

GENERAL NOTES

Mortality of migrating birds at Mt. Washington, New Hampshire.—The following observation was reported to me by Herbert Drury of Norwich, Vermont, who was a Dartmouth College student at the time.

On April 15, 1951, Mr. Drury, in company with Mr. Brad Richardson and several other students, were skiing in Tuckerman's Ravine on Mt. Washington, New Hampshire. Mr. Drury wrote: "It was cold, snowing and blowing so hard that . . . visibility was reduced to less than 50 feet. At six that morning it had been clear with no wind. At the base of the Headwall and at least a third of the way up to the lip of the Headwall, we found several dead birds frozen in the loose snow that was blowing down into the Ravine toward Pinkham Notch. The birds were somewhat battered up. Those that I identified included: 4 Golden-Crowned Kinglets [*Regulus satrapa*]; 4 Winter Wrens [*Troglodytes troglodytes*]; one Yellow-bellied Sapsucker [*Sphyrapicus varius*]; one Robin [*Turdus migratorius*]; one female Purple Finch [*Carpodacus purpureus*]. Undoubtedly there were more birds buried under the snow; and other birds were picked up by other skiers and carried down the mountain. The downdraft winds attained velocities of 40 to 50 m.p.h. that day. We suspect that migrating flocks coming over the mountain from the opposite [west] side were caught in these downdrafts and buffeted by the swirling snow until they perished."—DOUGLAS E. WADE, *Dept. of Entomology and Zoology, Clemson Agricultural College, Clemson, South Carolina, March 28, 1952.*

Turkey Vultures attacking Great Blue Heron.—In the vicinity of Pymatuning Lake, Ashtabula County, Ohio, there is a large Great Blue Heron (*Ardea herodias*) nesting colony and a Turkey Vulture (*Cathartes aura*) roost. This colony and this roost are in a sugar maple (*Acer saccharum*)-beech (*Fagus grandifolia*) climax forest. Most of the heron nests are in beech trees, a few trees having as many as twelve nests.

Approximately 100 vultures took flight when J. B. Ross, of Decatur, Georgia, and I entered the forest on the evening of August 14, 1949. Shortly after this flight a disturbance was detected at the top of a beech. There four Turkey Vultures were attacking one adult Great Blue Heron in a nest. The vultures flew at the heron from all sides. The heron made rapid thrusts at its attackers, and after five minutes of battle, the vultures left the heron. This Great Blue Heron was the only one observed in the rookery, all of the other herons having left about the first of August. The question arises as to why this adult bird was attached to a nest late in the summer. The nest was high in a beech, and it was not investigated.

Heron colonies in the Pymatuning area have been deserted without any apparent reason. One colony was abandoned after the eggs had been laid, another after the young had hatched (Todd, 1940. "Birds of Western Pennsylvania," pp. 48-52). Perhaps activities of the Turkey Vulture could be a factor in the moving of heron colonies.—JOHN F. MEHNER, *Pymatuning Laboratory, Department of Biological Sciences, University of Pittsburgh, Pittsburgh, Pennsylvania, September 1, 1951.*

Light intensity and waterfowl flight; pre-flight activities.—In spring and fall, scatterings of waterfowl often appear on the reservoirs in Baltimore, Maryland. The birds stay from a few hours to several days. When they depart, it is occasionally at a daytime hour, but usually in late evening. Rarely, after an evening departure, a similar flock is present again the next day, as if the same individuals had returned from a

night rafting place. Generally, however, the waterfowl leave for good on their first evening, so that it appears they have resumed migratory flights. During several years that I lived near one reservoir, I obtained some observations which suggest a correlation between departure times and light intensities. Although my data are too few to be conclusive, I offer them now because I have no prospect of obtaining more.

Within any species, departures on cloudy evenings were practically always earlier than those on clear ones. Two species appeared often enough in unmixed flocks to provide several observations in similar weather; each showed a fairly uniform departure time, in relation to sunset, under given conditions. One species was noteworthy for generally leaving before, instead of after, sunset; wider observations might disclose some specific differences in this respect. There was no correlation observed between departure times and temperature, wind direction, or wind force.

Either bathing or diving was an almost invariable preliminary to flight on the part of every species observed. Some of the birds also did wing-flapping, made little rushes on the water, or swam to and fro in a "nervous" manner shortly before taking off. Some species indulged in several or all of these activities on different evenings, or even on the same evening. The activities were usually performed intermittently, and the amount of time devoted to them before the take-off varied as much as from 1 to 30 minutes for single species.

On occasions when all the birds involved were of one species, departures were made as follows:

	No. of Birds	Date	Sunset	Departure		Sky
				Hour	Min. after Sunset	
Pied-billed Grebe (<i>Podilymbus podiceps</i>)	2	Sep. 27 '41	5:57	6:30	33	Clear
	1	Sep. 29 '41	5:54	6:28	34	Clear
	2	Sep. 23 '42	6:05	6:41	36	Clear
Scaup (<i>Aythya</i> sp.)	18	Apr. 12 '42	6:40	7:10	30	Clear
	17	Apr. 13 '42	6:40	7:16	36	Clear
	6	Apr. 16 '42	6:44	7:17	33	Clear
	1	Sep. 30 '41	5:52	6:32	40	Light clouds
	6	Apr. 3 '42	6:31	7:00	29	Cloudy
	6	Oct. 25 '42	5:14	5:35	21	Cloudy
Bufflehead (<i>Bucephala albeola</i>)	3	Dec. 17 '39	4:44	5:23	39	Clear
	1	Nov. 9 '41	4:56	5:31	35	Partly cloudy
Old-squaw (<i>Clangula heyemalis</i>)	1	Nov. 3 '39	5:05	4:56	- 9*	Clear
	2	Nov. 6 '41	4:59	4:41	-18*	Cloudy
	1	Dec. 30 '38	4:51	still present at 4:54		Clear
Ruddy Duck (<i>Oxyura jamaicensis</i>)	3	Nov. 13 '41	4:52	5:31	39	Clear
Coot (<i>Fulica americana</i>)	1	Oct. 7 '42	5:41	6:22	41	Clear

*Before sunset.

When mixed bunches of birds were on the reservoir, the various species sometimes left separately and sometimes together; a given species might act differently on different occasions. Observations were:

	No. of Birds	Date	Sunset	Departure		Sky
				Departure Hour	Min. after Sunset	
Ruddy Duck	6	Nov. 8 '39	4:59	5:30	31	Cloudy
Scaup	1			5:30	31	
Pied-billed Grebe	1	Oct. 11 '41	5:35	6:03	28	Clear
Coot	1			6:10	35	
Unidentified duck	1			6:15	40	
Bufflehead	1	Oct. 28 '41	5:11	5:41	30	Clear
Pied-billed Grebe	2			5:51	40	
Bufflehead	2	Nov. 12 '41	4:53	5:22	29	Clear
Ruddy Duck	1			5:23	30	
Ring-necked Duck (<i>Aythya collaris</i>)	1			5:23	30	
Scaup	1			5:23	30	
Scaup	9	Apr. 14 '42	6:42	7:17	35	
Pied-billed Grebe	1			7:17	35	

Examples of the pre-flight activities are:

Pied-billed Grebe. September 23, 1942, two birds: Between 5:35 and 6:25 p.m. the only activities were some food dives (up to 12 seconds in length) by one bird at 5:48, and four minutes of bathing, preening and wing-flapping by both from 6:01 to 6:05. From 6:25 to the take-off at 6:41 frequent dives perhaps three seconds in length were made, and one bird once flapped its wings and preened a bit.

Scaup. April 3, 1942, six: From 6:08 to 6:40 p.m. the birds steadily dived for food, then they idled. At 6:57 several flapped their wings. At 7:00 all flew.

April 12, 1942, eighteen: From 6:49 to 7:03 p.m. the birds dived for food, then idled. At 7:08 several flapped their wings. At 7:10 all left.

October 25, 1942, six: From 4:49 to 5:15 they slept. On waking, they swam down the reservoir. At 5:21 one flapped its wings. From 5:30 to the 5:35 take-off all repeatedly ducked completely under water, between-times swam to and fro in a nervous way, and twice one or a few did some wing-flapping.

Bufflehead. December 17, 1939, three: From 4:35 to 5:02 p.m. all slept. On waking, they swam a little; one flapped its wings. Five times between 5:07 and 5:22, at intervals of one to six minutes, all bathed. At 5:22 all made one sudden dive of about five seconds, on arising bathed once more, then left at 5:23.

Coot. October 7, 1942, one: From 6:08 to 6:18 p.m. it idled. At 6:18 it ducked completely under water, then ducked its head and neck. At 6:22 it left.—HERVEY BRACKBILL, 4608 Springdale Avenue, Baltimore 7, Maryland, March 1, 1952.