-eyed Vireo / Viréo aux yeux rouges (*Vireo olivaceus*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY								0.43	4.29	5.00	**0.97**
# DAYS OBSERVED								3	6	7	**16**
# PROCESSED									4	1	**5**
	FIRST OBSERVED: May 18			LAST OBSERVED: June 5			PEAK DATE: May 29		NUMBER OF INDIVIDUALS: 12		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	6.43	5.57	6.29	3.14	3.57	4.43	2.00	1.00	0.71	0.43				**2.58**
# DAYS OBSERVED	7	7	7	6	7	7	6	4	4	2				**57**
# PROCESSED	6-0-2	4	1-0-1	5	4	11	3	2	2	3				**41-0-3**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 7			PEAK DATE: September 6			NUMBER OF INDIVIDUALS: 13			

Notes: Spring sightings limited to the final three weeks and peaked in week 10 as usual, and were almost double the spring mean; the 5 individuals banded were a new record. Observed weekly in fall through week 10, peaking in week 1, although there was a slight influx in week 6 that coincided with the busiest week for banding. The number banded this fall was the lowest of any year. No winter sightings, but observed on all 7 summer visits, and a record high 12 individuals banded during MAPS.

BLJA: Blue Jay / Geai bleu (*Cyanocitta cristata*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	6.14	3.43	4.29	5.57	3.57	6.14	5.29	3.86	6.43	4.71	**4.94**
# DAYS OBSERVED	7	7	7	7	7	6	6	7	7	7	**68**
	FIRST OBSERVED: March 28			LAST OBSERVED: June 5			PEAK DATE: May 26		NUMBER OF INDIVIDUALS: 18		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	3.14	2.43	2.86	8.00	4.57	9.29	23.86	23.71	39.86	33.86	27.00	17.71	14.57	**16.22**
# DAYS OBSERVED	2	5	6	7	7	7	7	7	7	7	7	7	7	**83**
# PROCESSED				1		1	1	4	7-1-1		2-0-2	2-1-1	0-0-1	**18-2-5**
	FIRST OBSERVED: August 2				LAST OBSERVED: October 30			PEAK DATE: October 5			NUMBER OF INDIVIDUALS: 65			

Notes: Observed weekly in spring and fall, as in all previous years. There was a week spring peak in week 9, and a strong fall peak in week 9, matching the norm. For the second straight year none were banded in spring, and this year's fall total was below average. Observed on 31 days in winter, and one banded. Observed on 6 days in summer.

AMCR: American Crow / Corneille d'Amérique (*Corvus brachyrhynchos*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	16.00	11.71	16.14	20.57	24.57	19.86	16.71	15.43	15.29	19.29	**17.56**
# DAYS OBSERVED	7	7	7	7	7	7	7	7	7	7	**70**
	FIRST OBSERVED: March 28			LAST OBSERVED: June 5			PEAK DATE: May 1			NUMBER OF INDIVIDUALS: 65	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	12.29	16.57	16.71	16.57	23.29	32.86	53.43	43.71	94.14	70.29	36.71	106.57	238.86	**58.62**
# DAYS OBSERVED	7	7	7	7	7	7	6	7	7	7	7	7	7	**90**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 30			PEAK DATE: October 27				NUMBER OF INDIVIDUALS: 446		

Notes: Observed weekly in spring and fall as in all previous years. Spring numbers were close to average and peaked in weeks 4 and 5 as usual. Fall numbers started off lower than usual throughout August, but increased to a traditional late October peak. Observed on 33 days in winter and during all 7 MAPS visits in summer.

CORA: Common Raven / Grand Corbeau (*Corvus corax*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	0.14			0.71	0.57	0.57	0.29	0.29	0.29	0.57	**0.34**
# DAYS OBSERVED	1			5	4	3	2	2	2	4	**23**
	FIRST OBSERVED: March 31			LAST OBSERVED: June 5			PEAK DATE: May 6			NUMBER OF INDIVIDUALS: 2	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.57	0.43	0.14	0.29	0.29	0.71	1.14	0.71	0.86	0.71	0.43	1.29	0.57	**0.63**
# DAYS OBSERVED	4	2	1	2	2	4	3	3	3	4	2	5	3	**38**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 29			PEAK DATE: September 18				NUMBER OF INDIVIDUALS: 6		

Notes: Observed during most weeks in spring and all weeks in fall. Numbers were low, although slightly above average in both spring and fall. Observed on 13 dates in winter and during 6 of 7 MAPS visits in summer.

PUMA: Purple Martin / Hirondelle noire (*Progne subis*)

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY		0.14												**0.01**
# DAYS OBSERVED		1												**1**
	FIRST OBSERVED: August 12				LAST OBSERVED: August 12			PEAK DATE: August 12				NUMBER OF INDIVIDUALS: 1		

Notes: The only record this year was a single individual on August 12. Missed in spring for the second straight year.

TRES: Tree Swallow / Hirondelle bicolore (*Tachycineta bicolor*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY			1.29	11.86	12.57	11.14	9.43	9.14	20.29	6.71	**8.24**
# DAYS OBSERVED			3	7	7	7	7	6	7	7	**51**
# PROCESSED				2-2-0		0-0-1	1-0-1	1			**4-2-2**
	FIRST OBSERVED: April 12			LAST OBSERVED: June 5			PEAK DATE: May 24			NUMBER OF INDIVIDUALS: 50	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	3.71	3.00	0.71	2.86	1.00		2.00	0.43	0.14					**1.07**
# DAYS OBSERVED	4	2	3	5	3		1	2	1					**21**
	FIRST OBSERVED: August 1				LAST OBSERVED: September 27			PEAK DATE: August 3				NUMBER OF INDIVIDUALS: 22		

Notes: Observed weekly in spring from week 3 onward, although numbers did not build until week 4. The peak in week 9 was two weeks later than usual, whereas the daily mean in week 10 was the lowest ever. Only 4 individuals were banded this spring, compared to between 8 and 18 in previous years, and reflecting a very poor rate of occupancy of the nesting boxes at MBO. Summer records were also poor, with observations on all but the last of the MAPS visits, but averaging just 5 individuals each time, and with none banded for the second summer in a row, after a range of 6 to 23 in previous years. However, fall numbers were somewhat above average, peaking earlier than usual in week 1 and extending to late September with only a single gap in week 6. No winter records.

NRWS: Northern Rough-winged Swallow / Hirondelle à ailes hérissées (*Stelgidopteryx serripennis*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY							0.57	0.14	0.29	0.71	**0.17**
# DAYS OBSERVED							3	1	1	3	**8**
	FIRST OBSERVED: May 13			LAST OBSERVED: June 3			PEAK DATE: 4 dates		NUMBER OF INDIVIDUALS: 2		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY		0.29												**0.02**
# DAYS OBSERVED		1												**1**
	FIRST OBSERVED: August 11				LAST OBSERVED: August 11			PEAK DATE: August 11			NUMBER OF INDIVIDUALS: 2			

Notes: Observed in low numbers over the final four weeks of spring, with a weak peak in week 10. Typically scarce in fall, with a single observation of two individuals on August 11. No winter or summer sightings.

BANS: Bank Swallow / Hirondelle de rivage (*Riparia riparia*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY							0.29		1.00	1.14	**0.24**
# DAYS OBSERVED							1		3	3	**7**
	FIRST OBSERVED: May 13			LAST OBSERVED: June 3			PEAK DATE: June 1		NUMBER OF INDIVIDUALS: 4		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.57		0.29											**0.07**
# DAYS OBSERVED	1		1											**2**
	FIRST OBSERVED: August 1				LAST OBSERVED: August 19			PEAK DATE: August 1			NUMBER OF INDIVIDUALS: 4			

Notes: Although still scarce, numbers this spring were higher than in any previous year. Observations on two occasions in August were the first fall sightings at MBO since 2005. No winter or summer sightings.

CLSW: Cliff Swallow / Hirondelle à front blanc (*Petrochelidon pyrrhonota*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY				0.57	3.43	8.43	5.14	6.29	16.14	8.00	**4.80**
# DAYS OBSERVED				2	2	5	6	4	6	6	**36**
	FIRST OBSERVED: April 22			LAST OBSERVED: June 5			PEAK DATE: May 25		NUMBER OF INDIVIDUALS: 40		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.14	0.29												**0.03**
# DAYS OBSERVED	1	1												**2**
	FIRST OBSERVED: August 3				LAST OBSERVED: August 11			PEAK DATE: August 11			NUMBER OF INDIVIDUALS: 2			

Notes: Observed weekly in spring from week 4 onward, as for the past three years. Numbers peaked in week 9, somewhat later than usual, and numbers overall were the lowest since 2005. As usual, observations were thought to be entirely related to the individuals nesting on the nearby McGill radar station. Observed in fall for the fourth time in seven years, although only three individuals were recorded. No winter sightings, but observed on 3 of 7 MAPS visits in summer.

BARS: Barn Swallow / Hirondelle rustique (*Hirundo rustica*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY				0.29			1.43	0.71	1.57	0.71	**0.47**
# DAYS OBSERVED				1			4	2	5	2	**14**
	FIRST OBSERVED: April 24			LAST OBSERVED: June 1			PEAK DATE: May 25		NUMBER OF INDIVIDUALS: 7		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.29	4.29	0.71	1.00										**0.48**
# DAYS OBSERVED	1	2	1	2										**6**
	FIRST OBSERVED: August 2				LAST OBSERVED: August 23			PEAK DATE: August 12			NUMBER OF INDIVIDUALS: 16			

Notes: Arrived on schedule during week 4 of spring, but then was unusually absent for the next two weeks. Overall spring numbers close to normal, thanks to peaks in week 7 and week 9, despite a low count in the usual peak of week 8. Observed during the first four weeks of fall, with a strong peak in week 2. One of only a few species to be gone before the end of August. No winter or summer sightings.

BCCH: Black-capped Chickadee / Mésange à tête noire (*Poecile atricapillus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	13.29	11.43	10.29	17.57	15.71	16.71	9.43	7.57	8.86	4.14	**11.60**
# DAYS OBSERVED	7	7	7	7	7	7	7	7	7	5	**68**
# PROCESSED				4-2-1	1-3-3	2-1-1	2	0-0-4			**9-6-9**
	FIRST OBSERVED: March 28			LAST OBSERVED: June 5			PEAK DATE: March 30			NUMBER OF INDIVIDUALS: 38	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	17.57	17.71	27.57	17.29	22.86	26.14	20.29	17.14	27.86	30.86	12.00	21.57	15.57	**21.11**
# DAYS OBSERVED	7	7	7	7	7	7	7	7	7	7	6	7	7	**90**
# PROCESSED	10-0-8	4-0-6	4-0-2	6-0-10	4-0-4	3-1-6	1-0-10	5-0-9	3-5-16	2-1-10	2-1-6	1-2-25	3-0-12	**48-10-124**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 30			PEAK DATE: August 19				NUMBER OF INDIVIDUALS: 58		

Notes: Observed weekly in spring and fall as in all previous years. Record high spring abundance (previous range 7.8 to 9.8), in part thanks to a record high weekly count of 17.6 during week 4, which is the traditional peak for the species. Fall numbers also slightly above average, although below the 2010 record. The number banded this fall was the lowest since 2006. The fall peak in numbers came in week 10 as usual, but there were earlier spikes in weeks 3 and 6, when numbers are traditionally relatively stable. Black-capped Chickadee was the only species observed on all 37 winter visits, and the mean daily count of 17.5 individuals was higher than in any previous winter. During winter 33 individuals were banded, a record 29 returns were processed, and 37 repeats were captured. Chickadees were also observed on all 7 MAPS visits, and 8 were banded.

RBNU: Red-breasted Nuthatch / Sittelle à poitrine rousse (*Sitta canadensis*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY						0.14	0.29	0.14	0.43		**0.10**
# DAYS OBSERVED						1	1	1	2		**5**
	FIRST OBSERVED: May 6			LAST OBSERVED: May 28			PEAK DATE: May 12, 28			NUMBER OF INDIVIDUALS: 2	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY		0.14	0.29	0.14	0.14		0.14			0.14				**0.08**
# DAYS OBSERVED		1	2	1	1		1			1				**7**
	FIRST OBSERVED: August 13				LAST OBSERVED: October 4			PEAK DATE: 7 dates				NUMBER OF INDIVIDUALS: 1		

Notes: Typically scarce in spring, but with observations unusually concentrated over just four consecutive weeks. Fall observations more scattered, and numbers lower than in any previous year. No winter or summer sightings.

WBNU: White-breasted Nuthatch / Sittelle à poitrine blanche (*Sitta carolinensis*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	0.14			0.43	0.14	0.14	0.29	0.57	0.14	0.14	**0.20**
# DAYS OBSERVED	1			2	1	1	1	3	1	1	**11**
	FIRST OBSERVED: March 29			LAST OBSERVED: May 31			PEAK DATE: 3 dates			NUMBER OF INDIVIDUALS: 2	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	1.57	1.57	2.43	1.57	1.86	1.29	0.71	1.00	0.57	1.29	0.86	1.57	0.57	**1.37**
# DAYS OBSERVED	6	7	6	6	6	7	4	5	4	5	3	5	2	**66**
# PROCESSED											1			**1**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 28			PEAK DATE: September 8				NUMBER OF INDIVIDUALS: 5		

Notes: Present in all but two weeks of spring, but much scarcer than usual. Fall numbers slightly above average, with a weak August peak as usual. The individual banded in October was the first banded in nearly two years, and only the sixth overall. Observed on 12 days in winter and during 3 of 7 MAPS sessions in summer, all of them in July.

BRCR: Brown Creeper / Grimpereau brun (*Certhia americana*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	0.14			0.86							**0.10**
# DAYS OBSERVED	1			3							**4**
# PROCESSED				1							**1**
	FIRST OBSERVED: March 31			LAST OBSERVED: April 22			PEAK DATE: April 19			NUMBER OF INDIVIDUALS: 3	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY		0.14	0.14				0.43	0.86	0.57	1.14		0.14	0.57	**0.31**
# DAYS OBSERVED		1	1				3	4	3	4		1	3	**20**
# PROCESSED		1					1	3		7			2	**14**
	FIRST OBSERVED: August 12				LAST OBSERVED: October 30			PEAK DATE: October 7				NUMBER OF INDIVIDUALS: 3		

Notes: Spring observations were typically scarce, and concentrated in week 4 as usual. Numbers observed and banded were both record highs in fall, peaking as usual in week 10. Observed on 5 dates throughout winter. No summer sightings.

CARW: Carolina Wren / Troglodyte de Caroline (*Thryothorus ludovicianus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY									0.14		**0.01**
# DAYS OBSERVED									1		**1**
	FIRST OBSERVED: May 29			LAST OBSERVED: May 29			PEAK DATE: May 29			NUMBER OF INDIVIDUALS: 1	

Notes: The only record this year was a lone individual on May 29. This was just the second sighting at MBO, and close to the previous one on June 2, 2009.

HOWR: House Wren / Troglodyte familier (*Troglodytes aedon*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY					0.71	2.14	3.57	5.57	7.00	5.57	**2.46**
# DAYS OBSERVED					2	7	7	7	7	7	**37**
# PROCESSED					0-1-0	2	1-0-2	1-0-7	1-0-1	0-0-1	**5-1-11**
	FIRST OBSERVED: April 30			LAST OBSERVED: June 5			PEAK DATE: May 19			NUMBER OF INDIVIDUALS: 12	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	4.29	2.86	2.29	0.71	0.14	1.00	1.14	1.14	0.57	0.29		0.14		**1.12**
# DAYS OBSERVED	7	7	6	4	1	4	5	4	3	1		1		**43**
# PROCESSED	5	1-0-2	2	0-0-1			0-0-1	1						**9-0-4**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 21			PEAK DATE: August 5			NUMBER OF INDIVIDUALS: 7			

Notes: More common than ever before in spring, yet numbers below average in fall. Spring numbers peaked in week 9 as usual, matching the long-term average, but the daily mean that week was a record high. As usual, fall numbers peaked in week 1 and tapered off by early October, although for the second time there was a straggler in week 12. Unusually few banded in fall for a second straight year. No winter sightings, but present during all 7 MAPS sessions in summer, including 3 banded.

WIWR: Winter Wren / Troglodyte mignon (*Troglodytes troglodytes*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY				0.29	0.29	0.14		0.14			**0.09**
# DAYS OBSERVED				2	1	1		1			**5**
	FIRST OBSERVED: April 18			LAST OBSERVED: May 22			PEAK DATE: April 27			NUMBER OF INDIVIDUALS: 2	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY					0.14				0.29	0.57	0.14		0.14	**0.10**
# DAYS OBSERVED					1				1	2	1		1	**6**
# PROCESSED									1		1			**2**
	FIRST OBSERVED: September 2				LAST OBSERVED: October 26			PEAK DATE: Sep 28, Oct 3, Oct 4			NUMBER OF INDIVIDUALS: 2			

Notes: Typically scarce in spring with five individuals scattered over a five-week span. Aside from an early arrival in the first week of September and a straggler in the final week of October, all other fall migrants were concentrated in late September and early October, matching the traditional week 10 peak. No winter or summer sightings.

MAWR: Marsh Wren / Troglodyte des marais (*Cistothorus palustris*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY					0.14						**0.01**
# DAYS OBSERVED					1						**1**
	FIRST OBSERVED: May 1			LAST OBSERVED: May 1			PEAK DATE: May 1			NUMBER OF INDIVIDUALS: 1	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY									0.29	0.43				**0.05**
# DAYS OBSERVED									2	3				**5**
	FIRST OBSERVED: September 30				LAST OBSERVED: October 5			PEAK DATE: 5 dates			NUMBER OF INDIVIDUALS: 1			

Notes: Observed in spring for only the third time in seven years, with a single individual on May 1, earlier than any previous records. A lone individual was heard singing almost daily and seen occasionally during a six-day span from September 30 to October 5, always at the southeast end of Stoneycroft Pond. This date range matched observations from 2005, but was later than all other fall records from 2006, 2007, 2009, and 2010. No winter sightings, but observed twice in July.

GCKI: Golden-crowned Kinglet / Roitelet à couronne dorée (*Regulus satrapa*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY		0.14	0.57	0.14	0.14	0.14	0.14				**0.13**
# DAYS OBSERVED		1	2	1	1	1	1				**7**
# PROCESSED				1		1					**2**
	FIRST OBSERVED: April 7			LAST OBSERVED: May 13			PEAK DATE: April 16			NUMBER OF INDIVIDUALS: 3	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY							0.29	1.14	7.14	7.43	2.00	5.86	1.29	**1.93**
# DAYS OBSERVED							1	4	7	5	3	7	3	**30**
# PROCESSED							2	4	20-0-3	24-0-4	1	15	4	**70-0-7**
	FIRST OBSERVED: September 17				LAST OBSERVED: October 28			PEAK DATE: October 4			NUMBER OF INDIVIDUALS: 25			

Notes: Spring numbers matched last year's record low, but at least this year two were banded. Fall sightings began one week earlier than usual in week 7, and peaked as usual in week 10. Numbers observed in fall were slightly below average, although the number banded was above average. Only one winter record on January 11. No summer sightings.

RCKI: Ruby-crowned Kinglet / Roitelet à couronne rubis (*Regulus calendula*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY				0.14	7.86	27.43	6.43	0.29	0.43		**4.26**
# DAYS OBSERVED				1	6	7	7	1	3		**25**
# PROCESSED				1	6	30-0-4	5		1		**43-0-4**
	FIRST OBSERVED: April 22			LAST OBSERVED: May 26			PEAK DATE: May 3			NUMBER OF INDIVIDUALS: 78	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY							0.57	5.86	23.86	23.29	4.29	6.29	2.29	**5.11**
# DAYS OBSERVED							2	6	7	7	6	6	6	**40**
# PROCESSED								18	67-0-14	59-0-27	11-0-16	18-0-6	7-0-3	**180-0-66**
	FIRST OBSERVED: September 16				LAST OBSERVED: October 30			PEAK DATE: October 4			NUMBER OF INDIVIDUALS: 50			

Notes: Spring numbers rebounded nicely after two low years, thanks to a very strong movement in week 6, one week later than the typical peak. Fall arrivals this year were delayed, usually starting in week 6, but not becoming regular this year until week 8. Fall numbers observed and banded were both the lowest ever, and the peak of 24 in week 9 (one week earlier than usual) was well below the previous low peak of 37. One winter record of a lingering migrant on November 1. No summer sightings.

EABL: Eastern Bluebird / Merlebleu de l'est (*Sialia sialis*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY						0.14		0.43	1.86	2.00	**0.44**
# DAYS OBSERVED						1		2	7	7	**17**
	FIRST OBSERVED: May 8			LAST OBSERVED: June 5			PEAK DATE: June 4			NUMBER OF INDIVIDUALS: 3	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY													0.29	**0.02**
# DAYS OBSERVED													2	**2**
	FIRST OBSERVED: October 27				LAST OBSERVED: October 30			PEAK DATE: Oct 27, Oct 30			NUMBER OF INDIVIDUALS: 1			

Notes: Using a nest box for the first time (#18, along the path to the owl nets), observed daily in late spring and producing 4 young, which we banded in early July. Unusually scarce in fall, with just two individuals observed in the final week. No winter sightings, but observed on the first four MAPS visits in summer.

VEER: Veery / Grive fauve (*Catharus fuscescens*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY							0.86	0.57			**0.14**
# DAYS OBSERVED							4	3			**7**
# PROCESSED							0-1-0	0-1-0			**0-2-0**
	FIRST OBSERVED: May 9			LAST OBSERVED: May 22			PEAK DATE: 3 dates			NUMBER OF INDIVIDUALS: 2	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.43	0.57	0.57	0.57	0.29	0.29		0.14	0.14	0.14				**0.24**
# DAYS OBSERVED	3	4	3	3	2	2		1	1	1				**20**
# PROCESSED	2	1-1-2	1-0-3	2-0-1	2	1		1						**10-1-6**
	FIRST OBSERVED: August 3				LAST OBSERVED: October 5			PEAK DATE: Aug 20, Aug 26			NUMBER OF INDIVIDUALS: 2			

Notes: Unusually scarce in spring, with all observations in weeks 7 and 8, rather than the usual build to a week 10 peak. Present unusually long in fall, but in lower than normal numbers. No winter records. Observed during 5 of 7 MAPS sessions, but not banded in summer for the first time ever.

GCTH: Gray-cheeked Thrush / Grive à joues grises (*Catharus minimus*)

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY								0.29	0.14					**0.03**
# DAYS OBSERVED								2	1					**3**
# PROCESSED								2	1					**3**
	FIRST OBSERVED: September 21				LAST OBSERVED: September 27			PEAK DATE: Sep 21, Sep 25, Sep 27			NUMBER OF INDIVIDUALS: 1			

Notes: Missed in spring for the third time in the past five years. Fall observations were limited to week 8 and 9, as is common for this species. No winter or summer sightings.

BITH: Bicknell's Thrush / Grive de Bicknell (*Catharus bicknelli*)

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY									0.14					**0.01**
# DAYS OBSERVED									1					**1**
# PROCESSED									1					**1**
	FIRST OBSERVED: September 26				LAST OBSERVED: September 26			PEAK DATE: September 26			NUMBER OF INDIVIDUALS: 1			

Notes: Observed and banded at MBO for just the third time on September 26, one week earlier than the previous fall record.

SWTH: Swainson's Thrush / Grive à dos olive (*Catharus ustulatus*)

MARCH	APRIL						MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY							0.14				**0.01**
# DAYS OBSERVED							1				**1**
	FIRST OBSERVED: May 15			LAST OBSERVED: May 15			PEAK DATE: May 15			NUMBER OF INDIVIDUALS: 1	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.29		0.14		0.29	0.43	0.71	1.14	0.86	0.43				**0.33**
# DAYS OBSERVED	1		1		2	2	3	5	3	3				**20**
# PROCESSED	2		1		2	3	1-0-2	6	5	1-0-1				**21-0-3**
	FIRST OBSERVED: August 2				LAST OBSERVED: October 6			PEAK DATE: September 25			NUMBER OF INDIVIDUALS: 4			

Notes: Scarce as always in spring; the third year in a row limited to a single spring record, but the earliest one ever. As has been the case in recent years, a few molt migrants arrived in August, followed by the main migration in September, tapering off in early October. No winter or summer records.

HETH: Hermit Thrush / Grive solitaire (*Catharus guttatus*)

MARCH	APRIL						MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY					0.43	0.29				0.14	**0.09**
# DAYS OBSERVED					2	1				1	**4**
	FIRST OBSERVED: April 27			LAST OBSERVED: May 30			PEAK DATE: April 30, May 7			NUMBER OF INDIVIDUALS: 2	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY									0.29	2.71	1.71	1.14	0.86	**0.52**
# DAYS OBSERVED									2	5	5	6	4	**22**
# PROCESSED									1-0-1	14	8-0-1	3-0-3	2	**28-0-5**
	FIRST OBSERVED: September 30				LAST OBSERVED: October 29			PEAK DATE: October 6			NUMBER OF INDIVIDUALS: 10			

Notes: Scarce in spring as usual, with a typical peak around weeks 5 and 6, but also a surprise late migrant at the end of May. Fall numbers lower than in any previous year, and peaking in week 10, rather than week 11 as always before. Fewer banded than in any fall since 2005. No winter or summer records.

WOTH: Wood Thrush / Grive des bois (*Hylocichla mustelina*)

MARCH	APRIL						MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY							0.14			0.29	**0.04**
# DAYS OBSERVED							1			2	**3**
	FIRST OBSERVED: May 14			LAST OBSERVED: May 31			PEAK DATE: 3 dates			NUMBER OF INDIVIDUALS: 1	

Notes: Typically scarce in spring, with three sightings of lone individuals in May. Missed in fall for the first time since 2006. No winter or summer records.

AMRO: American Robin / Merle d'Amérique (*Turdus migratorius*)

MARCH	APRIL				MAY						JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	7.71	12.14	12.43	16.57	13.29	13.71	7.43	5.57	4.00	2.00	**9.49**
# DAYS OBSERVED	7	7	7	7	7	7	7	7	7	6	**69**
# PROCESSED				14	6	6	1	1	2		**30**
	FIRST OBSERVED: March 28			LAST OBSERVED: June 5			PEAK DATE: April 11, April 18		NUMBER OF INDIVIDUALS: 27		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	16.86	16.00	13.00	14.14	8.14	6.86	5.14	16.29	41.29	79.29	87.43	217.00	275.14	**61.27**
# DAYS OBSERVED	7	7	7	6	7	7	4	7	7	7	7	7	7	**87**
# PROCESSED	9	2	1					1	4		1	8	53	**79**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 30			PEAK DATE: October 18			NUMBER OF INDIVIDUALS: 485			

Notes: Present weekly in both spring and fall as in all previous years. Spring numbers peaked in week 4, which is typical, and overall abundance was normal although a record number of individuals were banded. Fall numbers above average throughout August, fairly typical in September, and then well below average in October, with the peak delayed to week 13 for the first time. Far fewer birds banded in fall than ever before. Present throughout winter, observed during 13 visits, including every month except December. Observed on all 7 MAPS visits, and 14 banded in summer, a record high.

GRCA: Gray Catbird / Moqueur chat (*Dumetella carolinensis*)

MARCH	APRIL				MAY						JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY					0.14	0.14	1.00	3.14	5.43	2.14	**1.20**
# DAYS OBSERVED					1	1	3	6	7	7	**25**
# PROCESSED							2	5-2-2	3-1-7	2	**12-3-9**
	FIRST OBSERVED: May 1			LAST OBSERVED: June 5			PEAK DATE: May 21		NUMBER OF INDIVIDUALS: 8		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	4.43	4.29	5.14	4.14	2.86	4.00	5.43	6.57	5.71	2.43	0.14			**3.47**
# DAYS OBSERVED	7	7	7	7	7	6	6	7	7	6	1			**68**
# PROCESSED	6-0-6	3-0-4	3-0-2	2-0-4	0-0-5	3-0-2	8-0-2	6-0-5	7-0-4	0-0-1				**38-0-35**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 10			PEAK DATE: September 22			NUMBER OF INDIVIDUALS: 11			

Notes: Spring numbers and patterns of occurrence were all typical aside from an earlier than usual first arrival. Fall numbers steady through most of August and September, though somewhat below average and with fewer banded than in any fall except 2010. No winter records. Observed on 6 of 7 MAPS visits, and 7 banded in summer, a record high.

BRTH: Brown Thrasher / Moqueur roux (*Toxostoma rufum*)

MARCH	APRIL				MAY						JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY					0.71	1.43	0.43	0.29	0.43	0.29	**0.36**
# DAYS OBSERVED					3	5	3	2	3	2	**18**
# PROCESSED					1	1					**2**
	FIRST OBSERVED: April 29			LAST OBSERVED: June 4			PEAK DATE: May 2		NUMBER OF INDIVIDUALS: 4		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY				0.14			0.14	0.29	0.14	0.14				**0.07**
# DAYS OBSERVED				1			1	1	1	1				**5**
# PROCESSED										1				**1**
	FIRST OBSERVED: August 23				LAST OBSERVED: October 3			PEAK DATE: September 20			NUMBER OF INDIVIDUALS: 2			

Notes: As usual, observed in low numbers over the final six weeks of spring. August records unusually scarce, and September numbers also lower than usual; just one banded in fall for the second straight year. No winter sightings, and only one in summer on June 14.

EUST: European Starling / Étourneau sansonnet (*Sturnus vulgaris*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	2.57	0.86	7.14	10.29	7.43	2.29	1.14	1.86	0.14	4.14	**3.79**
# DAYS OBSERVED	5	4	7	7	7	6	6	2	1	5	**50**
# PROCESSED				2							**2**
	FIRST OBSERVED: April 28			LAST OBSERVED: June 5			PEAK DATE: April 21			NUMBER OF INDIVIDUALS: 32	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	3.43	3.43	0.57	1.43	0.29	1.29	0.43	15.57	10.00	9.14	18.57	23.71	46.29	**10.32**
# DAYS OBSERVED	5	1	1	1	1	2	1	6	7	6	5	6	7	**49**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 30			PEAK DATE: October 27			NUMBER OF INDIVIDUALS: 109			

Notes: Present weekly in both spring and fall, though scarce over the first half of fall. The spring peak in week 4 was two weeks later than usual. The fall peak in week 13 matched normal timing, but numbers were low. Observed on 16 days throughout winter, and on 3 of 7 MAPS visits in summer, including one banded.

AMPI: American Pipit / Pipit d'Amérique (*Anthus rubescens*)

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY									0.29	0.43				**0.05**
# DAYS OBSERVED									1	1				**2**
	FIRST OBSERVED: October 2				LAST OBSERVED: October 4			PEAK DATE: October 4			NUMBER OF INDIVIDUALS: 3			

Notes: Missed in spring for a second straight year. Fall sightings limited to two dates in the first week of October. No winter or summer records.

BOWA: Bohemian Waxwing / Jaseur boréal (*Bombycilla garrulus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	26.71	31.29	10.57	42.43	9.57	3.86					**12.44**
# DAYS OBSERVED	3	5	4	6	3	3					**24**
	FIRST OBSERVED:			LAST OBSERVED:			PEAK DATE: March 31			NUMBER OF INDIVIDUALS: 163	

Notes: Much more abundant and consistent than in any previous spring, and extending well into the banding season for the first time, although still none were caught. Numbers peaked later than usual, in week 4, perhaps reflecting the cold start to spring. Winter observations were limited to 9 occasions between January and March. No summer records.

CEDW: Cedar Waxwing / Jaseur d'Amérique (*Bombycilla cedrorum*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	11.00	18.14	6.43	24.00	3.00	28.43	10.00	13.00	25.00	26.14	**16.51**
# DAYS OBSERVED	4	3	3	6	2	6	6	7	7	7	**51**
# PROCESSED				5		3	9	2-0-1	24	7	**50-0-1**
	FIRST OBSERVED: March 31			LAST OBSERVED: May 5			PEAK DATE: May 3			NUMBER OF INDIVIDUALS: 128	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	23.86	23.57	28.57	24.29	32.29	17.43	13.43	18.43	13.57	16.14	3.14	5.57	2.43	**17.21**
# DAYS OBSERVED	7	7	7	7	7	7	5	5	5	6	4	4	4	**75**
# PROCESSED	14-0-1	7-0-1	6	4	6-0-1	7	1							**45-0-3**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 29			PEAK DATE: October 3			NUMBER OF INDIVIDUALS: 63			

Notes: A great year for Cedar Waxwing, with far above average numbers observed and banded in spring, and record highs in both categories in fall. There were three waves of spring migration, one matching the typical peak in weeks 9 and 10, but also two earlier ones in weeks 4 and 6. The 24 individuals banded in week 9 was a single-week record in any season. Fall numbers were at record levels throughout August, then peaked in the first week of September before dropping to roughly half that level for another month and then tapering off during the final three weeks of October. Also far more abundant in winter than ever before, with 9 records between mid-January and mid-March, with daily counts as high as 69 in late January. Observed on all 7 MAPS visits, in higher numbers than any previous summer, and with 2 individuals banded.

OVEN: Ovenbird / Paruline couronnée (*Seiurus atricapilla*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY							0.57	2.14	2.43	1.57	**0.67**
# DAYS OBSERVED							4	7	6	7	**24**
# PROCESSED								1			**1**
	FIRST OBSERVED: May 9			LAST OBSERVED: June 5			PEAK DATE: May 24		NUMBER OF INDIVIDUALS: 6		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	1.00	0.86	0.86	1.86	1.14	0.71	0.71	0.71						**0.60**
# DAYS OBSERVED	5	3	3	5	5	4	2	4						**31**
# PROCESSED	5-0-2	6	6	12	7-1-0	4-0-1	3	4						**47-1-3**
	FIRST OBSERVED: August 1				LAST OBSERVED: September 25			PEAK DATE: August 27			NUMBER OF INDIVIDUALS: 5			

Notes: Observed over the final four weeks of spring, peaking later than usual in week 9. Fall numbers fairly steady through the first 8 weeks, but with a peak in week 8, contributing to a record number banded this fall. No winter records. Present on 4 of 7 MAPS visits in summer, including 2 individuals banded.

NOWA: Northern Waterthrush / Paruline des ruisseaux (*Parkesia noveboracensis*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY					0.14		1.57	2.57	3.57	1.00	**0.89**
# DAYS OBSERVED					1		5	7	7	4	**24**
# PROCESSED							2	8	15-0-6	3	**28**
	FIRST OBSERVED: May 1			LAST OBSERVED: June 5			PEAK DATE: May 22, May 23		NUMBER OF INDIVIDUALS: 7		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.29	0.29	0.29	0.29	2.14	0.43	0.14							**0.14**
# DAYS OBSERVED	2	2	2	1	5	3	1							**16**
# PROCESSED	2	2	0-0-2	2	15	2-0-2								**23-0-4**
	FIRST OBSERVED: August 1				LAST OBSERVED: September 18			PEAK DATE: September 2			NUMBER OF INDIVIDUALS: 6			

Notes: A record early arrival on May 1 was followed by a typical week 9 spring peak, although numbers observed were well above normal and a record number were banded. Conversely, fall numbers were unusually low, except during the traditional peak of week 5. No winter or summer records.

BAWW: Black-and-white Warbler / Paruline noir et blanc (*Mniotilta varia*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY						0.57	0.71	0.86	0.43		**0.26**
# DAYS OBSERVED						3	4	5	2		**14**
# PROCESSED						2		1	2		**5**
	FIRST OBSERVED: May 3			LAST OBSERVED: May 25			PEAK DATE: 4 dates		NUMBER OF INDIVIDUALS: 2		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.86	1.14	1.14	2.29	2.29	0.71	0.71	0.29						**0.73**
# DAYS OBSERVED	4	4	5	5	7	3	3	1						**32**
# PROCESSED	2-0-3	3	4-0-1	5-0-2	4-0-2	1-0-1	2-0-1	1						**21-0-10**
	FIRST OBSERVED: August 1				LAST OBSERVED: September 25			PEAK DATE: August 30			NUMBER OF INDIVIDUALS: 6			

Notes: Somewhat scarce over a fairly narrow migration in May. Fall numbers typical, but peaking 1-2 weeks later than usual. No winter records. Observed during the final two MAPS visits, including 3 individuals banded.

TEWA: Tennessee Warbler / Paruline obscure (*Oreothlypis peregrina*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY							1.14	6.57	14.00	0.14	**2.19**
# DAYS OBSERVED							2	5	7	1	**15**
# PROCESSED							1	23	46-0-4	1	**71-0-4**
	FIRST OBSERVED: May 13			LAST OBSERVED: May 30			PEAK DATE: May 22		NUMBER OF INDIVIDUALS: 33		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	2.00	1.71	2.14	4.00	10.29	11.57	7.86	5.86	6.43	1.43	0.14			**4.11**
# DAYS OBSERVED	6	7	5	5	7	7	7	7	6	6	1			**64**
# PROCESSED	8-0-1	6	5-0-1	23-0-2	52-1-4	37-0-9	28-0-11	23-0-10	22-0-14	4-0-2	0-0-1			**208-1-55**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 10			PEAK DATE: September 30			NUMBER OF INDIVIDUALS: 23			

Notes: Well above average spring numbers, only slightly behind 2009, peaking in mid-late May as usual. Fall numbers observed and banded roughly double previous highs, although peaking 1-2 weeks ahead of usual. Numbers likely spiking due to a spruce budworm outbreak in Quebec. No winter records. Observed once in summer, an early migrant on July 31.

OCWA: Orange-crowned Warbler / Paruline verdâtre (*Oreothlypis celata*)

MARCH	APRIL				MAY						JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY								0.14			**0.01**
# DAYS OBSERVED								1			**1**
	FIRST OBSERVED: May 19			LAST OBSERVED: May 19			PEAK DATE: May 19			NUMBER OF INDIVIDUALS: 1	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY						0.14		0.14	0.43	1.14				**0.14**
# DAYS OBSERVED						1		1	3	1				**6**
# PROCESSED									2-0-1	2-0-1				**4-0-2**
	FIRST OBSERVED: September 10				LAST OBSERVED: October 3			PEAK DATE: October 3			NUMBER OF INDIVIDUALS: 8			

Notes: Observed for a third consecutive spring thanks to a lone bird on May 19. Scarcer than usual in fall, except for a particularly good movement of 8 individuals on October 3. No winter or summer sightings.

NAWA: Nashville Warbler / Paruline à joues grises (*Oreothlypis ruficapilla*)

MARCH	APRIL				MAY						JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY					0.29		1.86	3.14	1.14	0.14	**0.66**
# DAYS OBSERVED					1		3	6	3	1	**14**
# PROCESSED							1	6			**7**
	FIRST OBSERVED: May 1			LAST OBSERVED: June 5			PEAK DATE: May 20			NUMBER OF INDIVIDUALS: 9	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	2.57	1.57	2.43	4.29	6.29	7.00	5.71	3.14	4.57	2.43	0.14	0.57		**3.13**
# DAYS OBSERVED	7	5	5	6	7	7	6	5	7	4	1	4		**64**
# PROCESSED	12-0-1	2-0-2	4	10-0-5	22-0-6	22-0-3	19-0-1	18	22-0-2	8-0-1	0-0-1	2-0-1		**141-0-23**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 23			PEAK DATE: September 16			NUMBER OF INDIVIDUALS: 23			

Notes: Aside from an early arrival on May 1 and a gap in week 6, spring migration was close to typical, including the week 8 peak. Fall numbers peaked in the first half of September, just a bit earlier than usual. Lingered into week 12 for just the second time, and set a new late departure date of October 23. No winter or summer sightings.

MOWA: Mourning Warbler / Paruline triste (*Geothlypis philadelphia*)

MARCH	APRIL				MAY						JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY								0.29	1.71		**0.20**
# DAYS OBSERVED								1	4		**5**
# PROCESSED									4		**4**
	FIRST OBSERVED: May 18			LAST OBSERVED: May 28			PEAK DATE: May 25			NUMBER OF INDIVIDUALS: 5	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.14	0.14	0.43	0.29	0.57	0.14								**0.13**
# DAYS OBSERVED	1	1	2	2	4	1								**11**
# PROCESSED	1	1	1	1	3	0-0-1								**7-0-1**
	FIRST OBSERVED: August 7				LAST OBSERVED: September 7			PEAK DATE: August 15			NUMBER OF INDIVIDUALS: 2			

Notes: Limited to a narrow window in spring, as usual, but more than twice as numerous as in any previous year. Fall numbers somewhat lower than usual, with fewer banded than in any year since 2006 and only a weak peek in week 5, later than usual. No winter or summer records.

COYE: Common Yellowthroat / Paruline masquée (*Geothlypis trichas*)

MARCH	APRIL				MAY						JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY					0.57	0.71	3.71	6.57	6.14	6.71	**2.44**
# DAYS OBSERVED					2	2	7	7	7	7	**32**
# PROCESSED					0-1-0	3	9-0-2	10-3-1	7-1-2	1-1-1	**30-6-6**
	FIRST OBSERVED: April 29			LAST OBSERVED: June 5			PEAK DATE: May 22			NUMBER OF INDIVIDUALS: 13	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	7.57	6.57	9.86	4.43	3.71	6.14	4.71	5.57	0.86	0.43				**3.74**
# DAYS OBSERVED	7	7	7	7	6	7	6	7	2	2				**58**
# PROCESSED	9	10-0-6	10-0-4	11-1-2	8-0-1	7-0-4	10-1-1	13-1-1	1	1				**80-3-19**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 4			PEAK DATE: August 19			NUMBER OF INDIVIDUALS: 26			

Notes: Slightly above average in terms of both birds observed and banded in both spring and fall, including a record number banded in spring. The spring peak spanned the final three weeks of the season, while the fall peak was in week 3, compared to the first half of September in most previous years. No winter records. Observed on all 7 MAPS visits, including 3 banded.

AMRE: American Redstart / Paruline flamboyante (*Setophaga ruticilla*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY							2.29	2.29	2.57	0.14	**0.73**
# DAYS OBSERVED							3	4	7	1	**15**
# PROCESSED							2-1-0	7-1-0	5-1-1		**14-3-1**
	FIRST OBSERVED: May 13			LAST OBSERVED: May 31			PEAK DATE: May 13		NUMBER OF INDIVIDUALS: 14		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	4.57	5.29	10.71	10.14	9.86	4.86	3.57	1.43		0.14				**3.89**
# DAYS OBSERVED	6	7	7	7	7	5	6	5		1				**51**
# PROCESSED	20	22-0-3	25-0-8	31-1-5	26-0-5	10-0-2	12	3-0-2		1				**150-1-25**
	FIRST OBSERVED: August 7				LAST OBSERVED: October 3			PEAK DATE: August 26			NUMBER OF INDIVIDUALS: 31			

Notes: Spring migrants were earlier than usual, with steadily high numbers from week 7 through week 9 and a record number banded. Fall migration had a sustained three-week peak from week 3 through week 5, although remaining much more common than usual from weeks 6 through 8, and with one late straggler on October 3. Record number banded in fall, for a fifth straight year. No winter records. Breeding at MBO again this year, observed on 3 of 7 MAPS visits in summer, including one banded.

CMWA: Cape May Warbler / Paruline tigrée (*Setophaga tigrina*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY								0.29	0.14		**0.04**
# DAYS OBSERVED								2	1		**3**
# PROCESSED								1			**1**
	FIRST OBSERVED: May 16			LAST OBSERVED: May 25			PEAK DATE: 3 dates		NUMBER OF INDIVIDUALS: 1		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	1.71	0.29	0.71	0.71	0.86	0.43	0.29							**0.38**
# DAYS OBSERVED	7	2	4	3	4	2	2							**24**
# PROCESSED	6-0-2	1-0-1	2-0-2	4-0-1	3	2	1							**19-0-6**
	FIRST OBSERVED: August 1				LAST OBSERVED: September 18			PEAK DATE: August 3			NUMBER OF INDIVIDUALS: 4			

Notes: Typically scarce in spring, occurring in mid-late May as usual. Far more common in fall than ever before, observed weekly through week 7 although peaking in week 1. The 19 individuals banded this fall eclipsed the previous cumulative six-year total of 18! Likely on the increase due to a spruce budworm outbreak in Quebec. No winter or summer sightings.

NOPA: Northern Parula / Paruline à collier (*Setophaga americana*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY							0.29	1.00	0.43	0.14	**0.19**
# DAYS OBSERVED							1	4	2	1	**8**
# PROCESSED								3	1		**4**
	FIRST OBSERVED: May 14			LAST OBSERVED: May 30			PEAK DATE: May 22		NUMBER OF INDIVIDUALS: 4		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY					0.14	0.29	0.57	0.43						**0.11**
# DAYS OBSERVED					1	2	2	2						**7**
# PROCESSED								3						**3**
	FIRST OBSERVED: September 1				LAST OBSERVED: September 24			PEAK DATE: September 18			NUMBER OF INDIVIDUALS: 3			

Notes: Fairly typical pattern of occurrence and abundance in both spring and fall. No winter or summer records.

MAWA: Magnolia Warbler / Paruline à tête cendrée (*Setophaga magnolia*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY					0.14		3.29	2.86	3.71	1.00	**1.10**
# DAYS OBSERVED					1		3	6	6	3	**19**
# PROCESSED							6	8	12	1	**27**
	FIRST OBSERVED: May 1			LAST OBSERVED: June 4			PEAK DATE: May 13		NUMBER OF INDIVIDUALS: 20		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.14	0.71	1.86	7.71	17.43	13.86	12.86	6.43	0.71					**4.75**
# DAYS OBSERVED	1	2	4	7	7	7	6	7	4					**45**
# PROCESSED	1	2-0-1	4-0-1	43-0-3	79-0-7	52-0-4	38-0-6	28-0-2	5					**252-0-24**
	FIRST OBSERVED: August 5				LAST OBSERVED: October 2			PEAK DATE: September 16			NUMBER OF INDIVIDUALS: 45			

Notes: Although there was a record early migrant on May 1, spring numbers peaked slightly late in week 9. Fall abundance was at a record high, although peaking early in week 5 and gone by the end of week 9, unlike most years with at least a few into week 10. No winter or summer records.

BBWA: Bay-breasted Warbler / Paruline à poitrine baie (*Setophaga castanea*)

MARCH	APRIL				MAY						JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY							0.14	0.14			**0.03**
# DAYS OBSERVED							1	1			**2**
# PROCESSED								1			**1**
	FIRST OBSERVED: May 14			LAST OBSERVED: May 22			PEAK DATE: May 14, May 22		NUMBER OF INDIVIDUALS: 1		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY				0.29	0.43		0.29		0.14					**0.09**
# DAYS OBSERVED				1	2		2		1					**6**
# PROCESSED				2	3		2							**7**
	FIRST OBSERVED: August 26				LAST OBSERVED: September 27			PEAK DATE: Aug 26, Sep 3			NUMBER OF INDIVIDUALS: 2			

Notes: Typically scarce in spring, with just the fifth banding record for the season. A record number banded in fall, perhaps related to the spruce budworm outbreak in Quebec, although overall fall numbers were average. No winter or summer records.

BLBW: Blackburnian Warbler / Paruline à gorge orangée (*Setophaga fusca*)

MARCH	APRIL				MAY						JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY							0.29		0.14		**0.04**
# DAYS OBSERVED							1		1		**2**
	FIRST OBSERVED: May 14			LAST OBSERVED: May 29			PEAK DATE: May 14		NUMBER OF INDIVIDUALS: 2		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY				0.71	0.71	0.29	0.29	0.14						**0.16**
# DAYS OBSERVED				2	3	2	2	1						**10**
# PROCESSED				3	1	2								**6**
	FIRST OBSERVED: August 26				LAST OBSERVED: September 20			PEAK DATE: Aug 26, Aug 29			NUMBER OF INDIVIDUALS: 3			

Notes: Spring numbers typically scarce. Fall numbers well above average, likely related to the spruce budworm outbreak in Quebec. Present over five consecutive weeks for the first time, and with most observations in September compared to August in most years. No winter or summer sightings.

YWAR: Yellow Warbler / Paruline jaune (*Setophaga petechia*)

MARCH	APRIL				MAY						JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY					0.14	0.57	7.29	12.00	15.14	10.14	**4.53**
# DAYS OBSERVED					1	2	7	7	7	7	**31**
# PROCESSED							7-3-1	8-5-1	13-3-9	2-2-2	**30-13-13**
	FIRST OBSERVED: May 1			LAST OBSERVED: June 5			PEAK DATE: May 29		NUMBER OF INDIVIDUALS: 21		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	18.14	10.43	4.86	0.71		1.00								**2.70**
# DAYS OBSERVED	7	7	7	2		5								**28**
# PROCESSED	52-0-7	15-0-1	5-1-0	3										**75-1-8**
	FIRST OBSERVED: August 1				LAST OBSERVED: September 11			PEAK DATE: August 5			NUMBER OF INDIVIDUALS: 28			

Notes: Numbers slightly below normal in spring, but still among the most common species over the final four weeks of the season, peaking in week 9, which is average. Fall numbers record high, largely due to abundance and numbers banded in week 1 roughly double previous records for any week in fall. Only a few individuals remained by week 4, but then another small wave of migrants came through in week 6. No winter records. Observed on all 7 MAPS visits, including a record 11 banded.

CSWA: Chestnut-sided Warbler / Paruline à flancs marron (*Setophaga pensylvanica*)

MARCH	APRIL				MAY						JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY						0.14	1.29	1.29	2.57	1.29	**0.66**
# DAYS OBSERVED						1	4	6	7	6	**24**
# PROCESSED							1	3	3		**7**
	FIRST OBSERVED: May 7			LAST OBSERVED: June 5			PEAK DATE: 4 dates		NUMBER OF INDIVIDUALS: 4		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.29	1.43	1.57	2.71	2.14	0.71	0.71	0.86						**0.80**
# DAYS OBSERVED	2	7	5	4	6	3	2	3						**32**
# PROCESSED	1	3	1	15	7	3	2	4						**36**
	FIRST OBSERVED: August 3				LAST OBSERVED: September 25			PEAK DATE: August 26			NUMBER OF INDIVIDUALS: 11			

Notes: Numbers observed and banded above average in both spring and fall. The spring peak in week 9 was typical, while the fall peak in week 4 was one week later than usual. No winter sightings, but lone individuals observed twice in June.

BLPW: Blackpoll Warbler / Paruline rayée (*Setophaga striata*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY							0.14	3.14	15.43	2.43	**2.11**
# DAYS OBSERVED							1	3	7	3	**14**
# PROCESSED							1	8	31-0-3	5-0-1	**45-0-4**
	FIRST OBSERVED: May 13			LAST OBSERVED: June 1			PEAK DATE: May 29		NUMBER OF INDIVIDUALS: 27		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY				0.57	1.14	1.29	2.71	1.86	0.86	0.43				**0.68**
# DAYS OBSERVED				2	3	3	6	7	3	2				**26**
# PROCESSED				3	2	8	15	12	5	2				**47**
	FIRST OBSERVED: August 24				LAST OBSERVED: October 9			PEAK DATE: September 6			NUMBER OF INDIVIDUALS: 7			

Notes: A late spring migrant, observed in week 7 for just the second time. Peaking in week 9 for the sixth consecutive year, but with higher numbers than ever before. Fall migrants were between weeks 4 and 10 as always, with the peak right in the middle in week 7. Record number banded in fall. No winter or summer sightings.

BTBW: Black-throated Blue Warbler / Paruline bleue (*Setophaga caerulescens*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY							1.43	0.71	0.29		**0.24**
# DAYS OBSERVED							5	4	2		**11**
# PROCESSED							1				**1**
	FIRST OBSERVED: May 9			LAST OBSERVED: May 25			PEAK DATE: May 14		NUMBER OF INDIVIDUALS: 3		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	1.29	1.29	0.86	1.29	0.86	0.86	1.14	0.86	0.86	1.00				**0.79**
# DAYS OBSERVED	6	6	5	6	4	3	4	5	2	2				**43**
# PROCESSED	8-0-1	1-0-2	1	6	2	5	6-0-1	1	5	4				**39-0-4**
	FIRST OBSERVED: August 2				LAST OBSERVED: October 8			PEAK DATE: October 4			NUMBER OF INDIVIDUALS: 5			

Notes: Present during just a three-week window in spring, peaking earlier than usual in week 7. Observed weekly in fall through to week 10, but without much of a peak, except slightly more numerous in August (compared to September peaks in all previous years). No winter sightings, but lone individuals observed twice in June.

WPWA: Western Palm Warbler / Paruline à couronne rousse (*Setophaga palmarum palmarum*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY						0.57	1.29				**0.19**
# DAYS OBSERVED						3	2				**5**
	FIRST OBSERVED: May 3			LAST OBSERVED: May 14			PEAK DATE: May 13		NUMBER OF INDIVIDUALS: 8		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY							0.14	0.43	0.14					**0.05**
# DAYS OBSERVED							1	3	1					**5**
# PROCESSED								3	1					**4**
	FIRST OBSERVED: September 14				LAST OBSERVED: September 27			PEAK DATE: 5 dates			NUMBER OF INDIVIDUALS: 1			

Notes: More sightings this spring than in all previous years put together, all in the first half of May. Conversely, rarer than ever in fall, with only five individuals scattered over a span of two weeks in September, and with a record low number banded. No winter or summer records.

YPWA: Yellow Palm Warbler / Paruline à couronne rousse (*Setophaga palmarum hypochrysea*)

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY								0.14		0.29	0.29			**0.05**
# DAYS OBSERVED								1		1	2			**4**
# PROCESSED								1		1	1-0-1			**3-0-1**
	FIRST OBSERVED: September 25				LAST OBSERVED: October 12			PEAK DATE: October 4			NUMBER OF INDIVIDUALS: 2			

Notes: Missed in spring for the first time since 2006. Low numbers in fall, similar to the past three years. All observations in the first half of October except for one early individual on September 25. No winter or summer records.

MYWA: Yellow-rumped (Myrtle) Warbler / Paruline à croupion jaune (*Setophaga coronata*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY					7.86	18.43	29.29	25.71	3.71		**8.50**
# DAYS OBSERVED					4	7	7	7	3		**28**
# PROCESSED					4	26-0-1	22	48-0-2	2-0-1		**102-0-4**
	FIRST OBSERVED: April 27			LAST OBSERVED: May 25			PEAK DATE: May 13			NUMBER OF INDIVIDUALS: 104	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY			0.57	0.29	1.86	1.00	2.14	7.71	21.14	21.00	8.14	1.14	0.29	**5.02**
# DAYS OBSERVED			3	1	5	3	3	6	7	7	3	2	2	**42**
# PROCESSED					2	1	1	10	33-0-1	31	30-0-1			**108-0-2**
	FIRST OBSERVED: August 15				LAST OBSERVED: October 27			PEAK DATE: September 28			NUMBER OF INDIVIDUALS: 80			

Notes: Almost three times as abundant in spring as in any previous year, unsurprising given the massive influx of southbound migrants last fall. Numbers peaked in week 7 as usual, while more individuals were banded in week 9 than in any previous full spring season. Fall numbers were below average, but almost typical for an "odd" year. The fall peak spanning weeks 9 and 10 was right on schedule. No winter or summer records.

BTNW: Black-throated Green Warbler / Paruline à gorge noire (*Setophaga virens*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY					0.14	0.43	2.29	0.57	0.14		**0.36**
# DAYS OBSERVED					1	3	5	3	1		**13**
# PROCESSED									1		**1**
	FIRST OBSERVED: April 30			LAST OBSERVED: May 26			PEAK DATE: May 13			NUMBER OF INDIVIDUALS: 7	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY		0.29	0.43	1.57	1.29	1.14	1.86	0.71	0.14	0.57				**0.62**
# DAYS OBSERVED		1	1	4	4	4	4	2	1	2				**23**
# PROCESSED				5	4	5	2	2	1	2				**21**
	FIRST OBSERVED: August 13				LAST OBSERVED: October 7			PEAK DATE: Aug 24, Aug 30, Sep 7			NUMBER OF INDIVIDUALS: 5			

Notes: Continuing to arrive earlier each spring, with the first ever April sighting this year, although peaking in week 7 as usual. Always difficult to catch in spring, with the bird in week 9 only the fourth one over seven years. Present over a nine-week span in fall, in relatively typical numbers, but with a peak earlier than usual in week 7. No winter or summer records.

CAWA: Canada Warbler / Paruline du Canada (*Cardellina canadensis*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY								0.43	1.14	0.14	**0.17**
# DAYS OBSERVED								2	4	1	**7**
# PROCESSED								2	7	1	**10**
	FIRST OBSERVED: May 21			LAST OBSERVED: May 31			PEAK DATE: May 25			NUMBER OF INDIVIDUALS: 4	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY		0.57	1.43	0.71	0.86	0.86	0.43							**0.37**
# DAYS OBSERVED		2	5	4	3	5	2							**21**
# PROCESSED		3	3-0-2	4	2	2-0-1	3							**17-0-3**
	FIRST OBSERVED: August 11				LAST OBSERVED: September 14			PEAK DATE: August 19			NUMBER OF INDIVIDUALS: 4			

Notes: Typically scarce in spring, peaking in week 9 as usual, but with a record number banded. Fall peak also on schedule in week 3, with numbers observed and banded roughly average. No winter or summer records.

WIWA: Wilson's Warbler / Paruline à calotte noire (*Cardellina pusilla*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY								0.86	2.57	0.29	**0.37**
# DAYS OBSERVED								1	5	1	**7**
# PROCESSED								4	8-0-2	2	**14-0-2**
	FIRST OBSERVED: May 22			LAST OBSERVED: May 31			PEAK DATE: May 22, May 28			NUMBER OF INDIVIDUALS: 6	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY					3.57	5.00	2.00	1.00						**0.89**
# DAYS OBSERVED					6	7	5	3						**21**
# PROCESSED					15	18-0-2	8-0-2	5						**46-0-4**
	FIRST OBSERVED: August 29				LAST OBSERVED: September 25			PEAK DATE: 3 dates			NUMBER OF INDIVIDUALS: 8			

Notes: One of the late spring migrants, present only during a 10-day window and peaking in week 9 as usual. Also with a very compressed fall migration of less than one month, with numbers slightly above average. No winter or summer records.

EATO: Eastern Towhee / Tohi à flancs roux (*Pipilo erythrophthalmus*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY										0.14	**0.01**
# DAYS OBSERVED										1	**1**
	FIRST OBSERVED: June 2			LAST OBSERVED: June 2		PEAK DATE: June 2			NUMBER OF INDIVIDUALS: 1		

Notes: Only one sighting this year, on June 2. Just the second spring record ever at MBO.

ATSP: American Tree Sparrow / Bruant hudsonien (*Spizella arborea*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	6.86	2.43	1.43	3.00	2.29	0.14					**1.61**
# DAYS OBSERVED	7	5	5	5	5	1					**28**
# PROCESSED				6-1-1	9-0-1						**15-1-2**
	FIRST OBSERVED: March 28			LAST OBSERVED: May 2		PEAK DATE: March 30			NUMBER OF INDIVIDUALS: 30		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY										0.14		1.14	6.86	**0.63**
# DAYS OBSERVED										1		2	7	**10**
# PROCESSED												6	32-0-1	**38-0-1**
	FIRST OBSERVED: October 9				LAST OBSERVED: October 30			PEAK DATE: October 30				NUMBER OF INDIVIDUALS: 13		

Notes: Spring numbers well above average, with more individuals banded than all previous spring seasons combined. Peaking in week 1 as is common, but extending into May for only the second time. Except for one individual on October 9, fall migrants later than usual, peaking as expected in week 13, but continuing into winter. Observed during 33 of 37 winter visits, with 25 individuals banded. No summer sightings.

CHSP: Chipping Sparrow / Bruant familier (*Spizella passerina*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY					0.86	1.29	0.71	0.29	0.43		**0.36**
# DAYS OBSERVED					4	5	5	2	2		**18**
	FIRST OBSERVED: April 28			LAST OBSERVED: May 29		PEAK DATE: May 3			NUMBER OF INDIVIDUALS: 4		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.14			0.43	0.29	0.14	1.43	3.00	5.14	2.00	1.00	0.29		**1.07**
# DAYS OBSERVED	1			3	1	1	3	5	5	4	2	2		**27**
# PROCESSED	1			2		1	1	11	12-0-1	4	1			**33-0-1**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 21			PEAK DATE: September 28				NUMBER OF INDIVIDUALS: 16		

Notes: Record low numbers in spring, and absent during week 10 for the first time ever. A week peak in week 6 was slightly earlier than usual. Scarce for the first half of fall, but then unusually common in late September and early October, with a new record of 33 banded. No winter sightings, but lone individuals observed once in June and twice in July.

CCSP: Clay-colored Sparrow / Bruant des plaines (*Spizella pallida*)

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY												0.14		**0.01**
# DAYS OBSERVED												1		**1**
	FIRST OBSERVED: October 18				LAST OBSERVED: October 18			PEAK DATE: October 18				NUMBER OF INDIVIDUALS: 1		

Notes: The only observation was a lone individual on October 18, the latest ever recorded at MBO and only the fifth overall.

FISP: Field Sparrow / Bruant des champs (*Spizella pusilla*)

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY							0.14							**0.01**
# DAYS OBSERVED							1							**1**
	FIRST OBSERVED: September 18				LAST OBSERVED: September 18			PEAK DATE: September 18				NUMBER OF INDIVIDUALS: 1		

Notes: The only observation was a lone individual on September 18, one week earlier than last year's one sighting.

VESP: Vesper Sparrow / Bruant vespéral (*Pooecetes gramineus*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY				0.14	0.14						**0.03**
# DAYS OBSERVED				1	1						**2**
	FIRST OBSERVED: April 24			LAST OBSERVED: April 25		PEAK DATE: April 24, April 25			NUMBER OF INDIVIDUALS: 1		

Notes: Limited to just two sightings on consecutive days in April, only the fifth and sixth records for MBO.

SAVS: Savannah Sparrow / Bruant des prés (*Passerculus sandwichensis*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY				0.14	0.29						**0.04**
# DAYS OBSERVED				1	2						**3**
	FIRST OBSERVED: April 24			LAST OBSERVED: April 28		PEAK DATE: 3 dates			NUMBER OF INDIVIDUALS: 1		

Notes: Unusually scarce in spring for a second straight year, with only three sightings of lone individuals in late April. Missed in fall for the second time in three years.

FOSP: Fox Sparrow / Bruant fauve (*Passerella iliaca*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY			1.71	6.57	2.86	1.29	0.14				**1.26**
# DAYS OBSERVED			6	6	7	6	1				**26**
# PROCESSED				12-0-3	4-0-3	1	1				**18-0-6**
	FIRST OBSERVED: April 12			LAST OBSERVED: May 9		PEAK DATE: April 19			NUMBER OF INDIVIDUALS: 13		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY										0.43	0.14	1.14	0.43	**0.16**
# DAYS OBSERVED										2	1	4	3	**10**
# PROCESSED										1	0-0-1	3	1-0-1	**5-0-2**
	FIRST OBSERVED: October 4				LAST OBSERVED: October 29			PEAK DATE: October 21			NUMBER OF INDIVIDUALS: 3			

Notes: Somewhat late to arrive in spring, but peaked in week 4 as usual, and lingered later than ever before. Spring numbers somewhat above average. Fall arrival was on schedule, but numbers were exceptionally low, with only a weak peak in week 12, and matching the record low of 5 banded. Observed during the first four winter visits in November, but no summer records.

SOSP: Song Sparrow / Bruant chanteur (*Melospiza melodia*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	2.71	6.43	11.29	11.71	11.29	6.29	5.86	6.43	7.43	4.14	**7.36**
# DAYS OBSERVED	6	7	7	7	7	7	7	7	7	7	**69**
# PROCESSED				3-4-0	0-0-1		1-0-2	1-0-2	1-0-3	0-1-0	**6-5-8**
	FIRST OBSERVED: March 29			LAST OBSERVED: June 5		PEAK DATE: April 12, April 27			NUMBER OF INDIVIDUALS: 18		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	11.57	12.57	17.29	5.71	4.29	8.14	6.86	11.29	11.29	7.57	2.00	6.29	2.00	**8.22**
# DAYS OBSERVED	7	7	7	7	6	7	7	7	7	7	6	7	5	**87**
# PROCESSED	31-4-9	16-0-6	22-0-3	9-0-4	5-0-2	4-0-1	6-0-6	10-1-6	30-0-6	12-4-2	6-1-1	15-0-3	4-0-3	**170-10-52**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 29			PEAK DATE: August 19			NUMBER OF INDIVIDUALS: 43			

Notes: Numbers observed and banded both lower than ever in each of spring and fall, continuing a downward trend from 2010. Spring numbers peaked in week 4 as usual, although at a lower level than usual. Fall migration had two peaks, with local birds in good numbers for the first three weeks of August, and then presumably an influx of more northern birds in the second half of September. Just one winter observation, on November 1. Present during all 7 MAPS sessions this summer, with a good count of 18 individuals banded.

LISP: Lincoln's Sparrow / Bruant de Lincoln (*Melospiza lincolnii*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY							1.00	0.43	0.29		**0.17**
# DAYS OBSERVED							3	1	2		**6**
# PROCESSED							5	3	2		**10**
	FIRST OBSERVED: May 12			LAST OBSERVED: May 28		PEAK DATE: May 13			NUMBER OF INDIVIDUALS: 4		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.57		0.14				0.71	1.00		0.14				**0.20**
# DAYS OBSERVED	3		1				4	4		1				**13**
# PROCESSED	2-0-2						2	3						**7-0-2**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 3			PEAK DATE: September 25			NUMBER OF INDIVIDUALS: 3			

Notes: Compressed spring migration as usual, with the peak in week 7, one week earlier than usual. The number of individuals banded was a record high in spring and a record low in fall. However, among the fall bandings were two birds in juvenile plumage in week 1, a first for MBO, and suggestive of breeding closer than believed to be the case. Observations peaked weakly in week 8, as usual, but were unusually scarce overall. No winter or summer sightings.

SWSP: Swamp Sparrow / Bruant des marais (*Melospiza georgiana*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY			0.29	0.43	2.00	5.29	4.29	3.14	3.00	0.29	**1.87**
# DAYS OBSERVED			1	2	5	7	7	7	7	2	**38**
# PROCESSED				1	1	7-0-2	1	2-0-2			**12-0-4**
	FIRST OBSERVED: April 12			LAST OBSERVED: June 1			PEAK DATE: May 3			NUMBER OF INDIVIDUALS: 8	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.71	0.29	0.43	0.29		0.57	0.86	1.00	1.00	2.43	0.71	1.14	0.14	**0.74**
# DAYS OBSERVED	4	2	2	1		4	3	4	5	7	3	4	1	**40**
# PROCESSED	2	1	0-1-0	1		1	2	2-0-1	3	5-0-2	5	3-0-2	1	**26-1-5**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 25			PEAK DATE: Oct 3, Oct 4			NUMBER OF INDIVIDUALS: 4			

Notes: Present weekly in spring from week 3 onward, although scarce until late April. The peak was in early May, compared to late April in most years. Lower fall numbers than ever before, and missed in week 5 for the first time. The only good movement of migrants came in week 10, later than the usual peak. No winter records. Observed on all 7 MAPS visits, and 3 banded.

WTSP: White-throated Sparrow / Bruant à gorge blanche (*Zonotrichia albicollis*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	0.14		0.14	1.29	15.86	25.86	14.14	4.29	0.14		**6.19**
# DAYS OBSERVED	1		1	4	6	7	7	7	1		**34**
# PROCESSED				3	8	30-0-5	7-0-3	3			**41-0-8**
	FIRST OBSERVED: March 30			LAST OBSERVED: May 23			PEAK DATE: April 28			NUMBER OF INDIVIDUALS: 51	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.57	0.29	0.57	0.43	0.43	5.71	11.14	15.14	26.00	51.14	21.14	21.29	8.29	**12.47**
# DAYS OBSERVED	3	1	3	3	3	7	7	7	7	7	7	7	7	**69**
# PROCESSED	3-0-1	1-0-1	1-0-1	1	2-0-1	9-0-3	13-0-3	15-0-4	49-0-1	64-0-9	21-0-4	27-0-9	10-0-10	**216-0-47**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 30			PEAK DATE: October 4			NUMBER OF INDIVIDUALS: 100			

Notes: Observed in week 1 of spring for the second straight year, likely again an overwintering bird. Record high numbers observed this spring, although the number banded was just above average. Fall numbers observed lower than ever, and number banded also near a record low. Unusually scarce both in August and September, but with a decent peak right on schedule in week 10. Observed on 13 occasions in winter, less frequently from January onward, and likely involving just one or two lingering individuals. Observed on 3 of 7 MAPS visits, all of them in July, and 2 banded.

WCSP (EWCS): (Eastern) White-crowned Sparrow / Bruant à couronne blanche (*Zonotrichia leucophrys*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY					0.14	0.57	3.43	0.86			**0.50**
# DAYS OBSERVED					1	1	6	4			**12**
# PROCESSED						1	7	2			**10**
	FIRST OBSERVED: April 27			LAST OBSERVED: May 22			PEAK DATE: May 11, May 13			NUMBER OF INDIVIDUALS: 6	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY						0.57			4.43	20.00	0.29	0.71		**2.00**
# DAYS OBSERVED						1			5	7	1	2		**16**
# PROCESSED									4	10	1			**15**
	FIRST OBSERVED: September 7				LAST OBSERVED: October 21			PEAK DATE: October 3			NUMBER OF INDIVIDUALS: 50			

Notes: Below average numbers observed and banded in both spring and fall, although with strong peaks of movement in the traditional peaks of week 7 in spring and week 10 in fall. One winter record from November 1; no summer sightings.

SCJU: Slate-coloured Junco / Junco ardoisé (*Junco hyemalis*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	12.57	3.71	18.43	28.86	26.00	13.00	1.71				**10.43**
# DAYS OBSERVED	7	5	7	7	7	4	3				**40**
# PROCESSED				24-3-1	10-0-1	1	1				**36-3-2**
	FIRST OBSERVED: March 28			LAST OBSERVED: May 12		PEAK DATE: May 5			NUMBER OF INDIVIDUALS: 65		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY		0.14						0.14	2.57	4.14	4.86	13.14	16.71	**3.21**
# DAYS OBSERVED		1						1	7	7	5	7	7	**35**
# PROCESSED									6	7-0-1	9	24-0-1	12-3-2	**58-3-4**
	FIRST OBSERVED: August 10				LAST OBSERVED: October 30			PEAK DATE: Oct 25, Oct 27			NUMBER OF INDIVIDUALS: 26			

Notes: Near record numbers observed and banded in spring, second only to 2006. Numbers peaked in week 4 as usual, but the high count was surprisingly late on May 5, and more individuals lingered into week 7 than ever before. For the first time ever, one individual was observed in August, but most migrants only began arriving in late September as usual. Numbers peaked in week 13 as in almost all previous years, but the numbers observed and banded this fall were much lower than any other year except 2006. Observed on all but one of the 37 winter visits, with a record high mean daily count of 17.3, thanks largely to a prolonged late migration in November 2010 with counts as high as 82. The 150 individuals banded in winter was more than the sum of all previous winter bandings. A lone individual on July 4 was the first ever summer sighting.

SCTA: Scarlet Tanager / Tangara écarlate (*Piranga olivacea*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY							0.14	0.14	0.14	0.14	**0.06**
# DAYS OBSERVED							1	1	1	1	**4**
	FIRST OBSERVED: May 13			LAST OBSERVED: June 4		PEAK DATE: 4 dates			NUMBER OF INDIVIDUALS: 1		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY			0.29							0.14				**0.03**
# DAYS OBSERVED			2							1				**3**
# PROCESSED			1											**1**
	FIRST OBSERVED: August 18				LAST OBSERVED: October 4			PEAK DATE: Aug 18, Aug 19, Oct 4			NUMBER OF INDIVIDUALS: 1			

Notes: One sighting per week over the final four weeks of spring, which is close to average. For the third year in a row, just one individual banded in fall. Aside from two observations on consecutive dates in mid-August, there was just one unusually late sighting on October 4. No winter or summer sightings.

NOCA: Northern Cardinal / Cardinal rouge (*Cardinalis cardinalis*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	3.29	2.14	2.29	3.57	4.00	4.29	3.71	3.14	2.14	2.14	**3.07**
# DAYS OBSERVED	7	7	6	7	7	7	7	7	6	5	**66**
# PROCESSED				2-0-1	1	0-1-0					**3-1-1**
	FIRST OBSERVED: March 28			LAST OBSERVED: June 5		PEAK DATE: 3 dates			NUMBER OF INDIVIDUALS: 7		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	5.29	4.43	4.14	1.86	1.86	2.86	3.43	3.29	2.43	3.00	1.71	3.14	5.71	**3.32**
# DAYS OBSERVED	7	7	7	5	7	5	6	7	7	7	6	7	7	**85**
# PROCESSED	3	1	2		1	1			1-1-0		1-0-1	1-0-1	3-0-2	**14-1-4**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 30			PEAK DATE: October 30			NUMBER OF INDIVIDUALS: 13			

Notes: Observed weekly in spring and fall as in all previous years. Spring numbers peaked in late April and early May as usual, with overall numbers just a bit below normal. Fall numbers were again highest at the start and end of the season, with some fluctuations in between, but somewhat above average numbers overall, including a record count banded. Observed on 28 of 37 winter visits, including 5 banded. Recorded during all 7 MAPS visits in summer.

RBGR: Rose-breasted Grosbeak / Cardinal à poitrine rose (*Pheucticus ludovicianus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY						0.29	2.00	2.86	3.57	1.14	**0.99**
# DAYS OBSERVED						2	6	6	7	5	**26**
# PROCESSED								1			**1**
	FIRST OBSERVED: March 28			LAST OBSERVED: June 5		PEAK DATE: May 20			NUMBER OF INDIVIDUALS: 11		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	2.29	1.86	1.86	1.57	1.57	1.14	0.86	0.57						**0.90**
# DAYS OBSERVED	7	6	7	6	6	4	4	3						**43**
# PROCESSED	3	4	3		4-0-1	2	2							**18-0-1**
	FIRST OBSERVED: August 1				LAST OBSERVED: September 24			PEAK DATE: August 7			NUMBER OF INDIVIDUALS: 7			

Notes: Present weekly over the second half of spring as usual, but with the peak in week 9, one week later than in most years. A record low number banded in both spring and fall. Fall numbers observed also lower than ever, although following the usual pattern of peaking in week 1 and tapering off by late September. No winter records. Observed during just 2 of 7 MAPS visits.

INBU: Indigo Bunting / Passerin indigo (*Passerina cyanea*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY						0.14	0.43	0.71	2.14	1.71	**0.51**
# DAYS OBSERVED						1	1	3	5	6	**16**
	FIRST OBSERVED: May 8			LAST OBSERVED: June 5		PEAK DATE: May 29			NUMBER OF INDIVIDUALS: 8		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	5.29	2.43	1.43	2.14	2.14	2.14	2.86	3.14	0.43					**1.69**
# DAYS OBSERVED	7	7	4	6	6	6	5	7	2					**50**
# PROCESSED	7-1-0		1	9-0-1	7	9-0-2	10-0-2	5-0-3	0-1-2					**48-2-10**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 1			PEAK DATE: August 2			NUMBER OF INDIVIDUALS: 10			

Notes: Present weekly over the second half of spring as in 2010, and peaking in the final two weeks as usual. Missed in the nets for the first time ever in spring. Fall numbers were slightly above average overall, peaking in the first week and then remaining at a fairly stable lower level for the next two months, with the final record of the year a return from two years earlier. No winter records. Observed during 5 of 7 MAPS visits, and 2 individuals banded.

BOBO: Bobolink / Goglu des prés (*Dolichonyx oryzivorus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY						0.29	1.00	3.29	0.14		**0.47**
# DAYS OBSERVED						2	3	5	1		**11**
	FIRST OBSERVED: May 6			LAST OBSERVED: May 23		PEAK DATE: May 18			NUMBER OF INDIVIDUALS: 7		

Notes: Present over four weeks in May, peaking in week 8 as usual. No winter or summer records.

RWBL: Red-winged Blackbird / Carouge à épaulettes (*Agelaius phoeniceus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	31.43	29.29	42.86	41.00	45.00	53.86	46.57	48.00	39.29	31.57	**40.89**
# DAYS OBSERVED	7	7	7	7	7	7	7	7	7	7	**70**
# PROCESSED				3-1-0	8-2-2	15-1-1	23-1-1	13-1-1	6-0-2	2-0-1	**70-6-8**
	FIRST OBSERVED: March 28			LAST OBSERVED: June 5		PEAK DATE: May 7			NUMBER OF INDIVIDUALS: 81		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	27.43	30.57	2.14	19.14	3.14	5.43	8.29	20.29	101.00	260.57	219.29	306.14	461.00	**112.65**
# DAYS OBSERVED	7	6	5	3	4	4	2	7	7	7	7	7	7	**73**
# PROCESSED		1										8	9	**18**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 30			PEAK DATE: October 27			NUMBER OF INDIVIDUALS: 1200			

Notes: Present weekly in spring and fall, as in all previous years. Spring numbers were fairly average, but with only a weak peak in week 6. Fall numbers were unusually high throughout October. Winter records included three dates in November and the final four visits in March. Observed during all but the last of the MAPS visits in summer.

EAME: Eastern Meadowlark / Sturnelle des prés (*Sturnella magna*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY					0.14						**0.01**
# DAYS OBSERVED					1						**1**
	FIRST OBSERVED: April 30			LAST OBSERVED: April 30		PEAK DATE: April 30			NUMBER OF INDIVIDUALS: 1		

Notes: Limited to a single observation on April 30, the second earliest of MBO's four records to date.

RUBL: Rusty Blackbird / Quiscale rouilleux (*Euphagus carolinus*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY		0.29		0.14	1.14	0.14					**0.17**
# DAYS OBSERVED		2		1	3	1					**7**
	FIRST OBSERVED: April 7			LAST OBSERVED: May 6		PEAK DATE: April 29			NUMBER OF INDIVIDUALS: 6		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY					0.14	0.43	0.14	7.00	1.00	0.57	0.71	1.29	1.71	**1.00**
# DAYS OBSERVED					1	1	1	2	3	3	2	4	6	**23**
	FIRST OBSERVED: August 30				LAST OBSERVED: October 30			PEAK DATE: September 25			NUMBER OF INDIVIDUALS: 46			

Notes: Spring records were typically scarce and scattered, though with a slight peak in week 5 as usual. Fall observations began earlier than usual with a rare August sighting, and continued weekly through the end of the season, although numbers were generally below average outside of the peak in week 8. No winter or summer records.

COGR: Common Grackle / Quiscale bronzé (*Quiscalus quiscula*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	0.86	4.29	2.14	5.57	5.14	8.14	7.00	8.00	8.57	8.71	**5.84**
# DAYS OBSERVED	1	4	5	6	7	7	7	7	7	7	**58**
# PROCESSED						1		2	5	3	**11**
	FIRST OBSERVED: April 3			LAST OBSERVED: June 5		PEAK DATE: May 24			NUMBER OF INDIVIDUALS: 20		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	13.71	8.57	2.29	16.43	5.0	0.57	0.43	2.71	1.57	2.57	7.43	1.86	11.43	**5.74**
# DAYS OBSERVED	7	7	6	5	4	2	2	4	3	4	4	3	6	**57**
# PROCESSED	1												1	**2**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 30			PEAK DATE: August 24			NUMBER OF INDIVIDUALS: 95			

Notes: Present weekly in spring and fall, as in all previous years. Spring numbers building to a peak spanning the second half of the season. Fall numbers peaked in week 1 and overall were an order of magnitude lower than normal for fall, thanks to a complete absence of the typical September and October flocks. Winter records limited to an early flock of spring migrants on March 19. Observed during all but the last of the MAPS visits in summer, including one individual banded.

BHCO: Brown-headed Cowbird / Vacher à tête brune (*Molothrus ater*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY		0.14	2.14	2.86	8.29	10.43	4.71	4.29	3.57	2.14	**3.86**
# DAYS OBSERVED		1	4	5	7	7	7	7	7	6	**51**
# PROCESSED					3-1-1				1		**4-1-1**
	FIRST OBSERVED: April 10			LAST OBSERVED: June 5		PEAK DATE: April 27, May 4			NUMBER OF INDIVIDUALS: 20		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	0.57		0.14	0.29	0.14					0.29				**0.11**
# DAYS OBSERVED	1		1	2	1					1				**6**
# PROCESSED	1													**1**
	FIRST OBSERVED: August 3				LAST OBSERVED: October 5			PEAK DATE: August 3			NUMBER OF INDIVIDUALS: 4			

Notes: Spring numbers fairly typical, including the expected peak in week 6. Fall numbers below average, although one individual was banded, a first for fall. No winter records. Observed on 3 of 7 MAPS visits in summer.

BAOR: Baltimore Oriole / Oriole de Baltimore (*Icterus galbula*)

MARCH	APRIL					MAY				JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY						0.43	6.14	11.43	9.43	6.71	**3.41**
# DAYS OBSERVED						2	7	7	7	7	**30**
# PROCESSED							0-1-0	7-2-2	0-1-12		**7-4-14**
	FIRST OBSERVED: May 7			LAST OBSERVED: June 5		PEAK DATE: May 13			NUMBER OF INDIVIDUALS: 20		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	3.43	4.86	4.86	4.43	1.14									**1.44**
# DAYS OBSERVED	7	7	6	6	4									**30**
# PROCESSED	8-0-1	5-0-4	1	2-0-1										**16-0-6**
	FIRST OBSERVED: August 1				LAST OBSERVED: September 2			PEAK DATE: August 24			NUMBER OF INDIVIDUALS: 12			

Notes: Observed weekly over the second half of spring, with a distinct peak in week 8, as usual. Overall numbers higher than in any previous spring, yet a record low number were banded. Fall numbers were relatively stable for most of August, before rapidly tapering off in September. No winter records. Observed on 5 of 7 MAPS visits, including a record 9 banded.

PUFI: Purple Finch / Roselin pourpré (*Carpodacus purpureus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY						0.14	0.43				**0.06**
# DAYS OBSERVED						1	3				**4**
	FIRST OBSERVED: May 6			LAST OBSERVED: May 13			PEAK DATE: 4 dates			NUMBER OF INDIVIDUALS: 1	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY							0.14	0.14				0.14	0.14	**0.04**
# DAYS OBSERVED							1	1				1	1	**4**
	FIRST OBSERVED: September 17				LAST OBSERVED: October 30			PEAK DATE: 4 dates			NUMBER OF INDIVIDUALS: 1			

Notes: Unusually scarce this year, with just four observations of lone individuals in each of spring and fall, and none banded this year. There were also 2 winter observations in November. No summer records.

HOFI: House Finch / Roselin familier (*Carpodacus mexicanus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY							0.14	0.14			**0.03**
# DAYS OBSERVED							1	1			**2**
	FIRST OBSERVED: May 10			LAST OBSERVED: May 18			PEAK DATE: May 10, May 18			NUMBER OF INDIVIDUALS: 1	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY					0.29	0.14		0.71	0.57	0.14			1.29	**0.24**
# DAYS OBSERVED					1	1		3	2	1			3	**11**
	FIRST OBSERVED: September 3				LAST OBSERVED: October 30			PEAK DATE: October 29			NUMBER OF INDIVIDUALS: 5			

Notes: Always scarce in spring, this year limited to two sightings in mid-May. Fall sightings were typically scattered. Observed in good numbers (up to 60 individuals) on all 10 November visits, but then only observed once more later in 27 subsequent winter visits. A record 61 individuals were banded in winter. No summer records.

WWCR: White-winged Crossbill / Bec-croisé bifascié (*Loxia leucoptera*)

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY													0.29	**0.02**
# DAYS OBSERVED													1	**1**
	FIRST OBSERVED: October 28				LAST OBSERVED: October 28			PEAK DATE: October 28			NUMBER OF INDIVIDUALS: 2			

Notes: Observations this year limited to a flock of 3 individuals on November 16, and then a pair flying overhead nearly a year later during the final week of fall.

CORE: Common Redpoll / Sizerin flammé (*Acanthis flammea*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	10.71	2.86			0.29						**1.39**
# DAYS OBSERVED	2	1			1						**4**
	FIRST OBSERVED: March 28			LAST OBSERVED: April 25			PEAK DATE: March 29			NUMBER OF INDIVIDUALS: 45	

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY													0.43	**0.03**
# DAYS OBSERVED													1	**1**
	FIRST OBSERVED: October 30				LAST OBSERVED: October 30			PEAK DATE: October 30			NUMBER OF INDIVIDUALS: 3			

Notes: Observed in spring for just the second time, perhaps related to the cold weather in late March and early April. The two late birds observed on April 25 were quite a surprise. Observed in fall for just the fourth time, and as in all but one previous case, during the final week of the season. Winter numbers were higher than even during the big 2008-2009 irruption, with a mean daily count of 25 for the season, largely due to mean daily counts of 64 and 61 in February and March, respectively. There were also scattered records earlier in winter, on two dates in November and three in January. A record 53 individuals were banded, including 50 over two dates in March. No summer records.

HORE: Hoary Redpoll / Sizerin blanchâtre (*Acanthis hornemanni*)

Notes: A single Hoary Redpoll was observed with Common Redpolls on three occasions in February and March, and was banded in March, becoming the 107th species banded at MBO. Only observed at MBO once previously, in March 2006.

PISI: Pine Siskin / Tarin des pins (*Spinus pinus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	0.43			0.29				2.14	0.71	0.14	**0.37**
# DAYS OBSERVED	1			1				5	4	1	**12**
# PROCESSED								2	1		**3**
	FIRST OBSERVED: March 31			LAST OBSERVED: May 30			PEAK DATE: May 20		NUMBER OF INDIVIDUALS: 6		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY								0.14	0.14	5.00	11.29		3.29	**4.99**
# DAYS OBSERVED								1	1	7	4		5	**18**
# PROCESSED										1				**1**
	FIRST OBSERVED: September 23				LAST OBSERVED: October 30			PEAK DATE: October 3			NUMBER OF INDIVIDUALS: 150			

Notes: Present in spring for only the third time in seven years. There were two scattered sightings in the first half of spring, then more frequent observations during the final three weeks. One of the birds banded was a juvenile, suggesting that a pair must have nested nearby, undetected. Fall observations began earlier than ever before, with single individuals observed in each of week 8 and 9. The largest ever movement of Pine Siskins at MBO was observed on October 3, with a flock of 150 swirling around the site for a couple of hours. Sizeable flocks continued to be seen most days until mid-October, then they disappeared entirely again for a week before returning in smaller numbers in the final week of fall. There was only one winter observation, a lone individual seen on November 6. No summer records.

AMGO: American Goldfinch / Chardonneret jaune (*Spinus tristis*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY	0.29	1.29	0.57	1.86	4.43	7.00	8.29	8.86	11.43	4.86	**4.89**
# DAYS OBSERVED	2	5	2	5	6	7	6	7	7	7	**54**
# PROCESSED						2-1-0	2	5-0-1	7-1-1	1	**17-2-2**
	FIRST OBSERVED: March 28			LAST OBSERVED: June 5			PEAK DATE: May 25		NUMBER OF INDIVIDUALS: 30		

	AUGUST				SEPTEMBER					OCTOBER				
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	WEEK 11	WEEK 12	WEEK 13	**TOTAL**
MEAN # BIRDS / DAY	13.29	11.71	12.43	14.43	14.71	19.71	7.86	9.43	4.29	5.14	1.43	5.29	6.86	**9.74**
# DAYS OBSERVED	7	7	7	7	7	7	6	6	7	6	4	6	7	**84**
# PROCESSED			1-0-1	3	6	6					1			**17-0-1**
	FIRST OBSERVED: August 1				LAST OBSERVED: October 30			PEAK DATE: September 9			NUMBER OF INDIVIDUALS: 38			

Notes: Observed in all weeks of spring and fall, as in all previous years. Record low numbers observed and banded in both spring and fall. Spring observations were unusually scarce over the first four weeks, and even the peak in week 9 (two weeks later than usual) was lower than the usual average count for any week in May. The 17 birds banded in spring were less than one-third of the six-year mean of 55. Fall numbers followed the usual pattern of a fairly high plateau in August, increasing slightly to a peak in early-mid September, and then tapering off for the rest of the season. However, numbers were consistently below normal throughout the season, and the 17 birds banded were barely one-quarter of the six-year mean of 65. Numbers were better in winter, when American Goldfinch was present on the first 28 visits, plus half of the visits in March. The above-average 93 individuals banded were all in November. Observed during all 7 MAPS visits in summer, and one banded.

EVGR: Evening Grosbeak / Gros-bec errant (*Coccothraustes vespertinus*)

MARCH	APRIL					MAY					JUNE
	WEEK 1	WEEK 2	WEEK 3	WEEK 4	WEEK 5	WEEK 6	WEEK 7	WEEK 8	WEEK 9	WEEK 10	**TOTAL**
MEAN # BIRDS / DAY			0.43								**0.04**
# DAYS OBSERVED			1								**1**
	FIRST OBSERVED: April 15			LAST OBSERVED: April 15			PEAK DATE: April 15		NUMBER OF INDIVIDUALS: 3		

Notes: Observed only on November 6 and 11 in winter, and on April 15 in spring, the first spring record since 2008.

HOSP: House Sparrow / Moineau domestique (*Passer domesticus*)

Notes: Sightings this year limited to two individuals on February 17, and another two on March 12. Missed in both spring and fall for the second year in a row.