

## 2016 Spring Raptor Migration at Fort Smallwood Park, Anne Arundel County, Maryland

Sue A. Ricciardi

*1132 Ferber Avenue, Arnold, Maryland 21012-1837*  
*susiericc@comcast.net*

The spring 2016 raptor migration was remarkable in many ways. Unfortunately, one of those ways was the unprecedented amount of adverse weather which in turn severely affected the count. From the start date of 20 February to the end date of 9 June, there were 33 days with at least some rain, 19 other days with winds having an unfavorable easterly component, and another 15 days with excessively strong winds that resulted in few migrants. With more than two full months of hawk-deterring weather, it shouldn't be a surprise that raptor numbers were significantly depressed. Counts for all but one of the most common raptor species were below average, with Red-shouldered Hawk down by a whopping 80% and American Kestrel down by 66% (Table 1). Also, all but three of these common species arrived later than their median arrival dates. The total number of raptors counted was just 7633 (Table 2), 23% below the five-year average (2011-2015) of 9942. As well, the 76 days and 370 hours of coverage were much lower than average (88 days and 487 hours), down by 14% and 24% respectively.

**Table 1. 2016 Common Raptor Species.** The 2016 count, 5-year percentage changes, and comparisons to the median arrival dates.

Species	2016 Count	5-Year % Change (2011-2015)	Median Arrival Date (E = earlier, L = later)
Black Vulture	302	-33%	L
Turkey Vulture	4617	-21%	L
Osprey	304	-30%	E
Bald Eagle	144	-6%	E
Northern Harrier	31	-59%	L
Sharp-shinned Hawk	1468	+17%	L
Cooper's Hawk	135	-59%	L
Red-Shouldered Hawk	47	-80%	L
Broad-winged Hawk	313	-40%	L
Red-tailed Hawk	110	-56%	L
American Kestrel	106	-66%	L
Merlin	34	-29%	E

**Table 2. 2016 Monthly and Seasonal Count Summaries, Five-year Count Averages (2011-2015), and Ten-year Count Averages (2006-2015).** (Due to the rounding off of the individual five-year and ten-year species averages, they do not necessarily add up to the total five-year and ten-year averages.)

	Feb	Mar	Apr	May	Jun	Total	Five-year Average (2011-2015)	Ten-year Average (2006-2015)
<b>Survey Days and Hours</b>	<b>2016</b>	<b>2016</b>	<b>2016</b>	<b>2016</b>	<b>2016</b>	<b>2016</b>		
Survey Days	5	22	24	21	4	76	88	89
Survey Hours	11.75	105.50	133.50	105.00	13.75	369.50	487	494
<b>Species</b>								
Black Vulture	25	153	97	27	0	302	450	406
Turkey Vulture	72	2731	1150	634	30	4617	5838	5654
Osprey	1	84	148	71	0	304	433	464
Swallow-tailed Kite	0	0	2	0	0	2	0	0
Mississippi Kite	0	0	0	5	0	5	12	8
Bald Eagle	2	23	46	72	1	144	154	128
Northern Harrier	0	1	14	16	0	31	76	95
Sharp-shinned Hawk	0	34	824	610	0	1468	1252	1692
Cooper's Hawk	0	26	77	32	0	135	329	399
Northern Goshawk	0	0	0	0	0	0	0	0
Red-Shouldered Hawk	4	37	6	0	0	47	233	202
Broad-winged Hawk	0	0	43	269	1	313	524	710
Swainson's Hawk	0	0	0	0	0	0	0	0
Red-tailed Hawk	4	56	31	19	0	110	253	250
Rough-legged Hawk	0	0	0	0	0	0	0	0
Golden Eagle	0	2	0	0	0	2	1	1
American Kestrel	0	23	71	12	0	106	308	319
Merlin	0	4	15	15	0	34	48	54
Peregrine Falcon	0	0	2	3	0	5	3	4
Unidentified Accipiter	0	0	0	2	0	2	8	13
Unidentified Buteo	0	1	2	0	0	3	7	11
Unidentified Eagle	0	0	0	0	0	0	1	0
Unidentified Falcon	0	0	2	1	0	3	2	4
Unidentified Raptor	0	0	0	0	0	0	9	15
Other	0	0	0	0	0	0	0	0
<b>Total</b>	<b>108</b>	<b>3175</b>	<b>2530</b>	<b>1788</b>	<b>32</b>	<b>7633</b>	<b>9942</b>	<b>10,427</b>

In addition, the total count for March was 20% below the 10-year average (2006-2015) of 3987, and the total count for April, normally the most productive month, was only 2530, 48% below the 10-year average of 4907.

However, all was not doom and gloom.

February's total count was above the 10-year average, and the first Osprey of the season was observed on the record-early date of 25 February, three days earlier than the previous record.

March stood out for two Golden Eagles (18 and 28 March, the first time ever for more than one Golden Eagle in a season).

April produced a similar record, but for a day rather than a season: two Swallow-tailed Kites flew by together on 26 April. The highest daily raptor count (750) for the season and the greatest daily variety of raptors (13) for the season also occurred on 26 April.

May was above average in total raptors counted, and it too had a record event. An astounding 41 Bald Eagles were tallied on 14 May, demolishing the previous daily record of 19. The season's 5 Mississippi Kites were also counted in May.

Other fauna besides raptors enhanced the hawk watch experience. An American Beaver family (Figure 1) has moved into the pond, possibly having arrived two years earlier, but much more noticeable this season. One or more Soras called from the pond edges multiple times over the season, though it's not clear if any nested. Finally, Ruddy Ducks (Figure 2) were especially abundant, with an estimated 5000 individuals counted one day from the Park shores and an estimated 9000 counted one day in rafts extending northward from the Park and around the peninsula.

The number of bird species observed at the Park has increased considerably due to data mined from past issues of *Maryland Birdlife* and from eBird. Two species came from *Maryland Birdlife*: Upland Sandpiper in 1981 and Lapland Longspur in 1980. Thirteen species came from eBird: Cackling Goose, 2008; Harlequin Duck, 2014; Ring-necked Pheasant, 1986; Hudsonian Godwit, 2012; Barred Owl, 2015; Eastern Whip-poor-will, 2012; Worm-eating Warbler, 2012; Connecticut Warbler, 2011; Mourning Warbler, 2012; Kentucky Warbler, 2012; Grasshopper Sparrow, 2010; Nelson's/Saltmarsh Sparrow, 2016; and Dickcissel, 2015. The total number of Park species is now 279.

The crew of regular observers came through again: compiler Sue Ricciardi, Hal Wierenga and Lynn Davidson, Ralph and Jane Geuder, Bob Rineer, Paul Fritz, Mary Jane McMillan, Andy Smith, Greg Smith, Dan Walker, Chris Reed, Steve Small, Carol Cwiklinski, Cal Orvis, Bill Hubick, John Hoffman, Linda Baker, Hugh Hoffman, Dan Haas, Steve Whitcomb, Harry and Liz Armistead, and Dan Eberly. Many other visitors also appreciably helped with the count, and the Park staff deserves sincere thanks for their continuing support of the hawk watch.

Another season is in the books. Numbers may have been diminished this year, but according to the cliché, "There's always next year!" On to Spring 2017!



**Figure 1. American Beaver (*Castor canadensis*).** Fort Smallwood Park, Anne Arundel County, Maryland; photographed by Dan Walker, 20 June 2016



**Figure 2. Ruddy Ducks (*Oxyura jamaicensis*).** Fort Smallwood Park, Anne Arundel County, Maryland; photographed by Dan Walker, 11 April 2016.