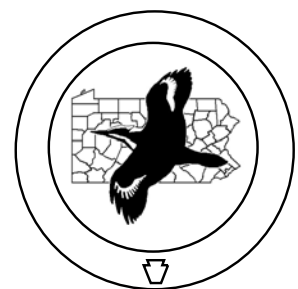


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Contents

1	Editorial	
2	Pennsylvania's Record High Northern Shrike Invasion	
	of 1999-2000.....	Paul Hess
10	Cooper's Hawk, banded in PA, recovered in New Brunswick	
	Roy Frock
11	A Summary of Common Nighthawk Watches in Pennsylvania, 1999	
	Scott Kinzey
13	BOOK REVIEW - <i>The Birds of Pennsylvania</i>.....	Gene Wilhelm
15	Bird Misidentification.	Dick Byers
18	Rare Bird Reports.	Nick Pulcinella
	Bullock's Oriole	
19	Pennsylvania Bird Lists For 1999.....	Peter Robinson
25	Summary of the Season	
26	Birds of Note	
28	Photographic Highlights	
31	Local Notes	
42	ERRATA - Missing Table from Fall Hawk Migration Summary	
43	Seasonal Occurrence Tables – January through March 2000	
54	Compilers and Observers	

ILLUSTRATIONS:

COVER: Black-throated Blue Warbler, Atglen, Chester, 2/25/2000.
Photo by Mona Schutsky.

from the Editors...

Annual PSO Meeting

The 2000 Annual Meeting of the Pennsylvania Society for Ornithology was held in Greene County on the weekend of May 19-21. The weather cooperated and the field trips were terrific. We had one of the best turn-outs ever. As usual, the afternoon speakers were entertaining and informative. See the PSO Newsletter for more details. (PS. If you don't belong to the PSO you are missing out!! The newsletter covers our events, conservation issues, projects, and more. *Pennsylvania Birds* is for reporting bird sightings. The PSO Newsletter is more about happenings, events, etc. Join today!)

Northern Shrikes

When we asked Paul Hess to write up a summary of the Northern Shrike invasion, we should not have been surprised at the result. Not only did he list the occurrence and distribution in the state, he also delved into the territoriality, behavior, diet, and the invasion history of this species. It is a very informative article and well worth reading.

Cyber-birding

One of the points made clear by Paul's shrike article is the amount of bird sightings being reported on the internet, but not reaching the pages of *Pennsylvania Birds*. Part of this is due to the fact that only half of our county compilers are on the net. The other part is due to the fact that many

observers are not sending their observations to their county compiler.

We are sure that sometime in the not-to-distant future magazines such as this will go completely digital. You will just log on to a web site and read it there. This will save a tremendous amount of money (90% of the cost is in the printing and mailing), and will save some trees. By then most people should have access to the internet.

However.... until that day arrives (5 years/ 10 years?), we really need your reports. If you are posting sightings to the PABIRDS listserve, but not sending them to your county compiler, please at least print them out, store them in a safe place (by county), and send them to the appropriate county compiler at the end of each quarter. Since you have already typed them, you won't need to create a separate report. The compilers — and our readers — will be most appreciative.

New Editors still needed

As expected, we were not inundated with volunteers to take over when we retire next year. We did make it sound somewhat intimidating.

However, do not be put off by the list of tasks. Many of the tasks do not take very long and are only done once every three months. For instance, applying the mailing labels, sorting, and sacking the magazine for mailing only takes a

few hours (including the drive to the post office). Now if this is just one part of everything you do (like it is now), then it can be a burden. But if it is the only thing you do, it is not very imposing at all. Even if you are very slow at it and take four hours, that is still only 16 hours per year!

Some of the seasonal editing tasks could be broken down by quarters, so that a different editor does the work each quarter. That way the editor would only have to do one report per year.

So, please think about volunteering for some part of the effort needed to produce this journal. It will be well appreciated. Contact us and we can discuss it with you and then discuss it with the PSO Board before making a decision. ✂

Frank & Barb Haas
Chief Editors

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Pennsylvania's Record High Northern Shrike Invasion of 1999-2000

by Paul Hess

Northern Shrikes (*Lanius excubitor*) invaded Pennsylvania during the fall and winter of 1999-2000 in the largest numbers ever recorded. About 137 shrikes were reported in 47 counties, far exceeding the previous high of about 50 listed in 29 counties in 1995-96 (*Pennsylvania Birds* 9:211-233, 10:16-37). Approximations are used because some sightings could have been roaming individuals counted more than once.

Great interest always greets invasions of this remarkable carnivorous songbird, which Elliott Coues (1903) called a "bloodthirsty rascal" and Arthur Cleveland Bent (1950) saluted as a "feudal baron and brigand bold." Reports to the expanding ornithological network of *Pennsylvania Birds*, the Pabirds e-mail discussion list, rare bird alerts, and Christmas Bird Counts (CBCs) enable the most complete picture of an invasion ever possible to compile in the state. Table 1 and Figure 1 show the unprecedented distribution reported by observers.

The first two birds appeared on Oct. 24 in *Erie* (J. McWilliams, pers. comm.), a fitting start because that county has been the state's most regular shrike location even in non-invasion years. Those arrivals accompanied the autumn's first strong cold front, and by early November reports were "pouring in all over the place" (Haas and Haas 1999). The 30 shrikes tallied on Christmas Bird Counts, 27 on count day and 3 in count week, were an all-time Pennsylvania CBC record (Bolgiano 2000). Sightings diminished abruptly after the first week of March, and a few birds remained into the month's third week to a last date of March 22 at Green Lane Reservoir in *Montgomery*. Both the arrival and the departure patterns were typical for the state, though shrikes have appeared as early as the first week of October and stragglers have lingered into the second week of April (McWilliams and Brauning 2000). Then a remarkable occurrence came on May 14, 2000, when two experienced observers reported a Northern Shrike on a utility wire near

Jobs Corners in *Tioga* (A. and L. Brown, pers. comm.), the state's latest date by more than a month if accepted by the Pennsylvania Ornithological Records Committee.

The invaders were part of a massive incursion into southern Ontario, New England, New York, and the mid-Atlantic states. Normally the Northern Shrike winters no farther south than regions with an average minimum January temperature below 20°F (-7°C), an isotherm crossing northern Ohio, Pennsylvania, and New Jersey (Root 1988, NOAA 1985). That distribution was true in 1999-2000 for western but not eastern Pennsylvania. In the west shrikes were largely concentrated in the northern counties, a pattern mirrored by a "tremendous influx" into neighboring northeastern Ohio (V. Fazio III, pers. comm.). In the East significant numbers moved much farther southward through Pennsylvania and New Jersey, even into Maryland. New Jersey's estimated 30 birds, though only half the 1995-96 record, represented "a good flight" that sent birds as far south as Cape May (R. Kane 1996 and pers. comm.). Maryland's 9 birds were an all-time high, appearing widely from *Garrett* in the west to *Anne Arundel* in the east (M. Iliff, pers. comm.). None, however, was found in Delaware, Virginia, or West Virginia (A. Ednie, M. Iliff, G. Felton, pers. comms.).

Western Pennsylvania was interesting for significant numbers of shrikes only as far south as a sharp line across *Mercer*, *Venango*, and *Clarion*. Large areas south of there had similar habitat and were well covered by observers, so a reason for the shrikes' virtual limit is not obvious. It does happen to correspond roughly to the usual 20°F isotherm, but the long-term average is not necessarily relevant in any given year. Perhaps a more immediate reason involved Svardson's (1957) notion that invaders in general travel no farther than necessary for an adequate food supply — probably voles and small birds in the shrikes' case. Coincidentally the same three counties were the southern limit of crossbills' huge 1997-98

invasion (Hess et al. 1998). Conifer seeds were the food then, but the image that it was "almost as if there were a wall across the area" (Hall 1998) applies as well to the shrikes.

Berks led all counties with 12 reports, remarkably echoing Earl Poole's experience in a 1921-22 invasion when he recorded Northern Shrikes on 11 occasions in the county (Poole, unpublished manuscript; Urich 1997). Clusters of reports there and in several other counties (Figure 1) could partly have reflected especially good observer coverage, but they could also have represented true concentrations of shrikes visiting particularly attractive habitats. In addition, one expert believes that shrike siblings or family groups often cluster on the winter landscape (E. C. Atkinson, pers. comm.).

Few extensive studies have dealt with Northern Shrike ecology in North America. The account in Terres's massive encyclopedia of birds (1980) relied almost wholly on Bent (1950) and a classic monograph by Cade (1967). The most substantial recent efforts are Eric C. Atkinson's cited in this article. Therefore many of the observations reported by Pennsylvania birders make a worthwhile contribution, especially in three notable features of the invasion:

1. **Preponderance of adults.** Of the individuals assigned to an age class, 46 (53%) were adults and 40 (47%) were first-fall/winter immatures — a sample that seems large enough to be representative. Caution is advisable in interpreting Northern Shrikes' age because molt, wear and fading may gradually change their appearance from immature brown to adult gray hues by late in their first winter (Miller 1931, Lefranc 1997, Pyle 1997). However, most ages were specified in the fall and early winter when the difference should have been clear, and even into early March observers were finding brownish birds.

The adult majority contrasts with one study based on a "large series of skins" showing first-year birds as 78% of the total winter population in the eastern subspecies (Miller 1931). Cade

(1967) also believed that a large percentage of the shrikes that move far south into the United States are typically birds of the year, less successful in competition for food on the northern wintering grounds. Indeed immature shrikes have been found to outnumber adults in New York (Bull 1985) and Michigan (McPeck and Adams 1994), but I can find no long-term data for Pennsylvania. Generalizing about Northern Shrikes' adult/immature proportions is probably not advisable; one ornithologist's extensive observations in the western states have never shown immatures to be more than 20-25% of wintering shrikes (E. C. Atkinson, pers. comm.).

Pennsylvania's relatively large number of adults in 1999-2000 might indicate that food was so scarce in the usual winter range that even experienced adults were forced farther southward. Or perhaps the minority of immatures reflected a relatively unproductive 1999 nesting season for this often very productive species. In the best years up to seven young fledge from a nest, but the numbers of young may vary by a factor of 2-3 or more between good and bad years, probably influenced by spring weather conditions and food availability (Cade

1967, Cade and Swem 1995). Post-fledging mortality may also be high, depending on those conditions (E. C. Atkinson, pers. comm.).

2. Absence of territories. Apparently fewer than 20% of the Pennsylvania invaders were reported remaining at a location for prolonged periods. The vast majority were seen only once or for less than week, even at places covered frequently by birders. A prime example was *Berks*, where shrikes were seen at a dozen locations during the winter, but only at Lake Ontelaunee did a bird persist for weeks (R. Keller 2000 and pers. comm.). A interesting case occurred in Moraine State Park, *Butler*, where this time a shrike spent only one day at the exact spot where one had spent the entire previous winter.

Most assessments have portrayed Northern Shrikes as quite territorial in winter. The details in *Pennsylvania Birds* (9:211-231; 10:16-37) for the 1995-96 invasion seem to indicate that shrikes remained on territories at many locations. Territorial behavior apparently has been the general rule in Ohio, where typically only a few invaders are nomadic (Peterjohn 1989), Michigan (Zimmerman 1955), and Idaho (Atkinson 1993). Further studies in Idaho and Montana indicate that

about 80% of wintering shrikes hold territories, though some birds do not settle onto them until December (Atkinson 1993 and pers. comm.). In contrast, Poole (unpub. ms.) observed that shrikes wintering in Pennsylvania only occasionally settled in an area, and Miller (1931) remarked that the shrike "seems to wander about in response to varying local conditions of food and weather." Harsh weather would not likely have been a factor in Pennsylvania through the fall and winter of 1999-2000, but abundant food might possibly have been hard to find in some areas of the state.

Or the apparent lack of territory may have reflected Zimmerman's (1955) experience that although the shrikes in Michigan had favorite hunting perches their territories were large, thus making it difficult to find a particular bird on a given day. Judging that the shrikes hunt over great circular routes, he told of an observer in Ohio who followed one for 2.5 miles during a half-hour period and it still had not completed its circle. Similarly some winter territories found by Atkinson (1993) in Idaho were so large — up to 357 hectares, or 882 acres — that the shrike would not likely be seen regularly in the same spot without prolonged and intensive

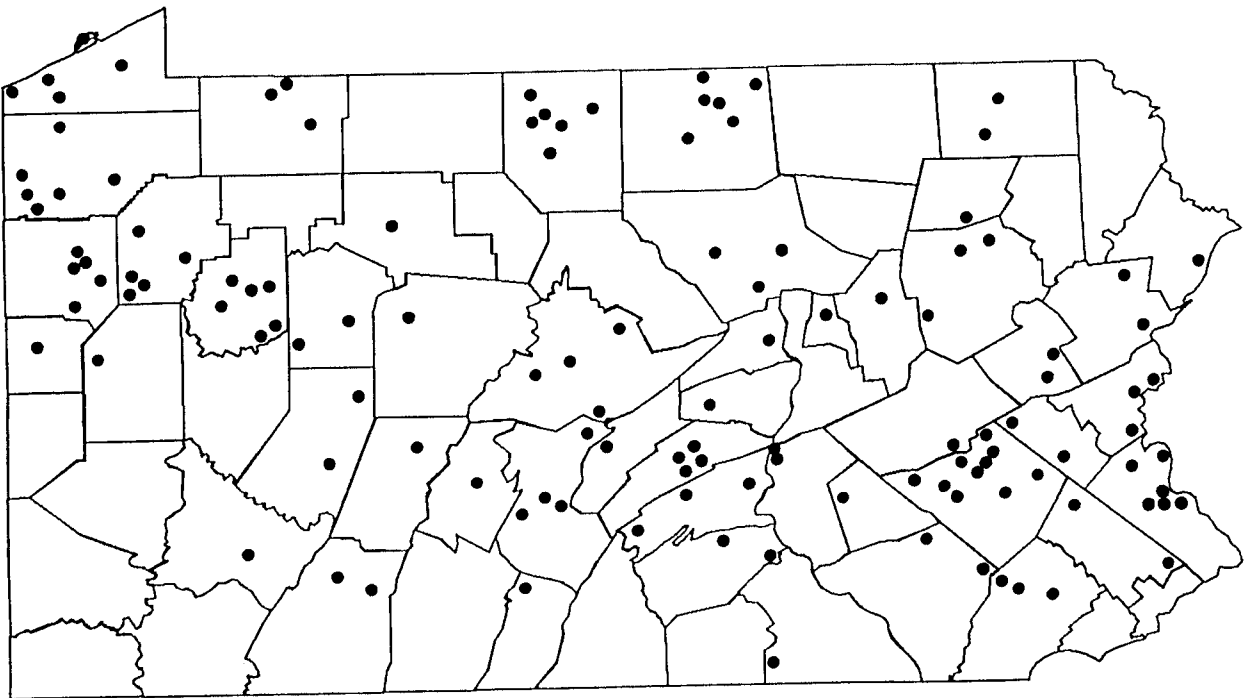


Figure 1. Distribution of Northern Shrikes reported in Pennsylvania during the fall and winter of 1999-2000. Dots indicate approximate locations of one or in a few cases 2-3 shrikes. For county names see the map accompanying Seasonal Occurrence Tables in this issue.

observation. A possibility suggested by the *Clarion* compiler in Pennsylvania was that two shrikes seen about two miles apart on different days might have been the same bird (M. Buckwalter, pers. comm.).

Of the Pennsylvania birds that were aged and known to hold prolonged territories, 16 were adults and 9 were immatures. If that was an adequate sample, perhaps adults tended to keep young birds away from prime areas of food availability. In the western states, adults typically occupy higher quality habitats than immatures (E. C. Atkinson, pers. comm.).

3. Foods. While insects were still active in the warm November, shrikes were seen capturing them at three locations. At Bald Eagle State Park in *Centre* a shrike caught a small unidentified insect and impaled it on a hawthorn (P. Rodewald, pers. comm.). At Green Lane Reservoir in *Montgomery* a shrike feasted on butterflies and caterpillars (Crisley 2000). At Mammoth Park in *Westmoreland* a shrike was twice seen eating grasshoppers, two of which were also found impaled on small branches of a tree (D. Byers, pers. comm.). When the park's grasshoppers disappeared with colder weather, the shrike left too. In regions where insects remain available all winter Northern Shrikes often continue to prefer them, as in southwestern Idaho (Atkinson and Cade 1993) and southern Europe (Cramp and Perrins 1994).

Birds were by far the predominant winter prey observed in Pennsylvania during this invasion. Intended or captured victims included Mourning Dove (*Zenaida macroura*), Blue Jay (*Cyanocitta cristata*), Black-capped Chickadee (*Poecile atricapillus*), White-breasted Nuthatch (*Sitta carolinensis*), American Robin (*Turdus migratorius*), American Tree Sparrow (*Spizella arborea*), Song Sparrow (*Melospiza melodia*), Dark-eyed Junco (*Junco hyemalis*), House Finch (*Carpodacus mexicanus*), American Goldfinch (*Carduelis tristis*), and House Sparrow (*Passer domesticus*). All have been noted previously in the literature as prey. If the dove, jay, or robin seem rather large to handle, consider a report from Quebec of a shrike attacking a Rock Dove (*Columba livia*) and carrying it over 50 meters before eating it (Aubry

and Bannon 1996).

Of 15 chases reported, shrikes made successful captures in only three: a Song Sparrow in *Berks* (R. Keller, pers. comm.), a House Finch in *Schuylkill* (D. Schwartz, pers. comm.), and a House Sparrow in *Juniata* (A. Troyer, pers. comm.). A low success rate apparently is usual for shrikes and much poorer than that of bird-specialist Accipiters. Cade (1962, 1967) thought shrikes succeeded in aerial captures only occasionally, and that young shrikes were especially poor bird hunters. Northern Shrikes wintering in Idaho had less than half the success rate preying upon small birds than upon small mammals (Atkinson and Cade 1993). Great Grey Shrikes, as the species is called in Britain, rarely outfly other birds in Europe and prey upon them only when mammals or invertebrates are unavailable (Cramp and Perrins 1994).

Bent (1950) related a famous anecdote about House Sparrows as shrikes' prey: "The worst enemy that the Northern Shrike ever encountered was the man with the gun on Boston Common, who killed over 50 of the birds in a single winter many years ago, to protect the English Sparrows soon after their importation. The tables are turned now for one of the best things the shrike does is to help reduce the numbers of this ubiquitous foreigner, so the shrikes are now welcomed in the cities."

Nearly all the predation in Pennsylvania was seen at feeding stations, where shrikes scared flocks of birds into flight, made spectacular aerial pursuits of small birds, hid in bushes ready to pounce, stared at feeders intently from a deck rail or branch, zipped past windows, and once crashed into the glass. Sometimes shrikes found themselves mobbed by jays and robins, or harassed by Northern Mockingbirds (*Mimus polyglottos*). Large-scale North American data have seldom shown Northern Shrikes taking advantage of the prey concentrated at feeding stations. One study based on Project FeederWatch, the continent-wide network of observers in the United States and Canada, found Northern Shrikes responsible for only 16 of 1138 cases of predation at feeders (Dunn and Tessaglia 1994; E. H. Dunn, pers. comm.). An analysis based on 6000 feeding stations in 1994 listed

Northern Shrikes as only casual visitors (Dunn and Tessaglia-Hymes 1999).

In *Potter*, a shrike attacked goldfinches caught in a bander's mist net, became tangled itself and was banded (D. Hauber, pers. comm.). During a previous invasion Hauber banded a shrike that had entered his maze trap to attack the House Finches inside. Such interference with banding operations was once dealt with harshly; after a 1926-27 invasion, banders from New England to Virginia responded in a survey quoted by Bent (1950) that they had banded and released eight Northern Shrikes but "destroyed" 62.

Northern Shrikes' greater difficulty capturing free-flying birds than small rodents corresponds to a finding in Idaho that birds were only 5% of shrikes' prey by number and 12% by biomass (Atkinson and Cade 1993). Similarly in Europe birds were said to range from only 4% of Great Grey Shrikes' diet in the mildest winters when insects were available to 28% in the most severe winters (Cramp and Perrins 1994). Only one survey I have found shows birds as a slightly greater proportion of the species' winter food, 31-55%, than rodents at 22-46% (Judd 1898, quoted in Miller 1931), although recent studies in Montana have shown birds sometimes approaching 50% of the winter diet (E. C. Atkinson, unpub. data). Perhaps birds' overwhelming predominance as prey in Pennsylvania was a biased picture because people spend more time observing their feeders than studying shrikes they find elsewhere. In any case, it is difficult to understand why shrikes would persist in energy-sapping chases of birds if small rodents easier to catch were available.

Conspicuously missing from the list of prey reported in the Pennsylvania invasion were voles, which are nearly always considered to be Northern Shrikes' most important winter food when they are available (Atkinson and Cade 1993, Cramp and Perrins 1994, Lefranc 1997). If voles were significant prey in this invasion, it is surprising that no reports emerged from what must have been 200-300 separate sightings at the more than 100 locations across the state. The only case of predation upon small rodents reported was an apparent capture of two during a 10-minute period in

Venango (J. Stanley, pers. comm.). Shrikes' primary mammal prey in this state would be the meadow vole (*Microtus pennsylvanicus*), which is famous for tremendous cyclical population fluctuations from incredible abundance in some years to near absence in others. Except in times of superabundance when voles scatter constantly at a hiker's feet, it is difficult or impossible to estimate population levels adequately.

Judging by the many shrikes that did not remain in one place, it would be reasonable to speculate that voles were scarce at most locations in Pennsylvania. But as noted in the discussion of territory above, that might merely have reflected territories covering a very large area so that the birds were not seen repeatedly at a particular spot. Whichever was the case, no consistent statewide association between shrikes' distribution and apparent vole abundance was obvious in this invasion. The most that can be said is that the high shrike numbers were accompanied in some areas but not others by good numbers of other vole predators: Northern Harriers (*Circus cyaneus*), Rough-legged Hawks (*Buteo lagopus*), Long-eared Owls (*Asio otus*), and Short-eared Owls (*Asio flammeus*). In fact, Short-eared Owl numbers were the state's third highest CBC total ever (Bolgiano 2000).

Berks received a particularly good analysis and speculation by Rudy Keller, the county's compiler for *Pennsylvania Birds* (pers. comm.). The Blue Marsh Lake area had a cluster of shrike sightings, a mixture of adults and immatures, with no individual seen consistently at the same place. Keller believes the key to shrikes' presence was attractive habitat where the Pennsylvania Game Commission has converted some cropland to contour strips of grasses separated by hedgerows. In places where shrikes were seen, harriers and American Kestrels (*Falco sparverius*) were present, and later in the winter Long-eared Owls appeared. Keller and others found vole skulls in many owl pellets, and his commentary is worth quoting in detail as perhaps representative of conditions in other parts of the state: "The owls roosted in a hedgerow of pines and other trees next to a field of switchgrass (tall, thick grass that stands all winter) and

a marshy dike next to which the game commission had planted a sorghum plot. This place harbored hundreds of sparrows and also obviously voles. So maybe voles were more abundant in this area than in the rest of the county. They were not super-abundant, however. I've seen up to 12 harriers work nearby fields during big vole years, along with almost as many Short-eared Owls. None of the latter were at the location this year, and only two harriers. The raptors may have found it difficult to rely on voles, as I watched a harrier, kestrel, and Merlin [*Falco columbarius*] work a large sparrow flock one day. One of the kestrels finally flew off with a sparrow. Maybe the shrikes were attracted to the area but couldn't rely on it because the voles weren't quite common enough."

Two other counties showed a corresponding presence or absence of the various vole predators. In *Venango* at one location where a shrike was seen intermittently for over three months, harriers, rough-legs, and Short-eared Owls were found; but at a place where voles were considered relatively few, no shrikes or the other predators were seen (J. Stanley, pers. comm.). In *Juniata* several areas with shrikes present also had rough-legs, Long-eared and Short-eared owls (A. Troyer, pers. comm.). That pattern agrees with a close association from 1900-01 to 1935-36 between invasions of Rough-legged Hawks and Northern Shrikes in the Toronto region (Speirs 1939) and in the eastern United States (Davis 1937).

The picture was less understandable in the southwestern region of *Allegheny*, *Armstrong*, *Beaver*, *Butler*, *Cambria*, *Indiana*, and *Lawrence*. Records from the 1999-2000 winter compiled from those seven counties for the journal *North American Birds* (P. Hess, unpub. data) showed excellent totals of 33 harriers, 9 rough-legs, and 23 Short-eared Owls — all suggestive of good vole populations. Yet only 4 shrikes were found in that vast but well birded region. One example was a strip mine reclamation area in *Allegheny*, where fairly good vole numbers were observed and there were repeated sightings of the harriers, hawks and owls — but no shrikes were found (C. Tague, pers. comm.). A possible factor at such reclamation sites could be too few

perches of the height shrikes use for hunting (E. C. Atkinson, pers. comm.), but it is hard to judge how significantly this might have differed between the shrike-rich northwestern sites and the shrike-poor southwestern ones.

Predation on voles could have been shown directly by discovery of their bodies impaled or wedged by shrikes in the behavior that led Linnaeus to name their genus *Lanius*, "butcher." But the only impaled prey that came to my attention were the insect reports from *Centre* and *Westmoreland* noted above. (See Koch 1996 for an interesting description of a shrike wedging birds in branches during a previous invasion.)

A rare case of predation was witnessed by four observers (G. Edwards, R. Boyle, R. States, and J. Stanley) in *Venango* on Feb. 24, 1999. Stanley described the event for PaBirds e-mail subscribers, leaving the prey's identity a mystery until the end: "Shortly after 5 p.m. we saw an adult shrike. For about 10 minutes it studied the ground as if looking for rodents. Suddenly it took to the air after a flying vertebrate. It would rise above the intended victim, briefly hover like a kestrel, then swoop down at its prey. It swooped 8 to 10 times. Once it had the prey in its clutches but lost its grip a few seconds later. Once it struck a glancing blow. Finally it caught the bat and dropped down out of sight to enjoy its supper." Bats are seldom mentioned in the literature as prey for Northern Shrikes. Detailed reviews of this species' diet in Bent (1950) and Lefranc (1997) do not include bats, and they rated only a one-sentence note from Europe (Cramp and Perrins 1994). However, Cade (1995) commented generally that aerial capture of both birds and bats is known for at least six shrike species. Sprunt (1950) reported two unsuccessful pursuits by Loggerhead Shrikes (*Lanius ludovicianus*), and E. C. Atkinson (pers. comm.) once found a bat impaled by a Loggerhead in Virginia.

A HISTORICAL PERSPECTIVE

A classic question asked for more than half a century is whether Northern Shrikes' massive movements southward occur in regular cycles or randomly. The answer depends on the

sources consulted, the time periods analyzed, and the regions viewed — an uncertainty reflected perfectly in Pennsylvania and on larger scales.

An enormous body of literature addresses predator-prey population fluctuations, including a supposed average four-year cycle for the shrikes. The scenario has three stages (Elton 1942, Lack 1954): Voles (*Microtus* sp.), which are Northern Shrikes' primary prey, increase steadily to a high peak of abundance and then suddenly crash every four years. Next, through greater breeding productivity and survival, shrike populations increase in step with the voles' abundance and then face an immediate food crisis after the voles crash. Finally, if voles are scarce across the shrikes' usual winter range, the predators must travel farther south in large numbers until they find an adequate food supply.

In a series of famous papers analyzing Christmas Bird Counts in a vast region of the north-central and northeastern United States, Davis (1937, 1949, 1960, 1974) showed long time spans when shrike invasions occurred at roughly four-year intervals but other long periods when the invasions occurred irregularly. Irregular intervals have been emphasized in individual states including Pennsylvania (Poole 1964), New York (Bull 1985), and Michigan (McPeck and Adams 1994). Recent large-scale CBC analyses support the existence of both regular and random invasion patterns, with each pattern persisting for decades during different time periods (Davis and Morrison 1987, Atkinson 1995).

Pennsylvania's CBC history in the past half-century shows no obvious four-year cycle in the 1950s through the 1980s, but then a sudden appearance of four-year intervals in the 1990s with strong peaks in the 1991-92, 1995-96, and 1999-2000 winters (Figure 2). In my view, analyses of CBC data are inherently unlikely to show regular invasion cycles consistently over long periods of time, even if such cycles exist. Several issues confound any attempt at persuasive analysis:

What time span is analyzed?

Recent data and older data are not comparable. Numbers of observers have increased so greatly, especially in the last three decades, that long-term analyses have little meaning. Here are

a few examples showing the deficiency of older data in Pennsylvania: Todd (1940) had too little information from western Pennsylvania to recognize that invasions ever occurred; his conclusion was that shrikes' annual numbers "apparently do not fluctuate." A substantial invasion occurred throughout the east and inland in the 1954-55 winter (Griscom 1955), but the Appalachian regional summary in *Audubon Field Notes* could list only three reports from Pennsylvania (Brooks 1955). "So seldom does this bird come to Appalachian mountain areas that all reports are notable," Brooks commented. In the winter of 1968-69 shrikes were "more common than usual" in the Appalachian region (Hall 1969), but for the entire region he had specific reports from only three locations, all in western Pennsylvania. Invasions equaling or exceeding that of 1999-2000 could have occurred many times during the long era when too few birders were afield to obtain the evidence.

CBCs are the only source of long-term data, and the problems in interpreting them are clear. As with the case on the continental level (Atkinson 1995), the number of CBCs and the amount of observer effort in Pennsylvania have increased so much and the types of effort have varied so greatly from region to region that any comparisons over time are difficult (Bolgiano 1997). In Pennsylvania

during the half-century from 1949 to 1999, the number of CBCs more than tripled from 19 to 68. Party-miles (a more appropriate standardization than party-hours for thinly distributed and site-territorial species like the shrike) grew from 2000 to about 25,000. Square-miles in the 1949-50 count circles covered 8% of the state's total land area, and by 1999-2000 the coverage tripled to 26% of the state's area. Differences in observer effort can significantly affect counts of relatively rare species that depend on "chance encounters" by observers (Bock and Root 1981). That category surely includes the Northern Shrike.

Thus CBCs with their extremely limited coverage decades ago typically offered little more than a possible suggestion of invasions. For example, could a mere four shrikes reported by 13 parties on Pennsylvania CBCs in 1921-22 be good evidence of a substantial influx? Doubtfully at first thought, except that the meager total was indeed conspicuous in an era when the state's CBCs usually tallied none. In fact an "extensive invasion" did occur in the 1921-22 winter in Pennsylvania (Poole unpub. ms.; Urich 1997), and it was a peak winter for shrikes across the entire upper midwest and northeast (Davis 1937). Similarly in more recent periods the 9 shrikes on Pennsylvania CBCs in

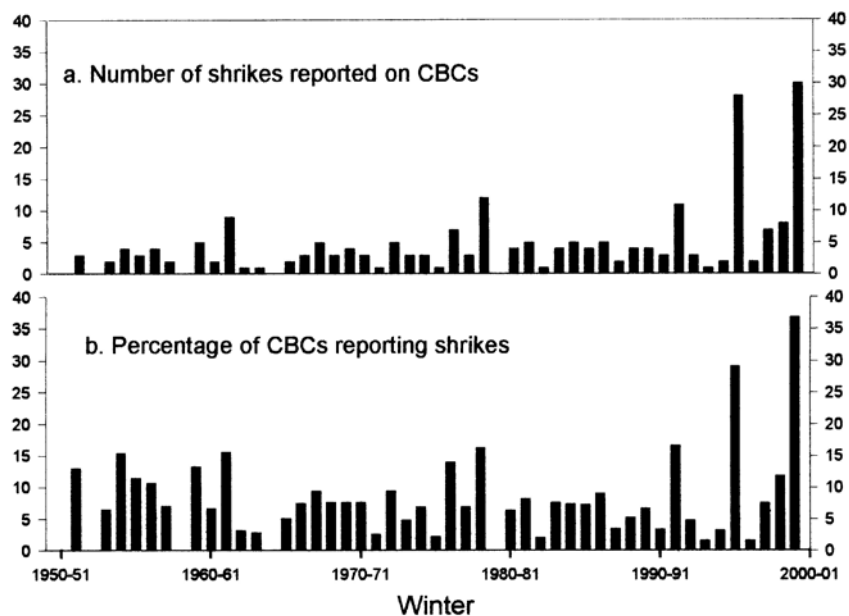


Figure 2. a. Northern Shrike totals (including count-week birds) on Pennsylvania Christmas Bird Counts; b. Percentage of CBCs reporting shrikes in winters of 1950-51 to 1999-2000.

1961-62 and the 12 in 1978-79 might have indicated invasions as significant as did our 30 shrikes in 1999-2000 (Figure 2a).

Sometimes even consecutive annual CBC totals are suspect, as two opposite kinds of examples from the 1950s and the 1970s show. The winters of 1954-55, 1955-56, and 1956-57 all had "fair" to "large" invasions throughout the east (James 1958). The Pennsylvania totals were three to four shrikes in those winters, yet in 1951-52 when there had been no invasion (James 1958), the state's total also was three (Figure 2a). In the successive winters of 1976-77, 1977-78, and 1978-79, regional summaries in *American Birds* from the eastern United States and Canada consistently told of massive invasions. Pennsylvania CBCs for the first and third of those winters correspondingly showed strong peaks, but the total for 1977-78 was inconsistently low (Figure 2a).

One method of compensating for the increase in numbers of CBCs is to express the shrikes' relative presence by the proportion of CBCs that reported them (Atkinson 1995, N. Bolgiano pers. comm.). The result for Pennsylvania barely changes the overall year-to-year pattern, but it substantially increases the relative presence of shrikes in the early decades (Figure 2b). Using the two examples from the last paragraph, the inconsistency of 1951-52 is even more dramatic and that of 1977-78 remains evident. Did the 1977-78 invasion not reach Pennsylvania, or did the CBC coverage for some reason not detect a major influx? Without the corroborating evidence we now have from *Pennsylvania Birds*, we cannot know.

Using alternative data for comparison, as we have had in the 1990s, we can see further how Pennsylvania CBCs do not necessarily indicate the extent of shrikes' influxes (Figure 3). Three CBC birds in 1990-91 and two in 1996-97 were insignificant totals; however, in reports to *Pennsylvania Birds* the 24 shrikes in 1990-91 and the 13 in 1996-97 reflected at least moderate invasions. Both of those cases, like 1999-2000, show the great importance of our state journal as an ornithological record. Yet just as the CBC total in 1999-2000 was only about half the number of shrikes listed in *Pennsylvania Birds* (Figure 3), the

latter total in turn was only about half the number of shrikes obtained from all sources including rare bird alerts, the Pabirds e-mail discussion list, and personal communications.

One other potential source of information, the Great Backyard Bird Count conducted 18-21 February 2000, should be mentioned (BirdSource 2000). Reported by thousands of observers across the continent during the four days and compiled at the Cornell Laboratory of Ornithology, GBBC data are greatly valuable in many contexts. The Northern Shrike numbers for Pennsylvania, however, are incomprehensible: "6" reports totaling "26" birds. Did observers really count an average of 4.5 shrikes at each of six locations? Hardly. More likely each observer listed the same shrike on four consecutive days, and one of the reporters saw two shrikes during the period. But we have no way to interpret the data confidently.

What regions are analyzed?

Whether you find invasions of Northern Shrikes at four-year intervals depends upon where you look. Mass movements sometimes reach regions to our north but not as far as Pennsylvania. For example, the winter of 1977-78 brought "record-breaking numbers" to most of the eastern United States (Wilds 1978). It was called "an invasion of staggering proportions" as far south as New York (Kibbe 1978) and "one of the best in a long time" in the Hudson-Delaware region, which includes eastern Pennsylvania (Paxton et al. 1978). But only three shrikes were reported from eastern Pennsylvania (Paxton et al. 1978), and they were listed in only three of the state's western counties (Hall 1978). Even within Pennsylvania some areas may have substantial influxes, but not other areas. For example, reports to *Pennsylvania Birds* in the 1994-95 fall/winter showed 10 of the state's 11 shrikes clustered in only four northwestern counties, *Clarion, Crawford, Erie, and Warren*.

Inconsistencies in CBC data cannot be reconciled without knowing which areas were analyzed. Root (1988) examined data east of the 80th meridian (the longitude of Pittsburgh) and found irruptions in 1969-70 and 1970-71. Most of Pennsylvania is within that sample area but had no sign of an invasion in either year (Figure 2). In fact, the winter of 1969-

70 was called "not a big year for Northern Shrikes" in the entire east except Ontario (Paxton 1970), and the winter of 1970-71 was "not considered to be a major flight year by most observers" south of Ontario and New England (Rosche 1971).

The studies by Davis (1937, 1949, 1960, 1974) offered clear evidence of the problems of scale. In the first three papers, to obtain a sufficiently large sample, he needed to use CBCs from a vast region extending in the north from Minnesota to Quebec and in the south from Iowa to Maryland. There he found the famous four-year cycles. But when the number of CBCs increased enough to divide that area into three smaller regions for analysis in 1974, he discovered that the peak invasion

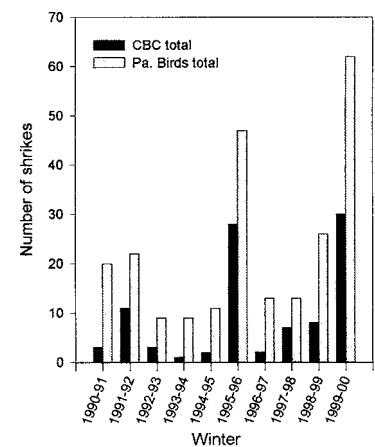


Figure 3. Comparative totals of Northern Shrikes on Pennsylvania Christmas Bird Counts (including count-week birds) and in annual fall-winter reports to *Pennsylvania Birds*, 1990-91 to 1999-2000.

years were different in Ontario, New York, and Minnesota-Iowa.

Meanwhile, a major obstacle to understanding invasion cycles is that no one knows where the invading shrikes originated (Lack 1954, Cade 1967, Finerty 1980). Without that knowledge it is impossible to link invasions to any particular fluctuations in food availability, either on the breeding grounds or in the usual winter range. Lack noted that fluctuations in vole populations could vary quite locally or over wide areas, with peaks and troughs in different phases. E. C. Atkinson (pers. comm.) has found a lack of synchrony in anecdotal accounts of meadow vole numbers, with fluctuations out of

phase by one year at the scale of only 50 miles. Cade stressed the need for detailed quantitative information on foods from the breeding range before a full analysis of their emigrations and population changes can be made. Finerty refused to discuss cycles in avian predators at all, "since there are essentially no long-term numerical data on any of these species to support any contentions concerning their cyclicity."

What is the peak of a cycle? Strictly mathematical approaches have addressed the problem of defining peaks of cycles objectively (e.g. Cole 1951, Finerty 1980), but subjective judgments are never far away. Two sets of Pennsylvania data from the 1990s illustrate this point (Figure 3). CBCs indicated a clear four-year cycle, while the much more comprehensive fall and winter totals reported to *Pennsylvania Birds* for the 1990-91 and 1991-92 winters add a complication: Should 1991-92 be considered the peak, or does the almost equally high total in 1990-91 show the true peak beginning in that winter and merely continuing in the next winter?

Even defining what is an invasion may be similarly subjective. Consider two writers' CBC analyses in New England: 46 birds in 1972-73 were termed a "moderately good flight" (Finch 1973), and 30 birds in 1980-81 were termed "as scarce as they have ever been" (Veit 1981). Thus only 16 birds across the huge New England region were supposedly sufficient for the difference between a moderate invasion and outright scarcity. Is that a realistic interpretation?

Is weather involved? Cade (1967) believed that "heavy weather conditions" caused shrikes to move beyond their usual winter range for food. LeBaron (1996) asserted that heavy and early snows forced shrikes south in the great 1995-96 irruption because small birds had vacated the snow belt where the shrikes usually winter and rodents stayed in the tunnels under deep hard-crusting snow. But the same invasion seemed to contradict LeBaron's view because New England had record numbers of shrikes during the region's snowiest winter on record (Nikula 1996). Further, E. C. Atkinson (pers. comm.) commented that rather than keeping voles down in their tunnels, hard-crusting snow in fact forces voles to

venture to the surface more often for air. And Pittaway (1997) called it a "myth" that deep snow forces boreal species southward. His view was that owls of the far north are well adapted to foraging in deep snow and can easily find voles if they are common, regardless of snow depth, and he believes that is true for Northern Shrikes as well. Pittaway (pers. comm.) also notes the opposite case that when the mass emigration began in the fall of 1999, the shrikes' usual winter grounds in Ontario and Quebec had no significant snow cover.

Considering all the inconsistencies and uncertainties, was the apparent four-year cycle of Pennsylvania's invasions in the 1990s a real biological event or merely happenstance? After all, the previous four decades showed no such pattern. A continuing detailed record of Northern Shrikes' annual presence in Pennsylvania, ideally including the birds' locations, dates, ages, habitat, and behavior, could shed valuable light in the years to come.

ACKNOWLEDGMENTS

Primary credit goes to the scores of observers who documented the invasion so thoroughly. I am grateful to Eric Atkinson, Nick Bolgiano, Frank and Barbara Haas, Rudy Keller, Katrina Knight, Paul Rodewald, and many county compilers for special assistance, and to Atkinson, Bolgiano, and Keller for their valuable reviews of an earlier draft.

TABLE 1. NORTHERN SHRIKE LOCATIONS AND DATES IN THE 1999-2000 INVASION OF PENNSYLVANIA

BERKS:

Hawk Mountain 10/26 (imm.)
 Bern Township 11/18 (imm.); 2/26-2/27 (ad.)
 Blue Marsh Lake area, several sites 12/5 (ad.); 1/2 (imm.); 2/13 (ad.)
 Oley 12/18 (imm.)
 Lake Ontelaunee 12/20-3/7 (ad.)
 Virginville 12/25
 Strausstown 1/2 (imm.); 1/22 (ad.)
 Bethel 1/22 (ad.)
 Henningsville 3/1

BLAIR:

Scotch Valley 11/18

BUCKS:

Nockamixon S.P. 11/12> (2 ad.)
 Tincum 11/13>
 Peace Valley 11/17-3/5 (1 ad., 1 imm.)
 Lake Lahaska 11/23 (imm.)
 Carversville 12/26
 Pine Run 1/30

BUTLER:

Moraine S.P. 11/19

CAMBRIA:

Prince Gallitzin S.P. 11/5.

CARBON:

Beltzville area 11/7>, February, & 3/11-3/12 (2 ad., 1 imm.)
 Penn Forest Res. 11/25 (ad.)

CENTRE:

Bald Eagle S.P. 11/7> (1 ad., 1 imm.)
 Bear Meadows, November (imm.)
 Black Moshannon S.P., November (ad.)
 Bush Hollow Road, November (ad.)

CHESTER:

Exton 11/18 (ad.)
 Struble Lake 11/23> (imm.); 1/30-3/10
 Hibernia Park 12/18 (imm.)

CLARION:

SGL 63, 12/18-2/27 (ad.)
 Piney Tract, 1/6, 2/5 (ad.)
 Strattanville 1/14 (ad.)
 Redbank Township 1/16 (imm.)
 Clarion area 1/22 (ad.)
 Fairmount City 1/26 (ad.)

CLEARFIELD:

DuBois Reservoir 11/19

COLUMBIA:

Rohrsburg 1/30

CRAWFORD:

Erie NWR 11/14 (ad.)
 Hartstown Marsh 12/3; 1/2
 Pymatuning area 12/19
 Conneaut Marsh/Geneva 1/1
 Atlantic, early January
 SGL 269, 2/29

CUMBERLAND:

Lisburn 12/19
 Carlisle Springs 12/25 (imm.)

DAUPHIN:

Millersburg 12/28 (imm.)
 Sweigart's Island 3/16

ELK:

Ridgway 2/8

ERIE:

Presque Isle 10/24-3/19 (imm.)
 Franklin Center 10/24
 Siegel Marsh 11/4
 Fairview Fish Hatchery 11/6 (imm.)
 Roderick Wildlife Reserve 12/5

FULTON:
Sideling Hill 3/5

HUNTINGDON:
Huntingdon 11/29> (imm.)
McAlevy's Fort 12/19 (ad.)
near Marklesburg 1/2 (imm.)
Mill Creek >3/5

INDIANA:
Gipsy 1/22 (ad.)
Yellow Creek S.P. 3/4-3/18 (imm.)

JEFFERSON:
North Freedom 12/12 (ad.)
SGL 244, 12/12

JUNIATA:
Port Royal 12/18
Center, mid-January
East Salem, February
Oakland Mills, February-March (ad.)

LANCASTER:
Caernarvon Township 11/11
Middle Creek, December> (ad.)

LAWRENCE:
Union Township 1/7 (ad.)

LEBANON:
Memorial Lake S.P. 11/10>

LEHIGH:
Leaser Lake 11/19 (ad.)
Macungie 3/6 (imm.)

LUZERNE:
Francis Slocum S.P. 11/22>
Lehman 12/26 (imm.)
PP&L Wetland, no date (imm.)

LYCOMING:
Upper Fairfield Twp. 11/4
Mifflin Twp. 12/16 (imm.)
Bald Eagle Mountain 3/5
(*first two birds "shrike sp."*
but almost certainly Northern)

MERCER:
3 sites near Lake Latonka 11/7-1/9
near Mercer 11/27 (ad.)
Pennsy Swamp 2/23 (ad.)

MIFFLIN:
Belleville 12/24> (ad.); 2/8

MONROE:
Spruce Lake Retreat, January to 3/7
East Stroudsburg 3/1-3/17

MONTGOMERY:
Green Lane Reservoir 11/1>; 3/22 (imm.)
Bryn Athyn 12/18

MONTOUR:
Montour Preserve 11/29-12/2 and 2/12 (ad.)

NORTHAMPTON:
Williams Twp. 11/26 (imm.); January
North Forks Twp. 1/2
Martins Creek 2/22

PERRY:
New Germantown 11/16
Little Buffalo S.P. 12/25 (imm.)
Saville, no date

PIKE:
Dingman's Ferry CBC 1/2

POTTER:
Hebron 11/21 (imm.)
Ayers Hill-Borie area, January (2 imm.)
Ulysses 1/20 (ad.)
Seven Bridges 2/20 (imm.)
Coneville 2/27 (imm.)
Greenman Hill 3/1 (imm.)

SCHUYLKILL:
Summit Station 12/27-12/28 (ad.)

SNYDER:
Faylor Lake 3/1-3/2

SOMERSET:
Buckstown, January (ad.)
Boswell, January (ad.)

SUSQUEHANNA:
Springville, January (imm.)
Franklin Twp., January (ad.)

TIOGA:
Mansfield area 10/31-2/4 periodically (1 ad.,
1 imm.)
Hammond Lake area 12/3-3/20 periodically
(imm.)
Cowanesque Lake 12/3 (imm.); 2/17 (2
birds)
Nessmuk Lake 12/18
Tioga Lake, January (imm.)
near Jobs Corners 5/14

UNION:
near Lewisburg 12/19

VENANGO:
Sugarcreek Twp. 11/25-2/27 (ad.)
Barkeyville grasslands (1 imm. 1/5; 1 ad.
1/30)
SGL 45 near Van, n.d. (ad.)
near Wesley 1/30 (ad.)
near Clintonville 1/30 (ad.)

WARREN:
Warren area 12/18
State Line Road 1/2 and 2/20
Chandlers Valley 2/12

WESTMORELAND:
Mammoth Park 11/16-12/5 and 2/26-2/27
(ad.)

WYOMING:
Beaumont 12/26 (imm.)

YORK:
Codorus State Park 12/31-1/1 (ad.)

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Cooper's Hawk, banded in PA, recovered in New Brunswick by Roy Frock

I had an interesting recovery. I banded a HY (hatching year) female Cooper's Hawk at Lehigh Furnace Gap in September, 1993. It was found injured and being mobbed on the ground by crows underneath a power line in St. John, New Brunswick, Canada on 1/07/00. It was kept in a rehab center and died at the end of January. The lady from the Canadian Wildlife Service who reported the recovery said that Cooper's are very unusual up there and do not nest there. It was so unusual that they are mounting the bird for the New Brunswick Natural History Museum. Can you tell me what that Coop was doing all the way up there in the dead of winter?

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A Summary of Common Nighthawk Watches in Pennsylvania, 1999

by Scott Kinzey

In late August and early September of 1998 I observed flocks of Common Nighthawks (*Chordeiles minor*) along the Allegheny River in Allegheny County. At the same time, there were other birders in the state reporting large flocks of nighthawks. Late August is the prime time for Common Nighthawk migration in Pennsylvania. I started to wonder if Common Nighthawks could be observed and counted at fixed locations during their migration period as raptors are at "hawk watches".

In the summer of 1999 I put this idea to the test. I set-up a watch site along the Allegheny River just upstream from Lock and Dam #2 in the Highland Park section of Pittsburgh, Allegheny County. This site was chosen because I had seen many nighthawks here in late August 1998, the view is excellent, it is close to home and other good birds are possible. For several years, this was the site of Pennsylvania's only known Herring Gull nesting colony. The colony is still active.

I did some research by looking for reports of Common Nighthawk in several years of *Pennsylvania Birds*. My findings suggested that their migration in Pennsylvania begins in mid-August, peaks in late August/early September and ends in late September with only a few stragglers in October. There were a lot of high counts especially in the period from August 22 through September 6.

My method was to sit by the river and count Common Nighthawks in roughly the last two hours before dark from August 15 to September 6. With the help of local birders I was able to get coverage every evening except August 24. We recorded 1,775

nighthawks in 34 hours on 25 days. Data recorded on most evenings included weather, exact time and direction of flight of all birds, start time, end time, and other birds. The complete data is available by request. I have included here a simple table.

If nothing else, this data

possible re-counting of birds. I had hoped that all of the birds would come out of the north or generally upriver and fly towards the south or generally downriver. Well, this didn't happen as often as I had hoped. I talked to a few local experienced birders including Paul Hess and Mike Fialkovich about

Date and Number of Common Nighthawks Recorded

Date 1999	Number of Nighthawks	Date 1999	Number of Nighthawks
05-Aug	0	27-Aug	672
06-Aug	2	28-Aug	18
15-Aug	20	29-Aug	0
16-Aug	52	30-Aug	5
17-Aug	32	31-Aug	2
18-Aug	18	01-Sep	4
19-Aug	95	02-Sep	6
20-Aug	11	03-Sep	3
21-Aug	32	04-Sep	4
22-Aug	250	05-Sep	1
23-Aug	169	06-Sep	27
24-Aug	No Data		
25-Aug	99		
26-Aug	253		
	Totals	Birds	1775
		25 days	
		34 Observation Hours	

* Note that estimating was done at times when counting an exact number was difficult. In cases when birds flew in more than one direction estimation was even more difficult.

* I checked the site on August 5th and 6th to get a baseline.

shows that Common Nighthawks can be observed and counted from a fixed location during their migration period. I was very pleased that I had taken the time to do the survey. I hope that I will be able to do the survey again in 2000.

There is one issue that I encountered and that is the

this and they felt that recounting probably isn't a problem here. I remain skeptical. An analysis of the direction of flight data showed that 69% of the birds flew towards the south, southwest, or west. These are the logical directions for migration towards South America, however, my analysis was crude

and probably wouldn't be accepted in a critical review. Is it possible that this area is a temporary staging location and that I saw the same birds on several days?

Another question is what time of day do Common Nighthawks migrate? On days that I arrived early, I didn't see many birds. There were exceptions to this. On the day with the highest count, August 27, Bill Hintze noted that he probably missed some birds because there was a very large flock already flying when he arrived at the site early. Early in the count period, nighthawks showed up in numbers starting at around 8pm. By the first week of September it is almost dark around 8pm so the birds were seen an hour or two earlier. I think that choosing the last 2 hours before dark is a safe way to see most of the birds, but how much longer into the night do they go?

Other birders in Pennsylvania and other states are attempting similar "nighthawk watches." As I was doing my watch, Ron Singer of the Jacks Mountain Hawkwatch initiated a project which he called "Project Nighthawk." He found people in 13 states who conducted surveys like mine at 28 sites and sent him the data which is summarized in a report. The report written by Ron Singer is available by contacting him by e-mail at ris@vicon.net or me by phone (see below). There is an internet web site for this project at <http://www.vicon.net/~ris/Home.htm>. The following table contains the data of the sites in Pennsylvania.

I am looking forward to the year 2000 season. Contact Scott Kinzey at 412-828-2993 for more information about this subject.

I'd like to give thanks to the local birders who helped to staff my Pittsburgh site. They were Bill Hintze, Claire Hintze, Wendy Shumansky, Kerri Evans, Paul Hess, Deborah Hess, Randi

Gerrish, Sarah Gerrish and Mike Fialkovich.

Date	Del	Har	Kem	Lew	McV	Mer	Mif	Pet	Pit	Ple	Say	Sha	Sta
15-Aug					4	0			20			13	3
16-Aug					25	1			52			13	7
17-Aug	1		1		4	2	9		32	0		5	0
18-Aug	1				8				18			97	0
19-Aug	2				6	17			95	1		109	
20-Aug	1					2			11	0			
21-Aug		0		17					32	2		86	
22-Aug			1	160	188	1		2	250	2		144	21
23-Aug	3	0		60	15	4		275	169	46		346	
24-Aug		1	0	0	3	15		15		82		19	
25-Aug		0			10			12	99	11		2	
26-Aug		0					15		253	21		23	6
27-Aug	2	0		17			2		672	128	3	85	
28-Aug	6	0	2	1	11		1		18	10		3	
29-Aug			3	12	0			0	0	0			
30-Aug		0			0			0	5				
31-Aug				0	0			0	2	0			0
01-Sep	6	0			0	1			4	7		6	
02-Sep	2			0		4			6	6			
03-Sep		7				15			3	3			
04-Sep			1						4				
05-Sep									1				
06-Sep									27				
07-Sep													
08-Sep						1							
09-Sep										0			0
10-Sep										5			
11-Sep						1				0			
Totals	24	8	3	267	274	64	27	304	1773	324	3	951	37

Grand Total: 4064

Location	County	Contact/Observer
Delmont	Westmoreland	Ken Byerly
Hartstown	Crawford	Marvin Byler
Kempton	Berks	Hawk Mountain
Lewiston	Mifflin	Gloria Bickel
McVeytown	Mifflin	Ron Singer and Margaret Kenepf
Mercer	Mercer	Troyer Birding Team
Mifflintown	Juniata	Toby Petersheim
Petersburg	Huntington	Greg Grove
Pittsburgh	Allegheny	Scott Kinzey
Pleasant Hills	Allegheny	Sam Sinderson
Saylorsburg	Monroe	Allan Vogt
Shavertown	Luzerne	Jim Hoyson
State College	Center	Molly Heath

BOOK REVIEW

by Gene Wilhelm

The Birds of Pennsylvania. Gerald M. McWilliams and Daniel W. Brauning. Foreword by Kenn Kaufman. xiv + 479 pp; front cover color photograph of Golden-winged Warbler + 67 black and white photographs of birds and 44 maps. Cornell University Press, Ithaca, N.Y. 14850. Cloth. \$39.95.

I have been reviewing bird books for *Pennsylvania Birds* since its inception, yet not one has given me such genuine reading pleasure as *The Birds of Pennsylvania*. The text is well written and editorially clean, scientifically accurate and thorough, and esthetically appealing with a balanced number of rare and elusive bird photographs and breeding distribution maps of the most commonly observed birds.

Indeed, its excellence is due in no small way to the complementary backgrounds of the co-authors, both of whom are well respected in Pennsylvania birding circles. Gerry McWilliams is a fine all-around naturalist (he studies butterflies as well as birds) who has focused primarily on Presque Isle State Park and Erie County's avifauna. His field knowledge of migration timing in northwestern Pennsylvania is unequalled and for this book he calculated the first detailed accounts of wintering bird distribution. Dan Brauning lives in central Pennsylvania yet has accomplished extensive field studies throughout the state, first as coordinator of the Breeding Bird Atlas Project (1983-1989) and later in his work on bird conservation issues. While the Breeding Bird Atlas covered the nesting birds in Pennsylvania, the migrants were left out. This new publication fills in the gaps left by the atlas, builds on and updates that previous work and includes all species recorded in the state. In short, the co-authors command a formidable knowledge and understanding of Pennsylvania bird

life which is evident in their book.

The Birds of Pennsylvania opens with a succinct Foreword by Kenn Kaufman, Field Editor of *Audubon Magazine* and world renowned birder, in which he reminds the reader that Pennsylvania looms large on the map of eastern North America and larger still in the history of bird study. Both Alexander Wilson and John James Audubon, two major founders of American ornithology, had Pennsylvania associations. The state also had many other distinctions in the avian realm (see p. ix). But as Kaufman concludes:

“Yet I would say that Pennsylvania's stellar position in ornithology is eclipsed by its importance to the birds themselves ... as a major reserve for nesting... The extensive forests of Pennsylvania ... have become more and more essential to maintaining healthy populations of Scarlet Tanagers, Wood Thrushes, and many other species. This key importance makes Pennsylvania the Keystone State in an avian sense as well as in U. S. history.”

In light of the great significance of Pennsylvania to birding and birds, therefore, it might seem strange that no comprehensive state bird book has appeared since Warren's *Birds of Pennsylvania* (1890) over a century ago until one realizes the sheer scope of the task, from the amount of data to be summarized, to accounts for recent species splits, name changes and altering taxonomic sequence. Clearly there was an overdue need for an up-to-date book on the birds of Pennsylvania, and fortunately for us, McWilliams and Brauning accepted the ornithological challenge.

The co-authors state their goal in the Preface (p. xii):

“To create a comprehensive modern reference work, with a historical review, on the status and

distribution of the birds of Pennsylvania. The word modern is defined in this book as the period from about 1960 to 1998. This book serves to extend our knowledge not only of the status and distribution of the birds in Pennsylvania but also of the status and distribution of the birds of the eastern United States. It is intended to be used by all audiences from novices to advanced birders and ornithologists.”

McWilliams and Brauning gratefully acknowledge the observations of thousands of birders across Pennsylvania and especially recognize the nearly 100 county contributors (see list p. xiii) who made it possible to make accurate assessments of the distribution of wintering birds in Pennsylvania for the first time. Research for the manuscript began in the autumn of 1990 and took over nine years to complete.

The book is divided into two parts: Part I - Introduction is subdivided into Historical Perspectives on Bird Populations and Habitats, Seasonal Calendar of Bird Life, Physiographic Regions, Bird Sites, Overview and Format of the Species Accounts, Journal References, Background on Breeding Information Sources, Abundance and Frequency Categories, Documentation of Bird Sightings and Abbreviations (pp. 1-24). Lack of space will not allow me to discuss each one of these subdivisions but in sum they are all superbly written. I would like to stress only a few of these subdivisions here.

Historical Perspectives on Bird Populations and Habitats is especially lucid and well written. Every birder and conservationist living in Pennsylvania should read this part of the book (pp. 1-5) because it clearly details the broad-scale changes in habitats and resulting populations of Pennsylvania birds since 1600. Pennsylvania was predominantly a

rough, unbroken wilderness covered by a mixture of deciduous and coniferous forests on the eve of initial European settlement. But by the time Warren published his *Birds of Pennsylvania* in 1890, much of Penn's Woods had been extinguished to a mere 25% of its former grandeur. Industrial development and a new surge of immigration promoted incredible changes to the Pennsylvania landscape through the nineteenth century. Canals, railroads, roads, mining, lumbering, and farming all contributed to this natural disaster.

However, habitat conditions never remained static and they began to improve somewhat about the turn of the twentieth century. Agriculture acreage reached its peak in 1900 (about 20 million acres or two-thirds of Pennsylvania land area) which provided new habitats for open-country birds like Eastern Meadowlark and Upland Sandpiper. At the same time, federal and state agencies and private conservation organizations like the National Audubon Society began protecting our natural resources. Further, as people left farms and moved to cities seeking better jobs, Pennsylvania forests regenerated and an explosion of shrub-associated bird populations occurred. Although there has been a continuous decrease in Pennsylvania wetlands over the past several decades, the dawn of the new millennium more closely resembles the landscape and bird life of William Penn's time than it has for 150 years. Forest land now covers 59% of the state, the highest since the Civil War. Of course, many conservation/preservation challenges remain but Pennsylvania currently represents a stronghold for migrating and breeding birds in the northeastern United States.

Part II: Specie Accounts is by far the bulk of the book (pp. 5-462) and outstanding for its sheer amount of information. A total of 429 species is listed in this section. Of this total, about 200 species have been known to breed in the state and 30 species are listed as hypothetical. A photograph, a specimen, a taped recording or a satisfactory written

description constitutes documentation. A summary of the status and distribution provided in the AOU check-list is included for each species from earliest historical records until October 1998. English and scientific names as well as the new taxonomic sequence of species are based upon the classification and nomenclature of the seventh edition of The American Ornithologists' Union's Check-list of North American Birds (AOU 1998). Each account is divided into categories to assist the reader in locating specific data: General status, Habitat, Seasonal status and distribution which includes the sections Spring, Summer, Breeding (where applicable), Fall and Winter, and History or Comments (or both). The categories used may vary from species to species depending on the relevance to a species' status and distribution in Pennsylvania.

I especially appreciate the Seasonal Status and Abundance section because it is an attempt to define species' distribution, frequency of occurrence and abundance for each of four seasons and in each Pennsylvania physiographic region where sufficient data permit. The seasons are defined on the basis of the arrival and departure times for each species, not by astronomic seasons. For example, spring is defined as the time when northbound migrants are passing through Pennsylvania, a period which may extend from about the third week of February to about the first week of June, including most of the early arrivals and late spring departures of most species.

Terms to describe abundance and frequency have been used in varying ways in many publications, thus causing confusion and difficulty in terminology. The co-authors take a sensible quantified approach and establish a terminology model that should be used universally in all future ornithological publications in Pennsylvania and at least the northeastern part of the United States. *Relative abundance* refers to the number of individual birds likely to be encountered at a particular season and place. Numerical ranges

are guides to the approximate number of individual birds an experienced observer could see or hear in a single day or season. For example, Abundant: 100 or more per day; Common: 26 to 99 per day; Fairly common: 6 to 25 per day; Uncommon: up to 5 per day, up to 25 per season; Rare: 1 to 5 per day, up to 5 in a season. *Frequency of occurrence*, on the other hand, reflects the number of times a species has been recorded over a period of years. For example, Regular: recorded nearly every year; Irregular: not recorded every year, but at least once every two or three years; Casual: three or more years between records, but recorded at least 10 times ever; Accidental: recorded fewer than 10 times or not recorded in the past 10 years.

Once again, this volume is an indispensable resource for all birders, amateur and advanced alike, and professional ornithologists in and outside Pennsylvania. It contains a wealth of scientific data never gathered before and, I venture to conclude, will not be superceded for decades to come.

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Bird Misidentification

By Dick Byers

An ornithologist found himself crawling across a mudflat on the west coast of Hudson Bay near Churchill, Manitoba. In the thick fog he was stalking what he was certain was a Hudsonian Godwit. It was the summer of 1931, the mosquitoes were biting and sweat was pouring from his brow, but he successfully managed to get within 30 yards of his quarry where he raised his shotgun and collected the bird. Upon picking up the carcass, however, he was astonished to find he had killed, not a Hudsonian Godwit, but a Stilt Sandpiper in full breeding plumage. How could he have made such a mistake? Was the heavy fog responsible for misjudging the bird's size by a factor of two? Also, the curve of the bill is opposite in these two species further making the mistake inexcusable.

A few years later in the northern panhandle of West Virginia this same person saw what he believed to be a Blue Grosbeak, a species never reported for that area before. He collected the bird only to discover he had killed a Gray Catbird, a species common to the area. What was his excuse this time? The sky was clear and very blue that day. The feathers of the catbird's back had reflected that blue. Mindful that he had failed to collect important specimens before because of too much deliberation and convinced the blueness had to be that of a Blue Grosbeak he took the bird's life without checking the shape of the bill.

On September 13, 1954, in central Oklahoma our expert of two mistaken identities fired at what he believed was a Philadelphia Vireo. He had noticed a strongly yellowish tone on the flanks and a warm tone on the chest and was confident of his identification even though he had heard a Warbling Vireo singing more than once. The dead bird turned out to be a Warbling Vireo.

Who was this ornithologist who had made these inexcusable mistakes? He was none other than George Miksch Sutton, one of the most prominent bird illustrators and ornithologists of his time. If you are unfamiliar with this man, see Greg Grove's excellent biographical sketch of Sutton in *Pennsylvania Birds* Vol. 13,

No. 4. George admitted these mistakes in the 1977 October Bulletin of the Oklahoma Ornithological Society.

Ludlow Griscom was well known as a man with uncanny bird identification skills who inspired Roger Tory Peterson, but even Griscom made mistakes. He shot a Bonaparte's Gull and a Common Tern at Lake Cayuga for the Cornell University collection in 1916. Twenty years later a close examination of the skins found them to be a Little Gull and an Arctic Tern, western New York's first record for both species.

All of us, I am sure, have been fooled more than once by our perceptions. Sometimes we realize it immediately; at other times it doesn't dawn on us until hours or days later. Weather conditions can change the appearance of things. Lighting is extremely variable and the angle of view can make all the difference in the world on how we interpret what strikes our eyes. Optical illusions are rather common in the wild and size is the easiest thing to misjudge. In fact I gauge the extent of a person's outdoor experience by how much he believes he can be fooled by his perceptions of size. It is easy to perceive an animal to be much larger than normal or smaller than normal. I have been mistaken both ways, by both birds and mammals. In my experience, mammals illustrate the point much better than birds. I cannot remember where I was or the date, but I do recall a striking illusion that myself and several others had on a nature hike on an overcast morning. We were walking next to a rocky cliff overhang when someone pointed a finger at the cliff and excitedly called out "look at that." All of us turned and stood gaping in utter awe at an animal walking along the ledge above us. It appeared to be an adult mountain lion or cougar. The illusion held for several seconds before we all realized we were looking at a tan uniformly colored house cat. Had the cat disappeared before we had time to assess it's size I think all of us would have believed we'd really seen a cougar. I don't know why the cat appeared so large to all of us, but the illusion was very real and very convincing. Fortunately, the animal

was there long enough for us to realize our mistake. Quick glimpses of an animal under similar circumstances, however, often leave people dead sure they'd seen a giant instead of a dwarf.

The exact opposite situation can occur. I remember a morning rabbit hunting with my brother and father. All three of us were spread out in a field about 15 yards apart when we reached the edge of a wooded slope. Just as we entered the woods a rabbit flushed from its bed in front of us about 20 yards away. All three of us instinctively raised our guns to our shoulders, but none of us fired. Each of us had determined when the gun was halfway to our shoulders that the animal we'd flushed was not a cottontail at all, but a full-grown adult white-tailed deer. The white flag of the deer's tail and the bounding gait for just a split second looked no larger than a cottontail. All three of us commented on how we'd all been temporarily fooled. Again I don't know the why of this illusion. We were looking downhill. That may have been a factor and of course our minds were on rabbit. Sometimes you think you see what you'd like to see.

Can you mistake a deer for an owl? I did. I was squirrel hunting one evening a long way from my vehicle. Darkness fell rapidly on my way back to the truck and I was walking out on an old logging road beside a hedgerow of Viburnum, an understory shrub. Suddenly I became aware of a flapping motion on the other side of the bushes. It appeared a bird was flying past me at eye level on the other side of the hedge but it was too dark to make it out. All I could see was the wingbeat, large, very deep, and silently slipping past me. The silent flight coupled with the knowledge only an owl would be about at dusk made me believe a Great Horned or Barred Owl was flying past me. Then the bird turned through a break in the hedgerow and crossed the logging road in front of me. Against the lighter background of the road I easily made out the silhouette of a bounding whitetail deer and instantly realized I had mistaken the flap of that big white tail for the underside of an owl's wing. The ground was damp and anyone who

has hunted deer knows how quietly deer can run in the woods in even dry conditions. That deer passed me at no more than 15 feet and I never heard a sound. Had he not crossed the road I would have been certain I'd seen an owl. How many times, I wondered, have I been mistaken and not known it?

Sometimes we fail to identify a bird because the image or name of the bird we're seeing simply doesn't enter our mind due to limited experience with that species. This has happened to me twice. On the Pittsburgh Christmas Bird Count in 1974 I was descending a wooded ravine toward the Allegheny River with two other birders. We watched a huge bird fly into a tree far below us. With at least 300 yards separating us we could only tell the bird was a raptor. None of us was carrying a scope and 7 X 35 was our highest power binocular. Through the trees the entire front of the bird appeared white. We were too far away to see any markings. A light bellied Red-tailed Hawk was a consideration, but even at that distance the bird seemed too large, even for a Red-tail. Were we wrong thinking it was a raptor? Might it be a heron? We decided to get closer and started our descent down the slope, but the bird flew away in the opposite direction before we had made much progress. The huge wingspan left us puzzled. We figured it was probably a Red-tail and that we had misjudged its size, so we recorded it as an unidentified raptor. The next evening at the Bird Count banquet of the Audubon Society of Western Pennsylvania I ran into a conversation that told me what we'd seen. People from another field party were talking about some non-birders they met along the Allegheny River who told them they'd just seen an Osprey. The birders searched but were unable to locate the Osprey for confirmation. When I asked where they had encountered the people who saw the bird it turned out to be near the opening of the ravine my party had been descending. I then realized why the bird appeared so white. Why hadn't I thought of Osprey? This was 1972 before the Osprey re-introduction program and an Osprey along that section of the Allegheny River at any time of the year would have been an unusual sighting. It was also much earlier in my birding career and I

hadn't seen that many Ospreys. Osprey simply never entered my mind. Today in the same circumstances I would quickly have recognized it.

In 1985 I was backpacking the Black Forest Trail in Lycoming County with my dog in early June. As we came off the trail to where my car was parked a huge hawk sailed over my head calling to its mate. The light was bright and I could only see a black silhouette. I didn't recognize the call. At first it sounded a little like a Broad-winged Hawk, only louder, but the bird's size was much too large for a Broad-wing. Then it started sounding more like a Red-tail, but not quite. The hawk landed in a tree and continued calling. I had only my backpacking binoculars, a miniature pair of 7 x 21. The small objectives don't gather much light and the canopy shaded the hawk. Although the bird was partially concealed by branches I saw what appeared to be a very dark bellyband, but figured it was due to the shadow of a branch. The size of the bird indicated a Red-tail, but the call didn't agree. Some birds have voices that depart distinctly from the norm and I was thinking it was a Red-tail with an aberrant voice. Its mate, however, was returning a similar call. When the bird flew it passed between the sun and me and I couldn't see a single field mark. I was totally puzzled. Three days later at home I got out the bird records and played the hawk calls of the Red-tail, Broad-wing and Goshawk. The closest resemblance was the Red-tail but that wasn't it. I then went through the entire hawk section and was flabbergasted when I recognized the call. It was that of the Rough-legged Hawk. I had never heard their call although I had seen them in Erie and Crawford County at close range, but in early June in the Allegheny Mountains they had never entered my mind. It was the wrong season and the wrong habitat. I had to be wrong I thought to myself. What were those birds doing there at that time, or any time? Rough-legged Hawks are not birds of mountainous terrain. They should have been on the Arctic tundra. This was before the PSO and the journal of Pennsylvania Birds. There was no one to call to confirm it and I wasn't going to make another six-hour drive. It had been three days since I'd seen them. I did not mention it to anyone being fully aware that no birder in their right

mind was going to believe me. The sighting was so far fetched I wasn't even sure if I believed it. To this day I still wonder if that really was a Rough-legged Hawk, and how much I regret failing to instantly recognize an out of place species. I had thought of all the normal possibilities, but didn't think of any of the impossibilities. This is a type of thing psychologists call a mindset. The mind can only dwell on what experience has taught us and it is very difficult to over-ride that to see other possibilities. Mindsets are also the reasons for several types of illusions.

In the Westmoreland County Bird Club we have a gag award for the best misidentification of the year. It's a carving of a buzzard caricature with a pot belly on a dead snag overlooking a small carved human skull and a pair of binoculars (all that's left of the birder). Past recipients include someone who identified a barking dog as a Green Heron, decoys as live ducks and a chickadee on the Christmas count that turned out to be a phoebe. All the recipients thus far have been the best birders in the club. We are reluctant to embarrass a beginner although some of the beginner tales are even more hilarious. Someone called to report a Long-eared Owl roosting on top of a McDonald's restaurant in Greensburg. She had field guide in hand and despite being told this was out of character for the species and that it was more likely a Great Horned she could not be persuaded it wasn't a Long-eared Owl. Stranger things have happened, so I sent someone to check it just in case. An experienced birder got there shortly after dark and said it was a Great Horned. The real truth came out the next morning when another birder reported it was a plastic Great Horned Owl the restaurant people had put on the roof to scare away the pigeons. There are other stories even more hilarious than this one.

Birders learn caution as they age and become more experienced. We don't make the call as quickly as when we were young. We learn that there are numerous ways that lighting, fog, shadows, and odd angles can play tricks on our perceptions. Our psychological inclination at the time can also influence how we interpret what we see. On a recent trip to Texas I saw a small yellow-eyed earless owl

in the shadows for just a few moments in late June. Close as I was (15 feet) I didn't recognize it and I'm an owl person. Ferruginous Pygmy Owls inhabit the area, but it didn't have the long tail and it was a bit too large, but there weren't any other earless owls in that part of Texas. It took me five minutes to realize I'd seen an immature screech owl that hadn't yet developed the conspicuous ear tufts. I wanted it to be a pygmy owl so bad I failed to instantly recognize a bird I've seen, studied and photographed in my own backyard many times.

All of us, including myself, criticize the bird records committee for demanding exacting proof. Turning down sightings doesn't win them any popularity, but I reluctantly admit they have to be hard nosed. In their position I would probably be just as demanding. All of us know how easily mistakes can be made and from Sutton's confession even the most experienced birders can be fooled. Dave Spector, in a BWD article, says it usually takes an expert to make a misidentification. He relates how he mistook a Great Blue Heron for a Belted Kingfisher. When the kingfisher he saw took off, the stump he was sitting on took off with him. The "kingfisher" was the head of a Great Blue Heron and the "stump" was its streaked body. Caution and experience are the birder's best allies but there will still be times when nature and our minds plays havoc with our perceptions.

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Rare Bird Reports

Edited by Nick Pulcinella

Bullock's Oriole *Icterus bullockii* Lancaster County

On January 9, 2000 Mike Gockley first noticed the oriole in his yard. He saw the bird again on January 15th. The bird was seen most of the morning frequenting a suet feeder approximately fifteen feet away allowing easy study from inside the house. Mike suspected a possible Bullock's Oriole and notified other local birders and soon thereafter the general birding community was alerted to the presence of this rare wanderer to Pennsylvania.

Several observers have submitted documentation both in the form of written notes and photographs for evaluation by the Pennsylvania Ornithological Records Committee (PORC) and inclusion into the historical record. Observers have emphasized the following field marks as favorable for Bullock's Oriole. The head had a grayish crown with dull yellow wash at the forehead. The yellow wash on the face extended up into the cheek and continued back into the ear. There was a faint, but definite, eye stripe and pale supercillium. There was a gray line from the bill through the eye. The back was described as a uniform gray, with a faint saddle and pale markings on the outer back. The rump was gray contrasting with the tail. The underparts were described as having an upper breast that was pale yellow giving way to an off-white or pale gray belly. The under-tail coverts were described as faint yellow. A field mark that most observers stressed was the presence of two wingbars with the upper wingbar having a "serrated" or "saw-tooth" appearance. The feathers of the lower wingbar were described as having obvious white edgings extending up towards the upper wingbar.

A few observers had the

unusual pleasure of seeing both the Bullock's and a nearby wintering Baltimore Oriole on the same day, thus being able to make fresh comparisons of the plumage differences.

RB Editor:

Bullock's Oriole breeds from southern British Columbia, southern Alberta and Saskatchewan and south along the Pacific Coast to northern Baja California and east through central and southern Texas, western Nebraska, western Kansas and western Oklahoma (AOU 1999). They winter primarily in Mexico and Central America. It is casual in the northeast in winter and there have been a few recent documented reports of wintering adult males (Mantlik et al 1998, Hunt 1999). In the past there have been several orioles reported as female/immature Bullock's in Pennsylvania but, there is only one accepted record, a female photographed near Blue Marsh Lake, Berks Co., 8-18 January 1994 (McWilliams 2000).

Identification of adult male Bullocks usually causes no problem. Problems arise when a dull female/immature oriole appears. Attempting to separate these dull orioles into either Baltimore or Bullocks can cause some real problems. Some dull winter female/immature Baltimores can have a white-gray belly and dull yellow wash to the face and breast very much like most female Bullock's portrayed in popular field guides. Without good photographs or documentation some of these birds may best be left unidentified. An article published in *Birding* (Lee 1998) described a "new" field mark that can be used effectively to separate females/immatures of the two species. This separating field mark is based on obtaining good looks at the wingbars. In short, Bullock's possesses a "serrated" upper wingbar. This occurs because the

bases of the white tips on the median covert feathers are more deeply indented by black feather centers than those of Baltimore. In the Baltimore the bases of the white tips are more shallowly indented by the black feather centers giving a more squared-off appearance. Also in Bullock's the white feather edging of the greater coverts extend far up the leading edge of the greater coverts, giving a smeared effect between the wingbars. In Baltimore, these white feather tips do not extend up the leading edge but stop abruptly producing a second straight-edged wingbar.

Dull wintering female/immature orioles are a challenge as well as a headache. It is hoped that all future wintering orioles will be scrutinized as closely as this one. We still have a lot to learn about identification and distribution of these rare wintering birds and only through good solid and careful study and documentation will we make our discoveries.

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Pennsylvania Bird Lists For 1999

Compiled by Peter Robinson

A total of 84 reports were submitted for 1999, including 44 Pennsylvania state annual lists.

There are now 52 birders whose Pennsylvania life lists are above 300. Joining this group for the first time are Bruce Carl and Mike Fialkovich. Number 300 for Bruce was a Bicknell's Thrush that was in northern Lancaster County May 15-17 (seen well by several people and identified by its song), followed by a Red-necked Phalarope on August 22 at the Conejohela Flats (Lancaster County), and a Red Knot (#302) September 4, also at the Conejohela Flats. Mike's 300th state species was the Purple Gallinule at Presque Isle on October 15, which was followed by a Parasitic Jaeger November 7 at Presque Isle (#301), and the Spotted Towhee at Export (Westmoreland county) on December 31 (#302).

It is interesting that even those with the top Life Lists are able to keep adding a few new species to those lists. Frank and Barb Haas added Lark Sparrow and Black Guillemot to their Life Lists in 1999. Deuane Hoffman added Black Rail, Gull-billed Tern, Royal Tern, Purple Gallinule, and Black Guillemot. Eric Witmer added 5 species and Tom Garner added 3 species since their last reports. Jerry Book added Lark Sparrow, Bicknell's Thrush, and Black Rail during 1999.

There were 7 birders who found 250 species or more in Pennsylvania during 1999. Another 9 birders found 225 to 250 species. Deuane Hoffman's reported total of 296 for 1999 was the high, 23 species more than John Fedak's 273 species. It will now take 255 species to be included in the top 50 PA Annual Lists.

There are now six birders who have County Life Lists of over 300 species. One of these lists is from Erie County. The other five are all from Lancaster County. Deuane Hoffman has the top County Life List for 11 of the 67 Pennsylvania counties. There are still 14 counties with top lists under 200. It will now take 255 species to be included in the top 50 County Life Lists.

New highs were established for County Annual Lists for 19 counties in 1999. On the other hand, John Miller's high Philadelphia County Annual List of 225 was established back in 1965.

County Annual Lists in the all time top fifty were submitted by Ken Lebo (240 for Berks), Gerald McWilliams (238 for Erie), and Deuane Hoffman (230 for Lancaster). It will now take 226 species to join the top 50 County Annual Lists.

I'm wondering how much interest there would be in adding another "List" category for 2000 and beyond. The first question is what to call the list. "PA Life List - Unassisted"? The list would be those species of birds that a person finds and identifies in Pennsylvania **ON THEIR OWN**. The list would **NOT** include "chase birds", the birds that someone else finds first, you find out about, then you go to see (a "chase trip"). Your "unassisted" list **WOULD** include a bird spotted first by someone with whom you are birding at the time. It also **WOULD** include a bird that you found and did not yet know that someone else had already found. I think that this list would be an interesting category, would certainly be a different set of numbers, and a different mix of PA birders than the usual PA Life List. Please let me know if you are interested in this new list, have any suggestions about what to call the list, and any suggestions for how to define it. (peterrobins@hotmail.com or P. O. Box 482, Hanover, PA 17331)

Totals marked (B) were originally published in the ABA Birding list supplement.

Pennsylvania Life Lists 1 359 Barbara Haas 99 2 357 Franklin Haas 99 3 355 Deuane Hoffman 99 4 347 Eric Witmer 99 5 344 Tom Garner 99 6 343 Jerry Book 99 6 343 Rick Wiltraut 98 8 342 Bernard Morris 99 9 339 Randy Miller 99 9 339 Robert Schutsky 99 11 338 Jan Witmer 97 12 337 Dave DeReamus 99 12 337 John Miller B 97 14 336 William Stocku B 97 15 333 Richard Colyer 99 16 332 Ken Lebo 99 17 330 Joyce Hoffmann 99 18 329 William Murphy 99 18 329 Paul Schwalbe 98 20 328 Jason Horn 95 21 327 Steve Santner 99 21 327 Glenna Schwalbe 98 23 324 Harry Franzen 96 24 323 Jonathan Heller 98 24 323 Arlene Koch 99 24 323 Harold Lebo 99 27 322 Fritz Brock 98 27 322 Al Guarente 99 27 322 Gerald McWilliams 99 30 319 Steve Farbotnik 98 30 319 John Fedak 99 30 319 John Ginaven 98 33 318 Phillips Street 99 34 316 Margaret Higbee 99 35 315 Evelyn Kopf 95 36 314 Walter Shaffer 99	37 313 Harold Morrin 96 38 311 Devich Farbotnik 98 38 311 Dana Shaffer 99 40 307 Don Henise 97 40 307 Ronald Leberman 96 42 306 Ernest Schiefer 99 43 305 Robyn Henise 97 43 305 Gene Wilhelm 92 45 304 Skip Conant 99 46 303 Tom Clauser 99 47 302 Bruce Carl 99 47 302 Mike Fialkovich 99 47 302 Edward Pederson 98 47 302 Sam Stull 85 51 300 Larry Lewis 88 51 300 Richard Timm B 97 53 299 Keith Richards B 82 54 298 Roger Higbee 99 55 297 Allan Keith B 98 56 296 Ed Kwater 96 56 296 Peter Robinson 99 58 295 Frank Windfelder B 98 59 294 James Baxter 86 59 294 David Freeland B 97 59 294 George Malosh B 96 59 294 Terence Schiefer 99 63 293 John Peplinski B 94 63 293 John Salvetti 99 65 292 Carl Garner 99 65 292 Matt Wlasniewski 99 67 291 William Reid 99 68 290 David Abbott B 98 68 290 Kenneth Gabler 99 68 290 Chuck Tague 99 71 289 Kevin Crilley 98 71 289 Allen Schweinsberg 98 73 285 Armas Hill B 96 73 285 Neal Thorpe 97	75 284 James Gray B 83 76 283 Kerry Grim 98 77 282 John Billings B 98 77 282 Thomas Reeves 98 79 279 Mark McConaughy 99 80 278 James Baird B 81 80 278 Merrill Wood 91 82 277 Bonnie Baird B 81 83 274 Richard Koval 99 83 274 Gloria Lamar 92 85 273 Katrina Knight 99 86 272 Scott Kinzey 99 87 271 James Flynn 97 88 270 Randi Gerrish 99 89 269 David Kyler 96 90 268 Sarah Gerrish 99 91 267 Harry Henderson 91 92 266 Scott Bills 99 92 266 Joe Meloney 94 94 264 Aden Troyer 98 95 261 Sam Sinderson, Jr. 99 96 260 Dennis Miller 99 97 259 Linda McWilliams 92 97 259 Dave Rieger 99 99 257 Dick Byers 95 99 257 Russell Ryan 93 101 256 Ted Grisez 96 102 255 Eugene Zielinski 98 103 253 Scott Bastian 99 103 253 Greg Grove 99 105 252 Bob Machesney 99 106 249 Neil Troyer 99 107 245 Bill Reddinger 99 108 244 Robert Frantz 99 108 244 Jeff Payne 99 108 244 Harvey Troyer 99 111 242 Walter Fye 97 111 242 Steve Graff 98	111 242 Jerry Troyer 99 114 241 David Hawk 99 114 241 Retta Payne 99 116 238 Roy Ickes 99 117 235 Gary Edwards 95 117 235 Wayne Laubscher 99 119 234 Dale Gearhart 99 120 232 Joe Strasser 94 120 232 Voni Strasser 94 122 231 Larry Brown 98 123 228 Deborah Grove 99 124 226 Eli Troyer 99 125 224 Arlene Brown 98 126 223 Pamela Woodman 93 127 219 Nick Kerlin 98 127 219 Ann Pettigrew 96 129 218 Michael Schall 99 130 214 Glenn Czulada 96 131 213 Richard Murphy 99 132 212 Marvin Byler 99 133 209 Martin Page 99 134 208 Jim Mountjoy 99 135 207 Mike Ward 99 136 206 Adam Miller 99 137 200 Fred Crowley 95 138 199 Candy Krenzer 99 139 186 Theodore Drozdowski 99 140 180 Thomas Mason 99 141 165 Benjamin Israel 99
Pennsylvania Annual Lists 1999			
296 Deuane Hoffman 273 John Fedak 265 Joyce Hoffmann 262 Walt Shaffer 260 Peter Robinson			

260	Dana Shaffer	
250	Mike Fialkovich	
244	Ken Lebo	
242	Gerald McWilliams	
236	Margaret Higbee	
233	Chuck Tague	
231	Dave Rieger	
229	Tom Clauser	
229	Harvey Troyer	
227	Jerry Troyer	
225	Neil Troyer	
224	Randy Miller	
220	Mark McConaughy	
218	William Reid	
217	Matt Wlasniewski	
214	Bruce Carl	
214	John Salvetti	
212	Roger Higbee	
205	Skip Conant	
202	Jim Mountjoy	
201	Bill Reddinger	
200	Marvin Byler	
200	Eli Troyer	
199	Adam Miller	
198	Bob Machesney	
196	Carl Garner	
193	Dale Gearhart	
190	J. Kenneth Gabler	
190	Al Guarente	
187	Michael Schall	
184	David Hawk	
174	Ernest Schiefer	
174	Sam Sinderson, Jr.	
171	Robert Frantz	
163	Benjamin Israel	
160	Candy Krenzer	
159	Dave DeReamus	
154	Theodore Drozdowski	
140	Martin Page	

Pennsylvania Annual Lists (top 50)

1	313	Deuane Hoffman	1998
2	306	Robert Schutsky	1992
3	305	Deuane Hoffman	1992
4	298	Deuane Hoffman	1997
5	296	Deuane Hoffman	1999
6	294	John Fedak	1998
7	293	Deuane Hoffman	1991
8	291	Deuane Hoffman	1996
9	290	John Fedak	1997
10	288	Barbara Haas	1986
10	288	Franklin Haas	1986
12	278	Sam Stull	1979
12	278	Gene Wilhelm	1983
12	278	Joyce Hoffmann	1998
15	277	Deuane Hoffman	1993
16	275	Deuane Hoffman	1994
17	273	Joyce Hoffmann	1991
17	273	John Fedak	1999
19	272	Randy Miller	1992
20	271	Jason Horn	1993
21	269	Jonathan Heller	1992
22	268	Terence Schiefer	1985
22	268	Deuane Hoffman	1986
22	268	Deuane Hoffman	1995
22	268	Peter Robinson	1998
26	266	Randy Miller	1991
27	265	John Fedak	1996
27	265	Joyce Hoffmann	1999
29	263	Gerald McWilliams	1983
30	262	Randy Miller	1993
30	262	Ken Lebo	1995
30	262	Walt Shaffer	1999
33	261	Gerald McWilliams	1991
33	261	Jonathan Heller	1993
35	260	Jason Horn	1992
35	260	Ken Lebo	1992
35	260	Gerald McWilliams	1992
35	260	Peter Robinson	1999
35	260	Dana Shaffer	1999
40	259	Gene Wilhelm	1982
40	259	Mike Fialkovich	1998
42	258	Steve Santner	1992
43	257	Jason Horn	1995
44	256	Deuane Hoffman	1990
44	256	Jason Horn	1994
46	255	Franklin Haas	1977
46	255	Ed Kwater	1989
46	255	Jason Horn	1991
46	255	Joyce Hoffmann	1996

50	254	Barbara Haas	1977
51	254	Ed Kwater	1992

County Life Lists By County

ADAMS

213	Arthur Kennell	95
212	Carl Garner	99
193	Nonie Kennell	95
194	Deuane Hoffman	99
169	Kenneth Gabler	99
150	Steve Santner	95
144	Russell Ryan	93
108	John Fedak	98

ALLEGHENY

240	David Freeland	85
227	Joyce Hoffmann	99
217	Mike Fialkovich	99
208	Ed Kwater	96
198	Bob Machesney	99
193	Sam Sinderson	99
189	Deuane Hoffman	99
188	Scott Kinzey	99
177	Randi Gerrish	99
168	George Malosh	89
159	Sarah Gerrish	99
144	Geoff Malosh	91
141	Greg Malosh	91
140	Margaret Higbee	93
138	Roger Higbee	93
134	John Fedak	98
122	Dick Byers	99
118	Dave Rieger	99
102	Steve Santner	95

ARMSTRONG

236	John Fedak	99
223	Margaret Higbee	99
211	Roger Higbee	99
188	Scott Bastian	97
175	Bill Reddinger	99
174	Deuane Hoffman	99
152	Steve Graff	98
120	Mark McConaughy	99
100	Steve Santner	95

BEAVER

188	Bill Hintze	99
168	Nick Kerlin	96
171	Deuane Hoffman	99
152	George Malosh	98
138	Scott Kinzey	98
124	John Cruzan	94
113	John Fedak	98
113	Geoff Malosh	91
112	Greg Malosh	91
108	John Snarey	97
102	Steve Santner	95

BEDFORD

208	Deuane Hoffman	99
147	John Fedak	99
122	Steve Santner	95
120	Kenneth Gabler	99
121	Richard Murphy	99
102	Randi Gerrish	99
102	Sarah Gerrish	99

BERKS

292	Ken Lebo	99
284	Harold Lebo	99
275	Kerry Grim	98
272	Matt Wlasniewski	99
270	Deuane Hoffman	99
262	Jason Horn	95
253	Ernest Schiefer	99
207	Barbara Haas	99
205	Terence Schiefer	98
199	Bernard Morris	99
192	Larry Lewis	88
174	Steve Santner	95
172	Al Guarente	99
168	Randy Miller	99
159	Jonathan Heller	98
149	Kevin Crilley	98
139	Scott Bills	92
135	John Fedak	99
130	Bruce Carl	98

BLAIR		
180	David Kyler	96
158	Deuane Hoffman	98
104	John Fedak	98
103	Steve Santner	95
76	Don Henise	97

BRADFORD

229	William Reid	99
194	Ronald Young	93
168	Frances Biles	85
145	Randy Miller	98
136	Deuane Hoffman	98
109	John Fedak	98
105	Barbara Haas	93
102	Steve Santner	95

BUCKS

270	Steve Farbotnik	98
258	Devich Farbotnik	98
250	William Murphy	99
227	Jason Horn	95
215	Harry Franzen	96
202	Stan Glowacki	91
214	Deuane Hoffman	99
172	Bernard Morris	98
157	Kevin Crilley	98
131	John Fedak	98
128	Barbara Haas	96
121	Steve Santner	95
111	Al Guarente	99
111	Thomas Mason	99

BUTLER

267	Gene Wilhelm	92
250	David Freeland	85
198	Dick Byers	98
189	Deuane Hoffman	99
176	Bob Machesney	99
166	Ed Kwater	96
165	George Malosh	89
148	John Fedak	99
147	Randi Gerrish	99
136	Sarah Gerrish	99
130	Sam Sinderson	99
129	Margaret Higbee	93
122	Geoff Malosh	91
119	Roger Higbee	93
119	Greg Malosh	91
100	Steve Santner	95

CAMBRIA

218	John Salvetti	99
161	Gloria Lamer	92
131	John Fedak	98
126	Deuane Hoffman	98
103	Steve Santner	95

CAMERON

140	Deuane Hoffman	98
113	John Fedak	98
105	Steve Santner	95
69	Paul Schwalbe	98

CARBON

245	Rick Wiltraut	98
230	David Hawk	99
217	Jason Horn	95
206	Bernard Morris	98
205	Deuane Hoffman	99
201	Robert Frantz	99
115	Steve Santner	95
103	John Fedak	98
100	Al Guarente	99

CENTRE

272	Merrill Wood	91
263	Harry Henderson	91
255	Eugene Zielinski	98
245	Rick Wiltraut	98
244	Terence Schiefer	98
218	Scott Bills	92
221	Deuane Hoffman	99
189	Greg Grove	99
184	Paul Schwalbe	98
169	John Fedak	99
162	Russ Ruffing	91
145	Steve Santner	95
145	Kevin Crilley	98
127	Barbara Haas	99
119	Deborah Grove	99

111	Randy Miller	98
101	Jonathan Heller	98

CHESTER

268	Larry Lewis	88
252	Barbara Haas	96
252	Phillips Street	96
246	John Ginaven	98
231	Joe Meloney	94
227	Deuane Hoffman	99
215	Al Guarente	99
205	Jason Horn	95
193	Neal Thorpe	95
178	Martin Page	99
167	Steve Santner	95
164	Theodore Drozdowski	99
148	Thomas Reeves	98
125	Jonathan Heller	98
120	Randy Miller	98
111	Terence Schiefer	98
109	Bruce Carl	98
108	John Fedak	98

CLARION

252	John Fedak	98
229	Walter Fye	97
209	Deuane Hoffman	98
200	Margaret Buckwalter	96
181	Gene Wilhelm	92
163	Bill Reddinger	99
150	Fred Crowley	95
132	Mark McConaughy	99
104	Steve Santner	95

CLEARFIELD

165	Deuane Hoffman	98
157	John Fedak	98
138	Eugene Zielinski	98
114	Paul Schwalbe	98
100	Steve Santner	95

CLINTON

246	Paul Schwalbe	98
173	Wayne Laubscher	99
166	Deuane Hoffman	99
126	John Fedak	98
120	Steve Santner	98
101	Barbara Haas	94

COLUMBIA

171	Deuane Hoffman	99
116	John Fedak	99
115	Richard Koval	99
100	Steve Santner	95
65	Randy Miller	98

CRAWFORD

242	Deuane Hoffman	98
223	Margaret Higbee	99
215	John Fedak	99
208	Roger Higbee	99
207	Sam Sinderson	99
205	Ronald Leberman	96
201	Gene Wilhelm	92
197	Marvin Byler	99
164	Ed Kwater	96
152	Geoff Malosh	91
150	Greg Malosh	91
141	Randi Garrish	99
141	Sarah Garrish	99
124	George Malosh	89
123	James Flynn	97
117	Randy Miller	98
112	Steve Santner	95
107	Jonathan Heller	98
102	Terence Schiefer	98
100	Bill Reddinger	99

CUMBERLAND

269	Deuane Hoffman	99
259	Don Henise	97
257	Robyn Henise	97
247	Richard Colyer	99
208	Carl Garner	98
197	Steve Santner	95
176	George Wertz, Jr.	86
169	Mark McConaughy	98
164	Kenneth Gabler	99
154	John Fedak	98
120	Jonathan Heller	98
111	Randy Miller	98

71	Bill Reddinger	99	FRANKLIN	240	Larry Lewis	88	156	Greg Grove	99		
			266	Carl Garner	98	223	Al Guarente	98	113	John Fedak	98
			265	Kenneth Gabler	99	214	Richard Colyer	99	108	Steve Santner	95
DAUPHIN			213	Jeffrey Walck	89	208	Ernest Schiefer	99	78	Deborah Grove	99
271	Deuane Hoffman	99	185	Deuane Hoffman	98	201	George Wertz, Jr.	86	59	Randy Miller	98
240	Scott Bills	99	141	Don Henise	97	198	Pamela Woodman	93			
238	Mark McConaughy	98	130	Steve Santner	95	192	Jim Mountjoy	99	MONROE		
235	Grace Randolph	96	114	John Fedak	98	185	Terence Schiefer	98	222	Phillips Street	96
234	George Wertz, Jr.	86				184	Don Henise	97	176	Jason Horn	95
219	Steve Santner	95	FULTON			172	Dennis Weaver	89	159	Deuane Hoffman	99
211	Richard Colyer	99	202	Kenneth Gabler	99	166	John Fedak	98	123	Bernard Morris	98
154	John Fedak	98	198	Carl Garner	98	160	Kevin Crilley	98	110	Steve Santner	95
151	Don Henise	97	194	Daniel Snell	97	152	Matt Wlasniewski	99	105	John Fedak	98
132	Randy Miller	99	160	Deuane Hoffman	98	143	Bernard Morris	97	82	Scott Bills	99
127	Merrill Wood	91	152	Jeffrey Walck	89	129	Kenneth Gabler	99	82	Al Guarente	99
127	William Reid	99	119	Steve Santner	95	128	Mark McConaughy	99			
118	Kenneth Gabler	99	118	Robert Walker	89	118	Margaret Higbee	93	MONTGOMERY		
113	Jonathan Heller	98	107	John Fedak	98	108	Roger Higbee	93	260	William Murphy	99
						61	Bill Reddinger	9	255	Kevin Crilley	98
									251	Jason Horn	95
DELAWARE			GREENE			LAWRENCE			241	Harry Franzen	96
289	John Miller	85	194	Ralph Bell	93	210	Gene Wilhelm	92	225	Bernard Morris	99
264	Al Guarente	99	147	Deuane Hoffman	99	137	Deuane Hoffman	98	223	Neal Thorpe	97
255	Barbara Haas	94	134	Roy Ickes	96	132	John Fedak	99	217	Deuane Hoffman	99
245	Skip Conant	99	109	Steve Santner	95	102	Steve Santner	95	148	John Fedak	98
244	Thomas Reeves	98	107	John Fedak	98				137	Steve Santner	95
226	Paul Schwalbe	98				LEBANON			132	Al Guarente	99
224	John Ginaven	99	HUNTINGDON			264	Randy Miller	99	129	Thomas Mason	99
209	Deuane Hoffman	99	231	Greg Grove	99	236	Steve Santner	95	107	Robert Walker	89
151	Jason Horn	95	229	David Kyler	96	230	Deuane Hoffman	99	100	Barbara Haas	96
130	Steve Santner	95	207	Deborah Grove	99	208	Stephen Mallanson	96			
116	Martin Page	99	181	Merrill Wood	91	200	Bruce Weaver	99	MONTOUR		
108	John Fedak	98	170	Deuane Hoffman	98	198	Jonathan Heller	98	212	Barbara Haas	96
			163	Lewis Grove	99	186	Bruce Carl	99	206	Allen Schweinsberg	98
ELK			162	John Salvetti	99	181	Jason Horn	95	189	Deuane Hoffman	99
183	Linda Christenson	97	155	Eugene Zielinski	98	152	George Wertz, Jr.	86	140	John Fedak	99
137	John Fedak	99	128	Lewis Grove	98	130	Don Henise	97	119	Steve Santner	95
128	Deuane Hoffman	99	111	Kenneth Gabler	99	122	Barbara Haas	96	104	Kevin Crilley	98
105	Steve Santner	95	106	John Fedak	98	105	John Fedak	99			
79	Ted Grisez	96	104	Steve Santner	95				NORTHAMPTON		
						LEHIGH			269	Rick Wiltraut	98
ERIE			INDIANA			265	Fritz Brock	98	262	Arlene Koch	99
310	Gerald McWilliams	99	264	Margaret Higbee	99	263	Bernard Morris	98	250	Dave DeReamus	99
291	Sam Stull	85	245	Roger Higbee	99	260	Rick Wiltraut	98	229	Steve Boyce	90
285	Deuane Hoffman	99	233	Gloria Lamer	92	259	Jason Horn	95	221	Bernard Morris	98
278	Joyce Hoffmann	98	220	Steve Graff	98	201	Deuane Hoffman	99	220	Brad Silfies	90
274	Ed Kwater	96	195	Anne Hedgpath	86	108	John Fedak	98	220	Dennis Miller	98
268	James Flynn	97	182	Deuane Hoffman	98	103	Steve Santner	95	217	Deuane Hoffman	99
253	Linda McWilliams	92	177	John Fedak	99	82	Al Guarente	99	203	Michael Schall	99
252	John Fedak	99	160	Randi Gerrish	99				201	Jason Horn	95
249	Barbara Haas	96	160	Sarah Gerrish	99	LUZERNE			193	Adam Miller	99
249	Margaret Higbee	99	130	Mark McConaughy	99	279	William Reid	99	106	Steve Santner	95
245	Mike Fialkovich	99	118	Steve Santner	95	253	Richard Koval	99	102	John Fedak	98
242	David Freeland	85	104	Bill Reddinger	99	216	Mark Blauer	85	100	Randy Miller	98
237	Roger Higbee	99				194	Deuane Hoffman	99			
236	George Malosh	89	JEFFERSON			176	John Fedak	99	NORTHUMBERLAND		
233	Gene Wilhelm	92	226	John Fedak	99	149	Kevin Crilley	98	209	Allen Schweinsberg	98
228	Sam Sinderson	99	172	Deuane Hoffman	98	115	Bernard Morris	98	204	Deuane Hoffman	99
218	Geoff Malosh	91	105	Bill Reddinger	99	104	Steve Santner	95	166	Barbara Haas	93
217	Greg Malosh	91	104	Steve Santner	95				138	John Fedak	99
210	Randy Miller	98	97	Margaret Higbee	93	LYCOMING			112	Steve Santner	95
208	Steve Santner	95	95	Scott Bills	92	230	Paul Schwalbe	98			
212	Richard Colyer	99				176	Deuane Hoffman	99	PERRY		
197	Terence Schiefer	98	JUNIATA			124	Steve Santner	95	239	Deuane Hoffman	99
194	Bob Machesney	99	227	Aden Troyer	98	119	John Fedak	99	137	Richard Colyer	99
182	Jonathan Heller	98	215	Deuane Hoffman	99	69	Dick Byers	98	156	Don Henise	97
178	Bernard Morris	98	109	Jonathan Heller	98				141	Walter Shelly, Jr.	92
177	Randi Gerrish	97	108	Steve Santner	95	MCKEAN			139	Dallas Dowhower	92
177	Sarah Gerrish	97	106	John Fedak	98	142	John Fedak	99	126	John Fedak	98
174	Don Henise	97				138	Deuane Hoffman	98	120	Randy Miller	98
170	Dave Rieger	99	LACKAWANNA			107	Steve Graff	98	112	Mark McConaughy	98
166	Ronald Leberman	96	182	Glenn Czulada	96	103	Ted Grisez	96	110	Jonathan Heller	98
146	Kenneth Gabler	99	158	Deuane Hoffman	98	103	Steve Santner	95			
110	Bill Reddinger	99	137	Richard Koval	96	MERCER			PHILADELPHIA		
105	Steve Graff	98	118	William Reid	99	232	Harvey Troyer	99	290	John Miller	85
88	Al Guarente	99	112	John Fedak	98	232	Neil Troyer	99	245	Frank Windfelder	92
			103	Steve Santner	95	231	Jerry Troyer	99	243	Harry Franzen	96
FAYETTE						216	Eli Troyer	99	242	Al Guarente	98
152	Deuane Hoffman	98	LANCASTER			213	Deuane Hoffman	98	241	Barbara Haas	96
122	John Fedak	99	310	Randy Miller	99	211	Gene Wilhelm	92	227	Skip Conant	99
119	Steve Santner	95	308	Tom Garner	98	190	Neal Troyer	98	219	John Ginaven	98
119	Mark McConaughy	99	303	Robert Schutsky	99	181	John Fedak	98	208	Deuane Hoffman	99
117	Randi Gerrish	99	301	Jerry Book	99	124	Steve Santner	95	191	Thomas Reeves	98
111	Ed Kwater	96	296	Jonathan Heller	98	103	Margaret Higbee	93	184	Jim McKinney	92
111	Sarah Gerrish	99	297	Deuane Hoffman	99	102	Randi Garrish	99	167	Jason Horn	95
			292	Jan Witmer	97	90	Sarah Garrish	99	163	Stephen Lawrence	90
FOREST			291	Harold Morrin	96				154	Steve Santner	95
161	John Fedak	99	289	Barbara Haas	99	MIFFLIN			129	Thomas Mason	99
141	Ted Grisez	96	285	Bruce Carl	99	194	Deuane Hoffman	99	120	Terence Schiefer	98
140	Deuane Hoffman	99	274	Steve Santner	95				113	John Fedak	98
108	Steve Santner	95	251	Jason Horn	95						
64	Randy Miller	98									

107	Kevin Crilley	98
101	Randy Miller	98
80	Martin Page	99
PIKE		
201	Joe Strasser	94
201	Voni Strasser	94
153	Deuane Hoffman	99
144	Phillips Street	96
127	John Fedak	98
101	Steve Santner	95
100	Barbara Haas	93
POTTER		
218	David Hauber	99
139	Deuane Hoffman	98
107	John Fedak	98
104	Paul Schwalbe	98
104	Steve Santner	95
78	Sam Sinderson	99
SCHUYLKILL		
252	Tom Clauser	99
203	Deuane Hoffman	99
194	Mike Ward	99
177	Jason Horn	95
143	Bernard Morris	98
133	Steve Santner	95
117	Barbara Haas	96
113	John Fedak	98
103	Bruce Carl	98
103	Al Guarente	99
102	Randy Miller	99
SNYDER		
205	Deuane Hoffman	99
187	Allen Schweinsberg	98
132	Steve Santner	95
108	John Fedak	98
64	Merrill Wood	91
SOMERSET		
238	Scott Bastian	99
236	Jeff Payne	99
234	Retta Payne	99
177	Richard Murphy	98
159	Deuane Hoffman	98
138	John Fedak	99
126	Steve Santner	95
108	Randi Gerrish	99
107	Sarah Gerrish	99
64	Bill Reddinger	99
SULLIVAN		
170	Nick Kerlin	99
158	Skip Conant	99
131	Deuane Hoffman	98
129	Thomas Reeves	98
108	John Fedak	98
105	Randy Miller	98
104	Steve Santner	95
89	Al Guarente	99
SUSQUEHANNA		
182	Jerry Skinner	99
177	William Reid	99
144	Deuane Hoffman	98
105	Steve Santner	95
103	John Fedak	98
93	Barbara Haas	94
TIOGA		
223	Larry Brown	98
215	Arlene Brown	98
174	Deuane Hoffman	98
164	Benjamin Israel	99
153	Bruce Carl	96
146	John Fedak	99
120	Steve Santner	95
49	Matt Wlasniewski	99
UNION		
219	Allen Schweinsberg	98
160	Deuane Hoffman	99
132	Barbara Haas	96
117	Steve Santner	95
109	John Fedak	98
VENANGO		
228	Gary Edwards	95
182	John Fedak	99

175	Gene Wilhelm	92
164	Deuane Hoffman	98
153	Nick Kerlin	97
103	Steve Santner	95
50	Bill Reddinger	99
WARREN		
227	Ted Grisez	96
227	Harris Johnson	86
138	Deuane Hoffman	98
136	John Fedak	99
114	Steve Santner	95
WASHINGTON		
210	Margaret Higbee	93
209	Roger Higbee	93
197	Roy Ickes	96
161	Russ Ruffing	91
141	George Malosh	89
142	Deuane Hoffman	99
106	John Fedak	98
100	Steve Santner	95
WAYNE		
221	Joe Strasser	94
221	Voni Strasser	94
162	Deuane Hoffman	98
129	John Fedak	98
126	William Reid	99
102	Steve Santner	95
WESTMORELAND		
216	Dick Byers	99
208	Linda Christenson	96
197	Mark McConaughy	99
188	Randi Gerrish	99
187	Sarah Gerrish	99
154	Deuane Hoffman	98
142	Margaret Higbee	93
137	Steve Santner	95
133	Roger Higbee	93
130	John Fedak	99
129	Richard Murphy	99
120	James Flynn	97
WYOMING		
248	William Reid	99
176	Richard Koval	99
147	Deuane Hoffman	98
142	Skip Conant	98
111	Steve Santner	95
101	John Fedak	98
74	Al Guarente	99
YORK		
253	Deuane Hoffman	99
229	Russell Ryan	93
194	Steve Santner	95
185	Ann Pettigrew	96
172	George Wertz, Jr.	86
166	Jeff Pheasant	95
166	Carl Garner	99
160	Jason Horn	95
156	Jonathan Heller	98
153	Candy Krenzer	99
152	Kenneth Gabler	99
150	Randy Miller	98
138	Don Henise	97
111	Barbara Haas	96
109	John Fedak	98
County Annual Lists By County		
ADAMS		
201	Arthur Kennell	1992
140	Carl Garner	1991
137	Carl Garner	1998
126	Carl Garner	1999
105	Deuane Hoffman	1998
85	Kenneth Gabler	1999
87	Kenneth Gabler	1998
ALLEGHENY		
167	Scott Kinzey	1998
164	Scott Kinzey	1999
163	Bob Machesney	1996
159	Bob Machesney	1997
127	Deuane Hoffman	1998
110	Sam Sinderson	1999
ARMSTRONG		

201	John Fedak	1997
177	Scott Bastian	1996
152	Margaret Higbee	1993
133	Bill Reddinger	1998
116	Bill Reddinger	1999
113	Mark McConaughy	1998
112	Deuane Hoffman	1998
110	Steve Graff	1998
BEAVER		
186	Bill Hintze	1999
124	John Cruzan	1994
117	Deuane Hoffman	1999
110	George Malosh	1974
105	George Malosh	1975
97	Deuane Hoffman	1998
BEDFORD		
223	Sally Dick	1997
221	Tom Dick	1997
155	Deuane Hoffman	1998
BERKS		
252	Ken Lebo	1995
240	Ken Lebo	1999
236	Ken Lebo	1997
229	Ken Lebo	1996
219	Ken Lebo	1998
215	Matt Wlasniewski	1999
210	Matt Wlasniewski	1998
187	Deuane Hoffman	1998
152	Ernest Schiefer	1999
149	Ernest Schiefer	1998
BLAIR		
143	Beryl Sternagle	1995
126	Beryl Sternagle	1990
121	Beryl Sternagle	1989
79	Deuane Hoffman	1998
BRADFORD		
147	Ronald Young	1993
146	Ronald Young	1992
141	William Reid	1999
102	Deuane Hoffman	1996
72	Deuane Hoffman	1998
BUCKS		
224	Steve Farbotnik	1992
217	Steve Farbotnik	1994
210	Devich Farbotnik	1992
166	Deuane Hoffman	1998
BUTLER		
245	Gene Wilhelm	1983
229	Gene Wilhelm	1985
225	Gene Wilhelm	1982
122	Deuane Hoffman	1998
CAMBRIA		
177	John Salvetti	1992
175	John Salvetti	1997
174	John Salvetti	1995
171	John Salvetti	1999
165	John Salvetti	1998
71	Deuane Hoffman	1998
CAMERON		
119	Deuane Hoffman	1998
92	Deuane Hoffman	1996
90	John Fedak	1997
CARBON		
182	David Hawk	1999
162	David Hawk	1996
155	David Hawk	1998
152	Robert Frantz	1999
145	Robert Frantz	1995
145	Robert Frantz	1998
131	Deuane Hoffman	1998
CENTRE		
224	Terence Schiefer	1985
214	Terence Schiefer	1986
211	Terence Schiefer	1984
170	Deuane Hoffman	1998
CHESTER		
225	Larry Lewis	1988
221	Larry Lewis	1983
219	Larry Lewis	1986

145	Theodore Drozdowski	1999
135	Martin Page	1999
127	Deuane Hoffman	1998
126	Theodore Drozdowski	1998
92	Martin Page	1998
CLARION		
231	John Fedak	1998
219	John Fedak	1996
213	John Fedak	1997
208	John Fedak	1999
152	Deuane Hoffman	1998
119	Mark McConaughy	1999
115	Bill Reddinger	1999
85	Bill Reddinger	1998
CLEARFIELD		
155	John Fedak	1997
102	Deuane Hoffman	1997
92	Deuane Hoffman	1996
88	Deuane Hoffman	1998
CLINTON		
115	Deuane Hoffman	1999
95	John Fedak	1997
92	Deuane Hoffman	1997
81	Deuane Hoffman	1996
81	Deuane Hoffman	1998
COLUMBIA		
117	Deuane Hoffman	1997
112	John Fedak	1997
111	Deuane Hoffman	1998
CRAWFORD		
208	Ronald Leberman	1994
202	Ronald Leberman	1989
201	Gene Wilhelm	1992
182	Marvin Byler	1999
174	Deuane Hoffman	1998
CUMBERLAND		
227	Deuane Hoffman	1989
226	Deuane Hoffman	1998
225	Deuane Hoffman	1992
219	Deuane Hoffman	1 9 9 9
138	Carl Garner	1998
99	Carl Garner	1999
77	Kenneth Gabler	1998
73	Kenneth Gabler	1999
DAUPHIN		
234	Deuane Hoffman	1997
231	Deuane Hoffman	1998
229	Deuane Hoffman	1996
224	Deuane Hoffman	1999
210	Grace Randolph	1998
DELAWARE		
241	John Miller	1969
211	Al Guarente	1996
209	Al Guarente	1998
184	Al Guarente	1999
175	Skip Conant	1998
167	Skip Conant	1999
92	Deuane Hoffman	1998
60	Martin Page	1999
ELK		
116	John Fedak	1997
113	Deuane Hoffman	1996
78	Deuane Hoffman	1998
ERIE		
264	Sam Stull	1979
256	Gerald McWilliams	1992
252	Gerald McWilliams	1991
238	Gerald McWilliams	1999
218	Deuane Hoffman	1998
215	Gerald McWilliams	1998
212	Deuane Hoffman	1999
105	Steve Graff	1998
97	Sam Sinderson	1999
FAYETTE		
112	Mark McConaughy	1998
103	Deuane Hoffman	1998
77	John Fedak	1997
FOREST		

144 April Walters	1993	LEHIGH	200 Bernard Morris	1984	75 Deuane Hoffman	1997	196 William Reid	1999
143 Richard Walters	1993		132 Deuane Hoffman	1998	POTTER		193 William Reid	1993
132 John Fedak	1997		119 Deuane Hoffman	1997	160 David Hauber	1992	181 William Reid	1994
81 Deuane Hoffman	1998				160 David Hauber	1995	134 Richard Koval	1994
FRANKLIN		LUZERNE			160 David Hauber	1999	122 Richard Koval	1999
215 Dale Gearhart	1999	220 Richard Koval	1996		157 David Hauber	1993	102 Skip Conant	1998
185 Carl Garner	1997	219 Richard Koval	1995		98 Deuane Hoffman	1998	95 Skip Conant	1999
180 Carl Garner	1993	206 Richard Koval	1994		SCHUYLKILL		92 Deuane Hoffman	1998
180 Carl Garner	1994	153 William Reid	1999		212 Tom Clauser	1999	YORK	
178 Carl Garner	1999	121 Deuane Hoffman	1998		209 Tom Clauser	1996	219 Bruce Fortman	1999
174 Carl Garner	1998				208 Tom Clauser	1997	214 Deuane Hoffman	1999
156 Kenneth Gabler	1999	LYCOMING			191 Tom Clauser	1987	196 Russell Ryan	1992
149 Kenneth Gabler	1998	120 Deuane Hoffman	1999		158 Deuane Hoffman	1998	191 Randy Phillips	1999
123 Deuane Hoffman	1998	112 Deuane Hoffman	1997		SNYDER		182 Deuane Hoffman	1998
FULTON		103 Deuane Hoffman	1998		177 Deuane Hoffman	1998	178 Russell Ryan	1991
173 Daniel Snell	1997	90 John Fedak	1997		175 Deuane Hoffman	1996	153 Candy Krenzer	1999
128 Deuane Hoffman	1996	MCKEAN			172 Deuane Hoffman	1997	110 Carl Garner	1999
115 Kenneth Gabler	1988	119 Deuane Hoffman	1996		SOMERSET		98 Kenneth Gabler	1999
112 Deuane Hoffman	1998	92 Deuane Hoffman	1997		222 Scott Bastian	1999	86 Carl Garner	1998
97 Kenneth Gabler	1999	87 Deuane Hoffman	1998		216 Jeff Payne	1996	84 Kenneth Gabler	1998
75 Kenneth Gabler	1998	86 Steve Graff	1998		216 Retta Payne	1996		
GREENE		MERCER			208 Scott Bastian	1994		
137 Ralph Bell	1985	213 Harvey Troyer	1999		82 Deuane Hoffman	1998		
134 Ralph Bell	1986	212 Jerry Troyer	1999		SULLIVAN			
130 Ralph Bell	1990	211 Gene Wilhelm	1992		140 Nick Kerlin	1999		
107 Deuane Hoffman	1998	210 Neil Troyer	1999		130 Nick Kerlin	1995		
HUNTINGDON		192 Neil Troyer	1997		125 Skip Conant	1995		
205 David Kyler	1996	192 Eli Troyer	1999		124 Nick Kerlin	1997		
194 Greg Grove	1994	186 Neil Troyer	1998		123 Skip Conant	1999		
191 Greg Grove	1992	155 Deuane Hoffman	1998		118 Skip Conant	1998		
180 Greg Grove	1998	MIFFLIN			113 Nick Kerlin	1998		
137 Deuane Hoffman	1998	160 Deuane Hoffman	1998		89 Deuane Hoffman	1998		
72 Kenneth Gabler	1999	126 Deuane Hoffman	1997		SUSQUEHANNA			
INDIANA		113 Deuane Hoffman	1996		145 Jerry Skinner	1999		
206 Margaret Higbee	1993	MONROE			109 Deuane Hoffman	1997		
203 Margaret Higbee	1991	103 Deuane Hoffman	1999		107 William Reid	1999		
195 Steve Graff	1998	101 Deuane Hoffman	1998		105 Deuane Hoffman	1996		
131 Deuane Hoffman	1998	88 Deuane Hoffman	1996		103 John Fedak	1997		
114 Mark McConaughy	1998	82 Deuane Hoffman	1997		103 Deuane Hoffman	1998		
100 Mark McConaughy	1999	MONTGOMERY			TIOGA			
JEFFERSON		151 Deuane Hoffman	1999		174 Larry Brown	1998		
198 John Fedak	1997	140 Deuane Hoffman	1998		167 Larry Brown	1992		
143 Deuane Hoffman	1996	132 Deuane Hoffman	1997		163 Benjamin Israel	1999		
121 Deuane Hoffman	1998	126 John Fedak	1997		160 Arlene Brown	1992		
JUNIATA		MONTOUR			142 Arlene Brown	1998		
188 Aden Troyer	1996	126 John Fedak	1997		122 Deuane Hoffman	1998		
176 Aden Troyer	1997	115 Deuane Hoffman	1997		UNION			
170 Deuane Hoffman	1996	112 Deuane Hoffman	1998		121 Deuane Hoffman	1999		
167 Deuane Hoffman	1998	NORTHAMPTON			102 Deuane Hoffman	1998		
158 Aden Troyer	1998	189 Dave DeReamus	1990		88 John Fedak	1997		
LACKAWANNA		186 Adam Miller	1999		87 Deuane Hoffman	1997		
182 Glenn Czulada	1996	174 Michael Schall	1999		VENANGO			
161 Glenn Czulada	1995	168 Dave DeReamus	1991		207 Gary Edwards	1995		
117 Richard Koval	1995	159 Dennis Miller	1996		194 Gary Edwards	1991		
103 Deuane Hoffman	1998	159 Michael Schall	1997		192 Russ States	1991		
91 William Reid	1999	146 Dave DeReamus	1999		113 Deuane Hoffman	1998		
LANCASTER		133 Deuane Hoffman	1998		WARREN			
255 Robert Schutsky	1992	NORTHUMBERLAND			165 Ted Grisez	1992		
249 Jonathan Heller	1992	157 Deuane Hoffman	1999		152 Ted Grisez	1985		
239 Jonathan Heller	1993	147 Deuane Hoffman	1998		117 John Fedak	1997		
235 Deuane Hoffman	1998	144 Deuane Hoffman	1997		82 Deuane Hoffman	1998		
230 Deuane Hoffman	1999	128 John Fedak	1997		64 Steve Graff	1998		
214 Bruce Carl	1999	PERRY			WASHINGTON			
186 Jim Mountjoy	1999	202 Richard Colyer	1997		134 Russ Ruffing	1985		
185 Bruce Carl	1998	199 Deuane Hoffman	1995		132 Roy Ickes	1984		
185 Randy Miller	1999	193 Deuane Hoffman	1996		100 George Malosh	1975		
177 Randy Miller	1998	188 Deuane Hoffman	1998		95 Deuane Hoffman	1998		
84 Kenneth Gabler	1999	179 Deuane Hoffman	1999		WAYNE			
LAWRENCE		PHILADELPHIA			127 Deuane Hoffman	1997		
210 Gene Wilhelm	1992	225 John Miller	1965		121 John Fedak	1997		
118 John Fedak	1997	208 Edward Fingerhood	1996		112 Deuane Hoffman	1998		
110 Deuane Hoffman	1996	162 Al Guarente	1992		WESTMORELAND			
97 Deuane Hoffman	1998	135 Skip Conant	1999		190 Mark McConaughy	1999		
LEBANON		133 Skip Conant	1998		163 Mark McConaughy	1998		
222 Randy Miller	1999	127 Deuane Hoffman	1998		97 Deuane Hoffman	1998		
215 Randy Miller	1993	PIKE			92 Deuane Hoffman	1996		
205 Randy Miller	1996	112 Deuane Hoffman	1999		WYOMING			
204 Randy Miller	1998	92 Deuane Hoffman	1998					
179 Deuane Hoffman	1998	75 John Fedak	1997					
171 Bruce Weaver	1999							

County Life Lists (top 50)

1	310	Erie	Gerald McWilliams	99
1	310	Lancaster	Randy Miller	99
1	310	Lancaster	Eric Witmer	99
4	308	Lancaster	Tom Garner	99
5	303	Lancaster	Robert Schutsky	99
6	301	Lancaster	Jerry Book	99
7	297	Lancaster	Deuane Hoffman	99
8	296	Lancaster	Jonathan Heller	98
9	292	Berks	Ken Lebo	99
9	292	Lancaster	Jan Witmer	97
11	291	Lancaster	Harold Morrin	96
11	291	Erie	Sam Stull	85
13	290	Philadelphia	John Miller	85
14	289	Delaware	John Miller	85
14	289	Lancaster	Barbara Haas	99
16	285	Erie	Deuane Hoffman	99
16	285	Lancaster	Bruce Carl	99
18	284	Berks	Harold Lebo	99
19	279	Luzerne	William Reid	99
20	278	Erie	Joyce Hoffmann	98
21	275	Berks	Kerry Grim	98
22	274	Erie	Ed Kwater	96
22	274	Lancaster	Steve Santner	95
24	272	Berks	Matt Wlasniewski	99
24	272	Centre	Merrill Wood	91
26	271	Dauphin	Deuane Hoffman	99
27	270	Berks	Deuane Hoffman	99
27	270	Bucks	Steve Farbotnik	98
29	269	Cumberland	Deuane Hoffman	99
29	269	Northampton	Rick Wiltraut	98
31	268	Erie	James Flynn	97
31	268	Chester	Larry Lewis	88
33	267	Butler	Gene Wilhelm	92
34	266	Franklin	Carl Garner	98
35	265	Lehigh	Fritz Brock	98
35	265	Franklin	Kenneth Gabler	99
37	264	Delaware	Al Guarente	99
37	264	Lebanon	Randy Miller	99
39	263	Centre	Harry Henderson	91
39	263	Lehigh	Bernard Morris	98
41	262	Berks	Jason Horn	95
42	260	Lehigh	Rick Wiltraut	98
42	260	Montgomery	William Murphy	99
44	259	Cumberland	Don Henise	97
44	259	Lehigh	Jason Horn	95
46	258	Bucks	Devich Farbotnik	98
47	257	Cumberland	Robyn Henise	97
48	255	Centre	Eugene Zielinski	98
48	255	Montgomery	Kevin Crilley	98
48	255	Delaware	Barbara Haas	94

County Annual Lists (top 50)

1	264	Erie	Sam Stull	1979
2	256	Erie	Gerald McWilliams	1992
3	255	Lancaster	Robert Schutsky	1992
4	252	Berks	Ken Lebo	1995
4	252	Erie	Gerald McWilliams	1991
6	251	Erie	Gerald McWilliams	1983
6	251	Erie	Gerald McWilliams	1988
8	249	Lancaster	Jonathan Heller	1992
9	248	Erie	Gerald McWilliams	1989
10	246	Erie	Gerald McWilliams	1993
11	245	Butler	Gene Wilhelm	1983
12	244	Erie	Gerald McWilliams	1985
13	243	Erie	Gerald McWilliams	1979
13	243	Erie	Gerald McWilliams	1981
15	242	Erie	Gerald McWilliams	1984
16	241	Delaware	John Miller	1969
17	240	Berks	Ken Lebo	1999
17	240	Erie	Gerald McWilliams	1997
19	239	Erie	Gerald McWilliams	1994
19	239	Lancaster	Jonathan Heller	1993
21	238	Erie	Gerald McWilliams	1990
21	238	Erie	Gerald McWilliams	1999
23	237	Erie	Gerald McWilliams	1995
24	236	Berks	Ken Lebo	1997
24	236	Lancaster	Randy Miller	1991
26	235	Lancaster	Deuane Hoffman	1998
27	234	Dauphin	Deuane Hoffman	1997
27	234	Erie	Gerald McWilliams	1980
27	234	Erie	Gerald McWilliams	1982
27	234	Erie	Gerald McWilliams	1987
27	234	Erie	Ed Kwater	1989
27	234	Lancaster	Jonathan Heller	1991
27	234	Lancaster	Randy Miller	1992
34	233	Erie	James Flynn	1979
35	232	Erie	Ed Kwater	1992
36	231	Clarion	John Fedak	1998
36	231	Dauphin	Deuane Hoffman	1998
36	231	Erie	Deuane Hoffman	1996
39	230	Erie	Gerald McWilliams	1986
39	230	Erie	Deuane Hoffman	1991
39	230	Lancaster	Deuane Hoffman	1999
42	229	Berks	Ken Lebo	1996
42	229	Butler	Gene Wilhelm	1985
42	229	Dauphin	Deuane Hoffman	1996
45	228	Erie	James Flynn	1978
46	227	Cumberland	Deuane Hoffman	1989
46	227	Erie	Ed Kwater	1991
46	227	Lancaster	Deuane Hoffman	1997
49	226	Berks	Ken Lebo	1994
49	226	Cumberland	Deuane Hoffman	1998
49	226	Lancaster	Jonathan Heller	1994

Summary of the Season - January through March 2000

The usual fall movement of Siskins and other northern finches led some observers to predict another "invasion" year. Well, they were right, but they had the wrong species. **Northern Shrikes** flooded the state, except in the southwest (see Paul Hess' excellent article in this issue). The only other wintering oddities were from the south and west — Baltimore and Bullock's Orioles and Spotted Towhee.

Great Cormorants continue to increase in numbers as a wintering bird on the Delaware River from *Delaware* to *Bucks*.

There was an unusual number of **American Bittern** reports (4) with 2 in January (*Delaware/Philadelphia*) (may have been the same bird), one in February (*Juniata*), and one in March (*Clinton*).

Snowy Egret (*Philadelphia*) and **Green Heron** (*Tioga*) made early appearances in March.

Ross' Geese continue to be "expected" species in the southeastern counties in winter, and are starting to show up more regularly in the western counties as well.

The **Tufted Duck** in *Lackawanna* was the second report from the northeastern part of the state. The previous record was from *Luzerne*.

The fallout of **Barrow's Goldeneyes** on the Delaware River in *Northampton* was amazing! At least 4 different birds were recorded (three were together and a separate male had different markings than the one with the females).

The **Pomarine Jaeger** in *Erie* was later than any previous record.

The **Little Gull** found with a flock of **Bonaparte's** in *Lancaster* was feeding over farmers' field and not near any body of water. This may be the first such record for the

state away from a river or lake.

A **Black-tailed Gull** in *Berks* generated a lot of excitement, but could not be found after the initial sighting. Photos and documentation will be evaluated by PORC.

Two other gull reports pending review are a **Yellow-legged Gull** and a **Slaty-backed Gull** from *Bucks*. Unfortunately neither of these sightings were photographed. Needless to say, if accepted, these three species would be first state records.

Another teaser for the quarter was a report of a **Northern Hawk-owl** on Interstate 80 in *Centre*. However, the bird could not be relocated.

The 2 **Chimney Swifts** reported on 3/7 from *Centre* were three weeks earlier than the previous early date of 3/30. Were they really "Chimney" swifts or another swift species?

Unlike the Northern Shrike population, the **Loggerhead Shrike** numbers continue to be small. The only reports were a lone bird in *Crawford* and the residents in *Adams*.

House Wren (*Juniata*) and **Marsh Wren** (*Philadelphia*) were both found in January.

A **Townsend's Solitaire** was found in *Westmoreland*. This species is becoming a regular species in this state, although the sightings have been scattered and brief. The exception in location is the Kittatinny Ridge (Hawk Mountain, etc), which has had 4 of the records. The records reported since 1986 are as follows:

Townsend's Solitaire Records

County	Date
Lehigh/Carbon*	1/18/1986
Berks/Schuylkill (HMS)*	10/15/1989
Bucks	3/22-23/1993
Butler	12/18/1993
Schuylkill*	10/10/1995
Clarion	11/24/1998
Berks/Schuylkill (HMS)*	11/13/1999
Westmoreland	1/15/2000

HMS = Hawk Mountain Sanctuary

* Kittatinny Ridge

There were three reports of winter **Orange-crowned Warblers** and **10 Palm Warblers** and a **Prairie Warbler** were found on the winter census in *Philadelphia*.

The **Spotted Towhee** in *Westmoreland* found last quarter remained into March and another one was seen briefly in *Wexford* at the same location that hosted a **Black-headed Grosbeak** a few years ago!

At least five **Baltimore Orioles** spent the winter in the state and one **Bullock's** was well documented in *Lancaster* (see Rare Bird Reports for details).

Winter finch reports were scattered and few, although two **Hoary Redpolls** were reported (*Erie* and *Mercer*).

There were **194** species reported this quarter, substantially higher than last year's 179, and above the 10-year average of 179. We received partial or complete reports from **59** counties.

Thanks again to our hard-working county compilers! ♣

Frank & Barb Haas

Birds of Note - January through March 2000

(Species not expected or reported in fewer than five counties this period)

Rare and unusual sightings for which details have been submitted will be reviewed by the Pennsylvania Ornithological Records Committee. "No desc" means no **description of the bird** was submitted.

Birds in *Italics* are uncommon, but occur most years. Birds Underlined occur at least 4 to 7 out of 10 years. *Italic/Underlined* occur fewer than 4 out of 10 years.

Red-throated Loon - *Butler*: 1 on 3/11 at Moraine State Park (Debra Yovanovich, Dave Darney); *Centre*: 1 on 3/11 at Colyer Lake (Paul Rodewald); *Erie*: 1 on 1/1 at Presque Isle State Park (Jerry McWilliams); *Wyoming*: 3 on 3/13-15 at Lake Carey (Bill Reid, Stan Gallanty).

Red-necked Grebe - *Berks*: 1 on 3/14 at Blue Marsh Lake (Katrina Knight); *Tioga*: 3 on 3/12 at Nessmuk Lake (Larry & Arlene Brown).

Great Cormorant - *Bucks*: Present from 1/22-2/28 at Bensalem and on the Delaware River (m. obs.); *Philadelphia*: Present all quarter with a high of 40 on 1/8 on the Delaware River (m.obs.)

American Bittern - *Clinton*: 1 on 3/23-27 at Mill Hall (Steve Bason, Wayne Laubscher); *Delaware*: 1 on 1/2-19 at Darby Creek (John Damico, Doris McGovern, John Miller); *Juniata*: 1 on 2/28 at Oakland Mills (Paul Weaver); *Philadelphia*: 1 on 1/9 at the Airport area (Jim McKinney)

Snowy Egret - *Philadelphia*: 1 on 3/27 at Roosevelt Park (Matt Sharp).

Green Heron - *Tioga*: 1 on 3/24 at Jobs Corners (Larry & Arlene Brown).

Black-crowned Night-Heron - *Cumberland*: First seen on 3/28 at West Fairview (Deuane Hoffman); *Delaware*: Present part of the quarter; *Philadelphia*: 2 on 1/8; *York*: First seen on 3/16.

Yellow-crowned Night-Heron - *York*: First seen on 3/27 at Kiwanus Lake (Robert Erb).

Greater White-fronted Goose - *Bucks*: 1 on 1/19 at Nockamixon State Park (Jason Horn) and 1 on 3/11 at Peace Valley Park; *Montgomery*: 1 on 2/24 at Green Lane Reservoir (August & Judy Mirabella); *Northampton*: 1 on 2/22-26 at Martins Creek and 2/24 at Nazareth were the 2nd and 3rd county records.

Ross' Goose - *Berks*: 1 on 3/5-6 at Lake Ontelaunee (Matt Wlasniewski); *Bucks/Montgomery*: 1 on 2/5 at Route 663 (Devich Farbotnik); *Indiana*: The bird reported last quarter near Saltsburg continued through the quarter; *Lancaster*: 1 to 3 birds at Middle Creek WMA from 2/26-3/26 (m. obs.); *Montgomery*: 1 on 1/24-2/12 at Hill Rd (Jason Horn, Clint & Debbie Miller); *Northampton*: 1 on 2/28 at Martins Creek was the 3rd county record and another(?) on 3/7 at Kesslerville Rd. (Rick Wiltraut); *Westmoreland*: The bird reported last quarter at Beaver Run Reservoir remained until 1/1 (Mark McConaughy).

Brant - *Berks/Schuylkill*: 30 on 1/1 at Hawk Mountain Sanctuary (Greg George, Keith Bildstein); *Chester*: 1 on 2/29 at Struble Lake (Grier Saunders, Larry

Lewis).

Barnacle Goose - *Chester*: 1 on 2/29 at Struble Lake (Grier Saunders, Larry Lewis)

Trumpeter Swan - *Butler*: the bird reported last quarter at Moraine State Park remained until 1/15 (Debra Yovanovich, Dave Darney); *Erie*: 5 on 1/9-17 at Presque Isle State Park.

Eurasian Wigeon - *Lebanon*: 1 on 3/12 at Memorial Lake State Park (Randy Miller).

"Common" Green-winged Teal - *Erie*: 1 on 3/25 at Presque Isle was a 1st county record (Ben Coulter).

Tufted Duck - *Lackawanna*: 1 on 3/5 at Ford's Pond (Bill Reid).

Surf Scoter - *Allegheny*: 1 on 1/31 at Harmar Twp. (Paul Hess, Scott Kinzey); *Berks*: 1 on 3/12 at Lake Ontelaunee (Rudy Keller, Matt Spence); *Butler*: 1 on 3/26 at Moraine State Park (Jim Valimont, et al); *Centre*: 1 on 3/30 at Bald Eagle State Park (Jeff Molenhauer); *Erie*: 1 on 1/1 at Presque Isle State Park (Jerry McWilliams) and 3/25 (Nathan Hall)

White-winged Scoter - *Blair*: 1 on 3/12 at Canoe Creek State Park (Beryl Sternagle); *Carbon*: 1 on 3/2 at Beltzville State Park (Dave Hawk, et al.); *Erie*: Present part of the quarter.; *Luzerne*: 3 on 1/3 at Harvey's Lake (Bill Reid); *Northampton*: 1 on 2/19-27 at Portland (Brian Hardiman, Rick Wiltraut); *Tioga*: 3 on 3/11 at Hammond Lake (Ben).

Barrow's Goldeneye - *Northampton*: 3 on 2/20-26 at Foul Rift on the Delaware River and another male on 2/26 at Portland were 1st county records (Rick Wiltraut, et al.).

Virginia Rail - *Chester*: 1 on 1/7 at White Clay Creek (Grier Saunders, Larry Lewis); *Tioga*: 1 on 3/9 at The Muck was early (Bob Ross).

Sandhill Crane - *Mercer*: 1 on 1/1, 2/29 and 3 on 3/8 at Skunk Run Rd (Marvin Troyer); *Northampton*: 1 was present throughout the quarter at Green Pond (m. obs.)

Pectoral Sandpiper - *Butler*: 1 on 3/10 at Moraine State Park was early (Debra Yovanovich, Dave Darney); *Cambria*: 2 on 3/31 at Prince Gallitzin State Park (Dave Gobert); *Fayette*: 1 on 3/18 at Mill Run Reservoir (Mark McConaughy); *Somerset*: 1 on 3/19 (Jeff & Lauretta Payne).

Pomarine Jaeger - *Erie*: 1 on 12/28-1/2 at Presque Isle (Jerry McWilliams).

Laughing Gull - *Berks*: 1 on 1/2 at Lake Ontelaunee (Katrina Knight, Peter Saenger); *Philadelphia*: Present from March through the quarter.

Little Gull - *Erie*: 1 on 1/8-3/5 at Presque Isle State Park (Jerry McWilliams); *Lancaster*: 1 on 3/28 with Bonaparte's Gulls coursing over farmers' fields in Caernarvon Twp may be the first record of this species in the state away from any body of water (Franklin Haas).

Black-tailed Gull - *Berks*: 1 on 1/2 at Lake Ontelaunee would be a first state record if accepted by PORC (Peter Saenger)

Yellow-legged Gull - *Bucks*: 1 on 2/12 at Tullytown would

- be a first state record if accepted by PORC (Devich Farbotnik).
- Thayer's Gull** - *Bucks*: 1 on 2/14 at Tullytown (Jason Horn); *Erie*: 1 on 3/30 at Presque Isle (Jerry McWilliams).
- Iceland Gull** - *Berks*: 1 on 1/7 at Lake Ontelaunee (Katrina Knight); *Bucks*: Present from 1/22 to 3/25 at Tullytown and Peace Valley Park (m. obs.); *Erie*: Present from 2/11 to 3/30 at Presque Isle State Park (Jerry McWilliams); *Montgomery*: 1 on 1/9 at Green Lane Reservoir (Kevin Crilley, et al.); *Philadelphia*: 1 on 1/8.
- Slaty-backed Gull** - *Bucks*: 1 on 2/28 at Tullytown would be a first state record if accepted by PORC (Devich Farbotnik).
- Glaucous Gull** - *Berks*: 1 on 1/15-16 at Lake Ontelaunee (m. obs.); *Bucks*: Present from 2/12 to 2/28 at Tullytown (m. obs.); *Erie*: Present up to 3/18 at Presque Isle State Park (Jerry McWilliams); *Northampton*: 1 on 2/29 at Martins Creek was a 2nd county record (Rick Wiltraut).
- Northern Hawk-owl** - *Centre*: An out-of-state birder driving on I-80 reported one on 1/16. It could not be relocated by other birders.
- Chimney Swift** - *Centre*: 2 on 3/7 at Stormstown were exceptionally early. Previous record was 3/30/80 in Pittsburgh (Don Bryant).
- Great Crested Flycatcher** - *Clarion*: 1 on 3/28 at Nineveh was very early (Mike Leahy); *Dauphin*: 1 on 3/30 at Hershey North was very early (Joan Renninger).
- Loggerhead Shrike** - *Adams*: Permanent Resident; *Crawford*: 1 on 3/11 at Pymatuning Lake (Ron Leberman).
- Blue-headed Vireo** - *Blair*: 1 on 3/11 at SGL 166 (Stan Kotala); *Cumberland*: First seen on 3/26 at Kings Gap State Park (Deuane Hoffman, Carolyn Blatchley); *Montgomery*: First seen on 3/11 at Upper Perkiomen Park (Paul & Anita Guris); *Perry*: First seen on 3/27 at Little Buffalo State Park (Deuane Hoffman)
- Bank Swallow** - *Franklin*: First seen on 3/27 at Greencastle Reservoir (Dale Gearhart).
- House Wren** - *Bucks*: 1 on 3/30 at Muhlenberg Twp was early (Carolyn Drasher); *Chester*: First seen on 3/15 at Longwood Gardens (Mike Harvell, Lisa Tull); *Crawford*: First seen 3/19 at Meadville (Isaac Field); *Juniata*: Present up to 1/27 at Rockland Ridge (Eli Wengerd)
- Marsh Wren** - *Philadelphia*: 1 on 1/9 at Tinicum (John Miller)
- Townsend's Solitaire** - *Westmoreland*: 1 on 1/15 at Hoffman Heights Rd near Slickville (Mark McConaughy).
- Orange-crowned Warbler** - *Delaware*: 1 on 1/3 at Darby Creek (Skip Conant); *Montgomery*: 1 on 1/25-3/2 at Green Lane Reservoir (Gary Freed, Tracy Myers); *Philadelphia*: 1 on 1/8.
- Prairie Warbler** - *Philadelphia*: 1 on 1/8 (Kate Sommerville).
- Palm Warbler** - *Berks*: 1 on 3/30 at Muhlenberg Twp was early (Carolyn Drasher); *Philadelphia*: 10 on 1/8 (m. obs.); *Schuylkill*: 2 on 3/27 at Sweet Arrow Lake (Tom Clauser).
- Black-and-white Warbler** - *Berks*: 1 on 3/27 at Lake Ontelaunee was early (Catherine Elwell, Sue Schmoyer)
- Louisiana Waterthrush** - *Allegheny*: First seen on 3/30 at Sewickley (Chris Knoll); *Butler*: First seen on 3/26 at Wold Creek Narrows (Debra Yovanovich, Dave Darney); *Lebanon*: First seen on 3/26 at Middle Creek WMA (Randy Miller); *Venango*: First seen on 3/26 at Buttermilk Hill Nature Sanctuary (Jerry Stanley).
- Common Yellowthroat** - *Philadelphia*: 2 on 1/8.
- Yellow-breasted Chat** - *Chester*: 1 on 1/7 at Penn Twp. (Grier Saunders, Larry Lewis).
- Spotted Towhee** - *Allegheny*: 1 on 3/4 at Wexford was seen only one day (Regis Schultz); *Westmoreland*: The bird reported last quarter in Export remained through late March.
- Clay-colored Sparrow** - *Northampton*: 1 through most of the quarter at Martins Creek (Brian Hardiman, Rick Wiltraut).
- Vesper Sparrow** - *Allegheny*: First seen on 3/18 at Imperial (Bill Hintze); *Mercer*: 1 on 3/26 at Zahnizer Rd. (Troyer family); *York*: First seen on 3/9.
- "Gambel's" White-crowned Sparrow** - *Indiana*: 1 present all quarter near Shelocta.(m. obs.); *Northampton*: 1 was throughout the quarter at Martins Creek.
- Dickcissel** - *Bucks*: 1 on 1/15-2/25 at Bedminster (August Mirabella); *Centre*: 1 on 1/18 through most of the quarter at State College (Dorothy Bordner, John Swinton).
- Western Meadowlark** - *Mercer*: 1 on 3/13 at Skunk Run Rd in Lake Twp. (Melvin Troyer).
- Baltimore Oriole** - *Chester*: 1 on 1/7 at Penn Twp. (Grier Saunders, Larry Lewis); *Clarion*: 1 on 1/24 through the period at Shippenville (m. obs.); *Erie*: 1 on 1/15 at Harbor Creek (Shirley Post); *Philadelphia*: 1 in January (Judy Stepanaskie); *York*: 1 on 1/2 at Hanover (Fred & Nina Clark).
- Bullock's Oriole** - *Lancaster*: 1 on 1/9 through the quarter at Mount Joy (Mike Gockley)
- Red Crossbill** - *Chester*: 3 on 1/7 at Embreeville County Park (Grier Saunders, Larry Lewis); *Delaware*: 2 on 2/10 at Tyler Arboretum (Al Guarente); *Lancaster*: 1 on 1/1 at Lititz (Randy Miller); *Wyoming*: Present up to 2/19 at South Eaton (Bill Reid).
- White-winged Crossbill** - *Adams*: 1 on 2/6 in Gettysburg (Jack & Nancy Locher); *Delaware*: 1 on 1/13 at Media (Doris McGovern); *Mifflin*: 1 on 3/23 at Granville (Darl Miller); *Venango*: 10 on 2/17 at Franklin (Jerry Stanley); *Warren*: 2 on 2/15 at Starbrick (John Schultz) and 4 on 3/13 near Russell (Becky Nelson).
- Hoary Redpoll** - *Erie*: 1 on 2/10 at Presque Isle (Jerry McWilliams); *Mercer*: 1 on 3/2-3 at Grove City (Randy Stringer)(no desc).

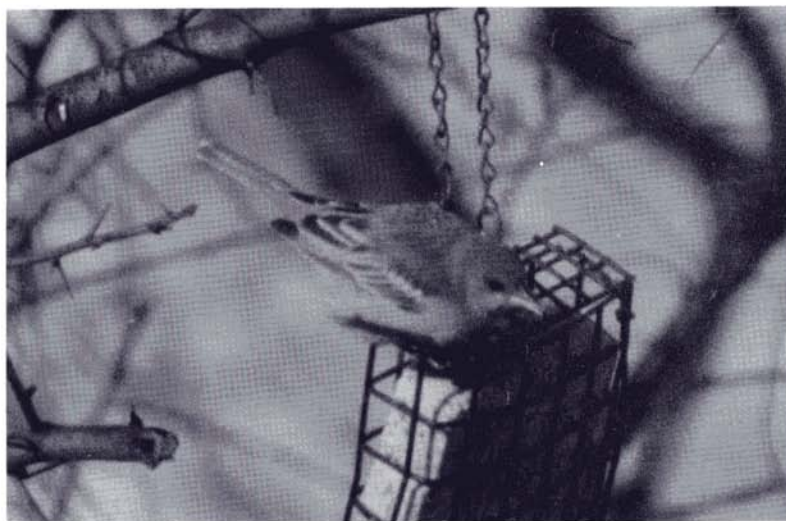
PHOTOGRAPHIC HIGHLIGHTS



Pine Warbler, Allentown, *Lehigh*, Jan 2000.
Photo by the Boyers.



Common Redpoll, Swissdale, *Clinton*, 3/9/2000.
Photo by Wayne Laubscher.



Bullock's Oriole, Mount Joy, *Lancaster*, January 2000. Photo by Mike Gockley



Long-eared Owl, Sugar Creek Twp., *Venango*, 2/23/2000. Photo by Gary Edwards.



Short-eared Owl, Exchange, *Montour*, 2/26/2000.
Photo by Wayne Laubscher.



Merlin, Schenley Park, *Allegheny*, 2/21/2000.
Photo by Mike Fialkovich.



Little Gull, Caernarvon Twp., *Lancaster*, 3/28/2000.
Photo by Franklin C. Haas.



Northern Shrike, Bald Eagle State Park, *Centre*, 1/17/2000.
Photo by Wayne Laubscher.



Barrow's Goldeneye, Fort Rift, *Northampton*, 2/24/2000. Photo by Rick Wiltraut.

Local Notes

Adams County

There were 95 species reported during the quarter, including 17 spp. of waterfowl.

A **Double-crested Cormorant** was seen flying over L. Heritage 3/29 (P Robinson). Three **Snow Geese** were found 1/16 s.w. of Gettysburg (J & N Locher). On 3/25 there were 4 **Tundra Swan** at SGL-249, and there were an estimated 85 **N. Pintail** at SGL-249 on 3/6 (PR).

There was an **Osprey** perched in a large dead tree near the dam at L. Heritage on 3/29 (PR). A **Rough-legged Hawk** was found 1/23 flying over Red Rock Rd (JNL). **Short-eared Owls** were seen throughout the quarter in the hayfield areas s.w. of Gettysburg, with a high of 6 birds on 1/22 (JNL). A **N. Saw-whet Owl** was found on the Gettysburg Military Park property 1/17 (G Keller, D Klute, Brad Ross).

Yellow-bellied Sapsucker was found 3/7 (GK, DK, BR) and 3/24 (D Siefken). A total of about 50 **Horned Lark** were in the Hanover Shoe Farm fields along Race Horse Rd on 2/5 (JNL), and 4 **Am. Pipit** were found 3/15 along the same road (C Garner).

The start of the warbler migration was a **Pine Warbler** on 3/31 in the Michaux SF (CG).

Tree, Fox, and White-crowned sparrows were reported throughout the quarter in a number of locations. There were 5 **Rusty Blackbirds** at a feeder on Cunningham Rd on 1/29 (PR, C Simon), and 2 others at SGL-249 on 3/25 (PR, B Moul).

Probably the "best bird" of the quarter was a single **White-winged Crossbill** that paid a brief visit to a feeder in Gettysburg on 2/6, and made a second brief stop at the feeder a few days later (JNL). **Pine Siskin** showed up on Mountain Rd, with a high count of 12 on 3/17, and 2 as late as 3/29 (DS). There was no report of Evening Grosbeak in the county.

Allegheny County

A **Great Egret** was found on the Allegheny R. (AR) at Harmar Twp (HT) 3/27 (S Kinzey). We had a good variety of waterfowl during the quarter including **Canvasback, C. Goldeneye, N. Pintail, Redhead, Bufflehead, and Ls. Scaup**. The highlight was a **Surf Scoter** 1/31 on the AR at HT (SK, P Hess). A **Green-winged Teal** was a nice find at HT 1/31 (SK). A banded **Mute Swan** was seen 3/24 at McKees Rocks (MR) (SK), and a flock of 25 **Tundra Swan** was observed in flight over Ross Twp 3/4 (B Machesney).

A **C. Snipe** found during the Pittsburgh CBC on 1/1 was unusual (C Tague).

Rare for the county, a basic 1 **Great Black-backed Gull** was seen on the Monongehela R 1/1 (PH). An adult was seen on the Highland Park Bridge on the AR 2/6 (JH). A great number of **Bonaparte's Gull** (66) were counted at MR 3/12 (SK).

Merlin sightings increased this quarter. Up to 4 were seen at the roost sight in Schenley Park throughout the quarter. Two were also seen through most of the quarter in Natrona Heights (PH). A single bird was seen in Oakmont on 1/1 (K Behrens, S Sinderson). A real surprise was a **N. Goshawk** seen chasing a Rock Dove in the Bloomfield section of Pittsburgh 2/17 (J Hoffmann). A **Rough-legged Hawk** was seen at Imperial (IMP) 2/6 (W&D Shaffer) and

2/18 (CT).

A **Spotted Towhee** was believed to have been seen at a feeder in Wexford 3/4 (R Schultz). The observer described the bird as resembling an E. Towhee, but with white spotting on the back. Follow up searches by other birders were unsuccessful. This observer was the person who identified a Black-headed Grosbeak and a Clay-colored Sparrow in his yard, so I'm sure he knew what he saw.

The head of an **E. Meadowlark** was found on a sidewalk in downtown Pittsburgh 3/3, indicating the species was moving through the area, and that a Peregrine Falcon fed on it (D R)! A **Rusty Blackbird** was visiting a feeder at the Nature Center in North Park 1/23 (MS). Seven were seen 2/19 (CT), and 5 on 3/10 at IMP (F&C McCullough). This species is uncommon in the county during migration so the presence of these birds during the winter is unusual.

Up to two **C. Redpoll** were coming to a feeder in Natrona Heights during Feb. (PH).

Armstrong County

Two **Pied-billed Grebe**, 364 **Canada Geese**, 3 **Mute Swan**, 36 **Mallard**, 1 **Canvasback**, 1 **Ls. Scaup**, 2 **Bufflehead**, and 12 **C. Mergansers** were found on a river trip along the Allegheny 2/21 (C Guba, J&V Bvalasek, B Jackman, D Jacobs, J Kodane, C Mitchell, N Mosmann). During most of the quarter, even after the spring thaw, water levels at Keystone Res. remained extremely low because of last summer's drought. Although some nice number of ducks were reported [e.g. 23 **Green-winged Teal** on 3/19 (SG)], fewer reports were received this year from KR. The cooling water pond at Keystone Power Plant yielded a variety of species on 3/17 (R Higbee) including **Ring-necked Duck, Ls Scaup, and Hooded Merganser**. As many as 7 **Am. Woodcock** were flying in agricultural fields near W Lebanon at dusk on 2/19 (M Higbee, RH).

Berks County

Locations: Blue Marsh L. (BML), Glen Morgan L. (GML), Hawk Mt. Sanctuary (HMS), L. Ontelaunee (LO).

A 12" snowfall on 1/25 started about a month of wintry weather; otherwise, the quarter was mild. The cold and snow brought an influx of **Rough-legged Hawk, Long-eared Owl, Lapland Longspur, Snow Bunting** and other spp.

An ad. **Black-tailed Gull** identified and photographed at LO 1/2 by Peter Saenger is the first recorded in Pa., pending review by the PORC.

A **C. Loon** was at LO 1/16 (R Keller) and 3 flew over HMS 1/26 (R Homa). There were 10 **Pied-billed Grebe** at the GML nesting area 3/31 (K Lebp). The only **Red-necked Grebe** was at BML 3/14 (K Knight, H&J Silagy). Vultures survived quite well, with 15 BVs and 10 TVs hugging a Holstein carcass near Fleetwood in the dead of winter 1/30 (RK).

A stirring overflight of 10,000 **Snow Geese** at BML 2/24 (HJS) was the high count this season. Flocks on the lakes and fields were much smaller than those of recent years, with a max of 3600 (63 Blues) at LO 2/27-3/4 (RK, KK). Especially striking was the very low number of imm. in all flocks scanned (e.g., 6 imm. in a flock of 1500 at LO

3/12 was a fairly typical proportion). PGC personnel at Middle Creek WMA also noted a low ratio of imm. to adults (*fide* LG). A **Ross' Goose** at LO 3/5,6 was so close that M Wlasniewski could easily distinguish the blue warts at the base of the bill. A red-collared **Canada Goose** (A8R6) at LO 1/1 had probably been banded at James Bay, Canada (RK). Winter hawk watchers at HMS saw 30 **Brant** fly south over North Lookout 1/1 (K Bildstein, G Grove). Resident wild **Mute Swan** have successfully raised young at LO and GML for several years. Birds are now occasionally seen visiting smaller ponds in the county (RK). These aggressive, long-lived birds will probably colonize more of the state in due course.

Rewards of winter hawkwatching at HMS included 5 **Bald** and 1 **Golden eagles** 1/12, plus several sightings of **N. Goshawk**, **Merlin** and other spp. during the quarter (S Thorpe et al.) Off the ridge, an ad. Bald Eagle was at BML 3/3 (HJS) and LO 3/4 (RK, KK), and single **Merlin** at BML 2/5 (RK,HS) and LO 2/26 (KG). Two **N. Harrier** were regular at BML (HJS). There was a high count of 4 **Rough-legged Hawk** in snowy Marion Twp 2/12 (EB).

Rare gulls at LO included an ad. **Laughing Gull** 1/2 standing next to the **Black-tailed Gull** (KK, PS), a first-winter **Iceland** 1/7 (KK) and a first-winter **Glaucous** 1/15,16 (RK, m.obs.). From 1-3 **Ls Black-backed Gull** were seen at county lakes all quarter, including a dark backed bird with pink instead of yellow legs several times in Jan. (KK, m.obs.)

Discovery of several **Long-eared Owl** coincided with the onset of cold and snow in late Jan. A bird roosted in hemlocks at Henningsville 1/23-29 (PS). A group of 2-6 roosted in Scots pines next to a rodent-rich switchgrass and sorghum plot at BML 2/20-4/8 (PS, KK, et.al.). The most unusual discovery was of 3 birds roosting in the rafters of the Kutztown Produce Auction building near Lyons 2/8-10 (Doris Lorah, Jean & Bob Patton). This is a long, one-story rectangular shed with one long and one short side completely open. The owls may first have used it as a shelter during a storm several days before. They sat tight during an auction, but then left. This is the first recorded instance of Long-eared Owls roosting in a building in *Berks*. A **Red-headed Woodpecker** pair was resident near Bowers all winter (RK, PS). The Kauffman Rd, Oley Twp site was deserted all winter (RK).

N. Shrike seen after the CBCs were an ad. near Strausstown 1/22 (C Cravotta), an ad. at Snyder Sch. Rd, BML 2/13 (PS), an ad. in Bern Twp near BML 2/26,27 (RK, KK, HJS), and an unaged bird at Henningsville 3/1 (PS). The only obviously territorial bird was the ad. found in a small cattail marsh near LO 12/20/99 and last seen there 3/7 (R Carpenter). The rodent- and sparrow-rich grasslands and sorghum plot at BML, coupled with many birder visits, may account for the cluster of sightings in that area, some of which could have been of the same bird working a large winter territory. If there were no repeat sightings except of the LO bird, 11 **N. Shrikes** were seen in the county 10/26/99-3/7/00. Interestingly, Earl Poole's big shrike year was the winter of 1921-22, when he saw **N. Shrikes** on 11 occasions in *Berks* Co.

Red-breasted Nuthatche spent the winter, mostly single birds at feeders (m.obs.) Beneficiaries of the mild weather were widespread flocks of **Am. Robin** and **E. Bluebird**, as well as resurgent **Carolina Wren** (nest building in Hereford Twp 3/8-A Francisco). A **Pine**

Warbler on territory at Green Hills L. 3/9 (KL) beat the previous arrival record by a day; a yellow **Palm Warbler** in Muhlenberg Twp 3/30 (C Drasher) tied the arrival record; but a **Black-and-white Warbler** at LO 3/27 (C Elwell, S Schmoyer) was about 2 weeks early.

A **Chipping Sparrow** lingered in Hereford Twp till 1/13 (AF). There were 3 **Savannah Sparrow** on a snow-free Oley Twp roadside 2/13 (RK). **Fox Sparrow** wintered at 5 or more feeders (E Barrell, CC, D Kendall, RK), which is unusual. A sprawling flock of over 1000 sparrows feeding in BML grassland blown free of snow 1/30 (HJS) included about 400 **White-crowned Sparrow**, a very high number. The flock had mostly scattered 2/5, when a **N. Harrier**, an **Am. Kestrel**, and a **Merlin** were harrying the remnant. Only the kestrel caught a sparrow as RK and HS watched.

A spectacular flock of 600 **Snow Bunting** rolled across snowy grass fields near Hamburg 1/30, with 12 **E. Meadowlark** nearby. Cracked corn drew Rusty Blackbirds to a Leesport feeder most of Feb., with a high of 22 on 2/6 (DK). **C. Redpoll** were reported only from HMS, the high count 25 on 1/5 (ST). **Purple Finch** and especially **Pine Siskin** visited many feeders in small flocks seldom exceeding 12 birds (m.obs.).

Bucks County

A **Ross' Goose** was reported at flying with some Canada Geese in Milford Township on 2/5 (D Farbotnik, J Horn). This was the 4th county record. There were three gull species reported at Tullytown landfill, each a 1st county record. A **Yellow-legged Gull** was reported on 2/12 (DF, JH). A **Thayer's Gull** was reported on 2/14 (JH, I Baldock). A **Slaty-backed Gull** was reported on 2/28 (DF, JH). A **Dickcissel** was reported at Bedminster from 1/15 to 2/25 (A Mirabella).

Among the exotic, 7 **Egyptian Geese** were at Nockamixon SP (NSP) on 1/22 (AM) and 1 at Peace Valley (PV) off and on since 2/2 (A Brady).

Other highlights: Two **Horned Grebe** were reported at PV on 3/2 (R Hendrick, AM). Up to 3 **Great Cormorant** were at Bensalem on 1/22 and 2/28 (DF, JH). There were reports throughout the county of up to 110 **Tundra Swan** from 1/8 to 3/13 (R French, C Stewart, M DeVance, R Frock, AM). **Mute Swan** were at Pine Run on 1/9 and 3/28 (K Reiker, AM) and at Ingram Springs 2/7 (AM). **Gr. White-fronted Geese** were at NSP 1/19 (JH) and PV 1/29 and 3/11 (DF, RF, AM). **Blue-winged Teal** were at Bradford Dam 3/15 and 3/30 (RF). Up to 5 **N. Shoveler** were at Pine Run and PV from 2/13 to 3/12 (DF, KR). **Canvasback** were at Bensalem and PV from 1/22 to 2/26 (C Crunkleton, DF, JH, AM). **Redhead** were at Tinicum (3) and Ingram Springs from 2/6 to 2/19 (DF, JH, AM). **Gr. Scaup** were at Pine Run (4) 2/13 (DF), Yardley (33) 2/26 (DF), and PV 3/2 (RH). An **Oldsquaw** was at PV 3/20 (CC). **Red-breasted Merganser** were at PV 2/25 and 3/18 (G Hoffman).

An imm. **Bald Eagle** was at NSP 2/28 (R Frock) and another **Bald Eagle** at PV on 3/2 (RH). **Rough-legged Hawk** were at Ottsville 1/ 11 (DF), Tulleytown (4) on 2/13 (DF), Bedminster 2/25 (AM), and Revere 3/25 (S Farbotnik). An early **Ls. Yellowlegs** was reported at US Steel on 3/13 (A Bilheimer). Fifteen **Bonaparte's Gull** were at PV on 1/17 (CC). **Iceland Gull** were at Tulleytown 1/22 and 2/28, Silver L. 2/16, and PV 2/25 to 3/25 (G Carmichael, DF, JH,

AM). **Glaucous Gull** were at Tullytown 2/12 and 2/28 (R Mercer, DF, JH).

Long-eared Owl continued to be reported at PV through the quarter and they were also at Tinicum 2/6 (DF, AM, KR), and Revere 2/16 (SF). **Short-eared Owl** were at Tinicum 1/23 and 2/4 (DF) and at Tulleytown 2/13 (2) (DF). A **N. Saw-whet Owl** was at Plumstead on 1/12 (DF). **Red-headed Woodpecker** were noted through the quarter at Richland (AM, KR), and Revere (SF). Up to 105 **Horned Lark** continued to be reported at Dublin up to 2/7 (AM, KR). **Red-breasted Nuthatch** continued to be reported at Levittown, PV, and Ottsville until 3/3 (GC, RH, K Kitson). Forty **Am. Pipit** were reported at PV 1/14 (KR). A **Pine Warbler** was at Bristol from 1/18+. (GC). A **Lapland Longspur** was at Dublin 2/5 and 7 (AM). A **C. Redpoll** was reported at PV 2/3 (W Knight).

Butler County

A rather uneventful waterbird season featured a **Red-throated Loon** 3/11 at L. Arthur (LA) (D Yovanovich, D Darney), 2 unusually early **Wood Duck** 2/26 at Slippery Rock Twp (S Butcher), a **Surf Scoter** 3/26 at LA (J Valimont et al.), and 5 **Oldsquaw** during March at LA (v.o.). The **Trumpeter Swan** continued until 1/15 when LA froze completely (DY, DD).

Up to 4 **Bald Eagle** were seen at Moraine S.P. (MSP), and incubation was in progress at the Glades nest by early March (v.o.). **N. Goshawk** at MSP 3/7 (R Stringer) and 3/25 (DD, DY) were the only sightings. Among very few **Red-shouldered Hawk** reports was one dead, no cause evident, at Allegheny Twp 3/18 (B Machesney). **Rough-legged Hawk** visited Glades 1/28 (SB, S McCarl), Butler Twp 2/17 (DY), and Buffalo Twp 2/19 (D Hess, P Hess). A **Merlin** at Herman 3/26 (PH) was the lone report.

Greater Yellowlegs, **Pectoral Sandpiper**, and **C. Snipe** all appeared in March, including an unusually early **Pectoral** 3/10 at LA (DD, DY). Darney found 2 **Long-eared Owl** and 6 **N. Saw-whet Owl** at MSP during the quarter, and among the latter captured was an individual he had banded at nearly the same spot on 3/17/96.

A **Tree Swallow** 3/7 (RS) and 2 **Barn Swallow** 3/31 (DY) were rather early at MSP. A spectacular aggregation of 850 **Am. Robin** and 150 **Cedar Waxwing** feasted on crabapples at Glades 1/22 (SB, G Butcher). A **N. Mockingbird** was notable at MSP 2/13 (DY, DD). A **Louisiana Waterthrush** appeared 3/26, earlier than usual, at Wolf Creek Narrows (DD, DY). Unusual midwinter visitors were 13 **White-crowned Sparrow** at Glades 1/28 (SB, SM). **C. Redpoll** counts included 12 at MSP 1/19 (DD, DY) and 21 at Butler 2/2 (H Beck).

Cambria County

Unusually early were 2 **Pectoral Sandpiper** on 3/31 at Prince Gallitzen SP (D Gobert). During an owl survey for the National Park Service at Allegheny Partage Railroad, Brad Ross, Dave Klute, and Greg Keller found 3 **E. Screech-** and 2 **N. Saw-whet owls**. Also Dave and Alice Beatty were rewarded with a **Screech-Owl** calling as they came out of church in Hastings on a Saturday evening.

Cameron County

On 2/20, 5 **Am. Robin** were in Emporium (D Weis).. Also there on 2/21 he saw a **Hermit Thrush**. At Sterling Run a **Sharp-shinned Hawk** had a starling down in a

ditch; maybe the hawk was trying to drown the starling. Up at Hunts Run Rd on 3/23 Dick Horsey saw an **Am. Woodcock**. An **Osprey** was seen along Rte 120 south of Emporium on 3/28 (DW).

Centre County

The quarter started off rather slowly, with only a few notable sightings before March. A **Red-throated Loon** was at Colyer L. in early March (Paul Rodewald). In late March, a **Sandhill Crane** was seen at Bald Eagle SP (Eugene Zielinski). It settled in at nearby Curtin Marsh where it remained through the end of the period. A number of observers who went to the marsh in search of the crane also managed to find two **Great Egret**. **BESP** was also host to a **Surf Scoter** at the end of March (Jeff Mollenhauer).

Three **Bald Eagle** stayed in **BESP** for the reporting period. Another **Bald Eagle** was seen flying over the Penn State Campus. **N. Goshawk** were found at two locations: Matternville in Feb (Don Bryant) and Black Moshannon SP in March (Nick Bolgiano). A **Merlin** was seen near Stormstown in late February (Don Bryant).

Three **Gr. Yellowlegs** at Colyer L. in mid-March were fairly early (Matt Soccio). A traveling motorist reported a possible **N. Hawk Owl** along I-80 w. of Snow Shoe (Doug McWhirter). The bird was seen briefly and could not be relocated by other birders. (The habitat in this area, however, is fairly extensive and quite suitable for a **Hawk Owl**.) **Short-eared Owl** were reported sporadically throughout the period: 1 near Tusseyville in Jan (Susan Braun), two reports from the University Park Airport in Feb (NB), and 2 along Whitehall Rd near State College in March (Dan Ombalski, Katie Massey). A **Red-headed Woodpecker** was at Tusseyville in mid-Jan (Molly Heath).

Two **Chimney Swift** were reported from the Stormstown area on 3/7, an exceptionally early date (DB). The birds were well seen, but not heard. (Because of this, there is a possibility that they were a different swift species.)

A **Gray Catbird** was found at Walnut Springs Park, State College in Jan. (Molly Heath). Flocks of **Red-winged Blackbird** and **C. Grackle** arrived at the expected time, late Feb., and the **Red-winged Blackbirds** were on territory by early March. Winter finch reports included **Evening Grosbeak** in Jan., **C. Redpoll** in Feb., and **Pine Siskin** throughout the period. **Purple Finch** were also reported throughout the period, with an unusually high number (27) at SGL-176 in Jan (John & Becky Peplinski). A ♂ **Dickcissel** was a regular visitor to a couple of feeders in State College for most of the period (Dorothy Bordner, John Swinton). The **Bald Eagle SP CBC** was held on 1/2. Seventy-one species were reported; notable sightings included **Horned Grebe**, **Bald Eagle**, **American Coot**, **Ruby-crowned Kinglet**, **Am. Pipit**, **N. Shrike**, and **Gray Catbird**. (Note: CBC results are not included in the Seasonal Occurrence Tables.)

Chester County

The winter season brought with it the expected migrants, winter residents, and a few surprises. **Snw Geese** began arriving in large flocks on 2/25 when a flock of 1200+ was seen at Struble L (SL) (T Drozdowski), who saw 600 at SL on 3/6. On 3/8 400+ were seen in a pond just west of Honey Brook on Rte 322 (P Earley, Mary Alice Knox, and E Wolf). According to the *Annotated List of*

Chester County Birds compiled by the West Chester Bird Club, "Snow Geese are uncommon visitors." Their migration path is changing, judging by the numbers seen in the county this year.

Ring-necked Duck were quite abundant at the Honey Brook Sewage Treatment Plant (HBSTP). On 3/5, 120 were seen at HBSTP and another 80 on Bollinger Rd in Honey Brook Twp (HBT) by EW. Phyllis and Beryl Hurlock reported 100+ on 3/17 and 140+ on 3/22 at HBSTP. On 3/25, TD found 22 at Embreeville County Park (EP).

Redhead, not seen every winter, were found at both HBSTP and at Marsh Creek SP. Grier Saunders and EW saw these ducks several times up to 3/5. **Hooded Merganser**, a species that just about everyone enjoys seeing, came through in substantial number, P&BH saw 22 at MC on 2/25. EW saw 46 at MC on 2/27. The last report was for 3 ducks found at Coatesville Res and 1 duck in West Vincent Twp on 3/15 by EW.

An unusual combination (in this part of the world) was the **Brant** and **Barnacle Goose** found at Struble L on 2/29 by Larry Lewis and GS. LL and GS found an unseasonal **Virginia Rail** on 1/7 in the White Clay Cr. area.

On 1/7, LL and GS saw over 30 **Red-tailed Hawks** north of White Clay Creek. Many of the hawks were catching and eating Starlings!

Long-eared Owl were found again at Struble L. Three were reported in Jan. and 3 in March. LL found a **N. Saw-whet Owl** in 1999 in Hibernia Park. The owl was seen by many observers up through 2/27/00.

A **N. Shrike** was seen sporadically at SL. Whether it was the same bird or different birds is not clear. One report, by Nick Pulcinella on 1/30, was about an immature bird. Two other reports were given to me with no details: 2/25 by GS and 3/10 by the Philadelphia Rare Bird Alert (RBA).

An early **Pine Warbler** was seen on 3/2 at Longwood Gardens by Richard Wolf (RW) and EW. A very mixed-up **Yellow-breasted Chat** was found on 1/7 in Penn Twp by LL and GS.

Fox Sparrows seemed more numerous than usual with 11 appearing on 3/6 at the bird feeders of P&BH at Tel Hai Retirement Community. The number of sparrows dwindled until only one was seen on 3/20.

Another unseasonal bird was a **Baltimore Oriole**, seen in Penn Twp for one week at the end of Jan. (*vide* RBA).

Clarion County

Three **Red-tailed Hawk**d seen at Leeper by Lois Callahan on 1/29 were all partial albinos of one degree or another. Two were smaller and one was larger. One was practically all white with just a pink tail.

A **Dark-eyed Junco** at Fairmount City on 1/23 was reported by John Fedak to have two prominent white wing bars. It was perhaps a "White-winged" form usually occurring in the Black Hills of South Dakota.

The ♂ **Baltimore Oriole** that showed up in Shippenville on 1/24 survived the winter and was last seen 4/13. By that time it had changed to full summer plumage. It regularly visited at least three backyards in the area. It ate mealworms, jelly of any flavor, peanut butter mix and sunflower seeds. **Robins** in the area discovered the mealworms and the competition may have made the oriole seek another territory.

Clinton County

On 1/24 a dark phase **Rough-legged Hawk** was seen at S. Avis (W Laubscher) and a light phase bird was seen at Swisssdale on 2/21 (WL). A mature **Bald Eagle** was observed along the Susquehanna R. at McElhatten on 2/6 (D Rockey). WCO John Wasserman saw a **Peregrine Falcon** along Rte 220 near the Lock Haven exit on 2/7.

On 3/9 at Woolrich a **Hermit Thrush** was seen (M Craig). Between 2/29 and 3/x6 a total of 22 **N. Saw-whet Owl** was banded at the Bear Mt. Banding Station at Swisssdale (WL). On 3/23 Steve Bason found an **Am. Bittern** in Mill Hall.

Pine Siskin were present all quarter at Swisssdale (WL). **C. Redpoll** were seen on 1/12 at S. Avis (DR) and later briefly in Feb. and early March throughout the area by several observers. A flock of 21 **Snow Bunting** was seen at S. Avis on 1/12 (DR).

Columbia County

An average winter doesn't always result in an average assortment of birds but this past one did. A little bit unusual was the overlapping of **Tree Sparrow** and **Tree Swallow**: both were present in mid-March. Single **Bald Eagle**, **Short-eared Owl**, and **Rough-legged-Hawk** (dark phase) were faithful to location for a period of about a week, then seem to have moved out of *Columbia*.

Tundra Swan (3) were one day visitors to Young's Pond in mid-March. A **Yellow-bellied Sapsucker** was a steady feeder visitor in the Rhorsburg area (D Gross) while 4-10 **C. Redpoll** at the same location were only interested in the Gray Birch.

Crawford County

It was a mild winter here, with the lowest temperature noted 3°. Most of Jan. and Feb. was cold enough to keep area lakes 95% frozen. Tamarack L. s.see. Of Meadville was still too low for ducks, but a pair of **Short-eared Owl** had a field day there getting voles, moles, or mice in early Feb. By the end of Feb the lake filled up to about normal levels and large number of ducks, especially **N. Pintail**, remained through the end of the period. At Pymatuning's Ford Island Museum parking lot on 3/11 a **Loggerhead Shrike** flew in front of me (20') into a shrub. I squeaked it out and got an excellent look at close range.

Dauphin County

Peregrine Falcon lays an egg! This 3/27 headline reviewed a performance on the 15th floor of the Rachel Carson State Office Building in downtown Harrisburg. Three more eggs followed and thousands have watched the incubation process via the Web. Hatching is expected the first week of May. Incubation is also underway at two **Bald Eagle** nests in northern *Dauphin* (S Bills). **Rough-legged Hawk**, **Short-eared Owl**, and **Long-eared Owl** spent most of the winter and were reported from the farm fields near Gratz in the northern part of the county to fields near Hershey (many). A **Merlin** paid visits to a yard in Harrisburg in early Jan (N&CJ) and a **N. Saw-whet Owl** was reported near Carsonville 2/10 (J&JF).

Other noteworthy observations included a **Red-headed Woodpecker** 2/26 at a Carsonville feeder (J&JF), a **N. Shrike** 3/16 on Sweigart's Is. in northern

Dauphin (SB), and **Lapland Longspur** and **Snow Bunting** from late Jan. to early Feb. near Gratz (C Blatchley, D Hoffman) and on fields south of Hershey (G Randolph). A lone **Rusty Blackbird** was found at Wildwood L. 3/10 (R Spreha) while 21 **C. Snipe** were counted in a flooded field along Rte 39 n, of Hershey 3/22 (P&R Williams).

Even during our brief "winter," mid-Jan. to mid-Feb., channels of ice-free water in the Susquehanna accommodated a variety of species. **Bufflehead**, **C. Goldeneye**, **Ls. Scaup**, **Gadwall**, **Common** and **Hooded mergansers**, and **Am. Coot** remained throughout the quarter. With the increase in open water in late Feb. came a greater variety of waterfowl. By the end of Feb. **Redhead**, **Canvasback**, **Am. Wigeon**, **N. Pintail**, **Ring-necked Duck**, **Horned Grebe**, **Wood Duck**, **Green-winged Teal**, and both **Tundra** and **Mute swans** had been reported. The continuing migration in March added **Gr. Scaup**, **N. Shoveler**, **Blue-winged Teal**, **Red-breasted Merganser**, **Ruddy Duck**, **Pied-billed Grebe** and **C. Loon**. Some single day high counts included 120 Wood Duck at Wildwood L. 2/29 (J Church), 43 Ring-necked Duck at L. Tobias 3/8 (SB), and 1100 Tundra Swan and 300 N. Pintail on Haldeman Is. 3/13 and 3/19 respectively (SB). A fly over of more than 100 **Snow Geese** was observed in Hershey 2/29 (B Hottenstein).

Anyone along the Susquehanna the week of 2/27 to 3/5 witnessed the **Ring-billed Gull** migration. Thousands could have been counted on any day during this period (E Chubb & R Koury). The first **Bonaparte's Gull** of the season was reported 2/29 (RK).

Delaware County

The weather for the quarter consisted of above average temperatures and below normal precipitation. An **Am. Bittern** was noted several times along the Darby Creek (DC) portion of the John Heinz NWR in Jan. (J Damico, D McGovern, John Miller). **Great Egret** returned to DC 3/27 (JM).

There was a mammoth movement of **Snow Geese** over the county 3/24. They were reported by several observers throughout the county with a high count of over 30,000 passing the Rose Tree Park Hawkwatch (RTP) (C Haag). Spring Snow Geese numbers have been steadily increasing each year but this large total is unprecedented. A variety of waterfowl frequented Springton Res. (SR) during the quarter. The most unusual findings were single **Ls. Scaup** 1/11 (N Pulcinella) and **C. Goldeneye** 1/8 and 2/22 (NP).

An early **Osprey** was noted at RTP 3/9 (D Washabaugh). A **N. Goshawk** was found in Edgmont Twp (ED) 2/10 (A Guarente). Two **Rough-legged Hawk** were found during the quarter. One frequented the area of DC (DM, JCM) and another was seen off and on near Media (H Todd). **Ls. Yellowlegs** had returned to DC by 3/25 (NP, S Gardo).

Always a sign that spring has arrived is the appearance of the first **Tree Swallow**. They were first noted at DC 3/4 (JM). **Black-capped Chickadee** were found sporadically through the quarter at Ridley Creek SP (JD) and Swarthmore (J Waldie). An **Orange-crowned Warbler** was noted at DC 1/3 (S Conant). This may have been the same bird seen on the Glenolden CBC. **Pine Warbler** had arrived during the latter part of the quarter

with birds being seen at Tyler Arb. (T Reeves) and at DC (NP, SG). A single **Chipping Sparrow** remained throughout the quarter at a feeder in Media (JW). A single **Snow Bunting** was found at the UPS complex in Essington 1/2 (AG).

"Northern Finches" were uncommon throughout the quarter with **Purple Finch** and **Pine Siskin** most frequently seen. There was one report of **Red Crossbill** 2/10 at Tyler (AG) and a single **White-winged Crossbill** was a brief visitor at DM's yard in Media 1/13. A total of 102 spp. were found in the quarter.

Elk County

Dick Horsey saw an **E. Bluebird** on 2/18 and also a **N. Flicker**. At his feeders on 2/20,21 he had a **C. Redpoll** along with 30+ **Evening Grosbeak**.

Don Weis had a **N. Goshawk** in the Dents Run area on 2/8. Another **N. Goshawk** was in Kersey on 2/24. He found 11 **Wild Turkey** in the Dents Run area. On 3/21 had 2 **Killdeer** at the Laurel Run Res.

At the Clarion R. on 1/24 were 9 **C. Merganser**, 22 **Wild Turkey**, 1 **Belted Kingfisher**, and 2 **Am. Robin**. Birds at the feeders included 2 **Brown Creeper** on 1/23 and a **Red-winged Blackbird**, 100+ **Evening Grosbeak**. Two **Turkey Vulture** flew over the Clarion R. **Song Sparrow** returned to Montmorenci on 2/26. On 3/19, 10 **Brown-headed Cowbird** came to the feeders. At Ridgway Res. on 3/23 were 5 **Oldsquaw**. An **Am. Woodcock** was in the Montmorenci area on 3/24.

Erie County

A mild winter brought few northern species south into n.w. Pa. Several earlier than usual species arrived with the very warm weather in late Feb. and early March, but with the return of cold weather most species were held back to more normal arrival dates.

Presque Isle Bay and L. Erie remained mostly frozen until 2/26. By 3/12 a remarkable number of **Horned Grebe** had collected in the bay totaling and amazing 2000+ birds. This was not only an early date for such a large number, but an unusually high number for any time in spring along the south shore of Lake Erie. **Trumpeter Swan** are becoming a regular at Presque Isle with 5 yellow wing-tagged adults present from at least 1/9-17. Waterfowl numbers peaked to about 35,000 birds in Presque Isle Bay by 3/16 with **Ls. Scaup** being the most common followed by **Gr. Scaup** and **Canvasback**. "**White-winged Gulls**" were poorly represented this winter with fewer than ten birds recorded. **C. Redpoll** and **Pine Siskin** persisted through most of the period with redpoll numbers topping at 85 or so individuals. Most redpolls were reported at Presque Isle while all the Pine Siskin reported were from feeding stations at various locations in the county. No crossbills or Evening Grosbeaks were reported.

Fayette County

Good numbers of **Ring-necked Duck** were present at Deer L. 3/11 when 197 were counted, and on 3/18 when 188 were observed (M McConaughy).

Killdeer were reported on 1/8 at Virgin Run L. (MM) which was early. A **Pectoral Sandpiper** was a nice find on 3/18 at Mill Run Res. (MM). A good count of 13 **C. Snipe** were at Mill Run Res. 3/18 (MM).

Rather uncommon in the county was a **Bonaparte's**

Gull at Jacob's Creek L. 3/12 (D Byers).

Five **Rusty Blackbirds** were seen at Mill Run Res. 3/18 (MM).

Forest County

A **C. Loon** was spotted on the Allegheny R. near Tionesta by Ted Grisez and Don Watts on 1/8.

Rodney Daum reported seeing 2 adult and 1 immature **Bald Eagles**, a **N. Goshawk** and 7 **Red-tailed Hawks** near Tionesta on 1/7.

Evening Grosbeak, **Pine Siskin** and **C. Redpoll** continued through the quarter at feeders near Tionesta, with a high of 64 Evening Grosbeaks on 1/4.

Franklin County

Red-breasted Nuthatch were seen all quarter at several locations, which has not been the case in previous years. Also large numbers of **Dark-eyed Junco** were seen at various locations. **Fox Sparrow** was more common than previous years. On 1/20 Joyce Schaff counted 18 **N. Cardinal** at one time on Warm Spring Rd. She counted 58 **Cedar Waxwing** on 3/18, which remained until 3/31. **Purple Finch** continue to be scarce in the county.

Uncommon species were **C. Redpoll** on Heisey Rd (B Keener). Also a **Rough-legged Hawk** was seen along Leitersburg Rd in Feb. (D Gearhart) and it remained until 2/20. It was often perched near the road making it very visible and easily observed by many birders.

Fulton County

The Forbes Trail Rd Pond, Ft. Littleton, hosted a ♂ **Redhead** on 2/27 and 34 **Wild Turkey** were there on 3/11 (D Snell).

Huntingdon County

Thirty or more **Redhead** were on the Juniata R. at Huntingdon during mid-Feb. as also occurred in 1999 (B Reddinger). Two adult **Bald Eagle** had started fixing up their nest from last year at L. Raystown by early Feb. At the Tussey Mt. hawk-watch, a peak of 10 **Golden Eagles** passed on 3/24. By late March, over 50 had been tallied. Also from the watch, a **Merlin** 3/14 and a **Peregrine** 3/18.

A **C. Snipe**, not often found here in mid-winter, was at McAlevy's Fort 1/16+ (G Grove). The first **Am. Woodcock** report was 2/25 at Huntingdon (D Kyler). The last **N. Shrike** report was 3/5 at Mill Creek (R Singer). **Golden-crowned Kinglet** were quite scarce this winter. Modest numbers of **Pine Siskin** were found throughout the period but **Purple Finch** and **Evening Grosbeak** were not easily found.

A few first dates: **E. Phoebe** 3/8 (J&B Peplinski), **Tree Swallow** 3/8 (GG), **Pine Warbler** 3/18 (T Kyler), and **Savannah Sparrow** 3/10 (DK).

Indiana County

Yellow Creek L. (YC) had begun to thaw by 2/23 and good numbers of waterfowl were reported. The **Ross's Goose** present since 11/22/99 (M A Dunmire) lingered through the quarter's end at the farm pond near Saltsburg. An adult **Bald Eagle** at YC 1/5 (P Snickles) was the county's lone report. A **N. Goshawk**, seldom seen in the county, circled overhead the 7 observers at YC affording excellent views 3/4 (L Carnahan, D Darney, S Graff, M&R Higbee, D Jacobs, D Yovanovich). Three **Rough-legged**

Hawk reports were received, 1 near Elders Ridge 1/25 (D Lauffer), 1 at Homer City 1/26 (M&RH), and a third near YC 3/4 (M&RH). As many as 5 **Short-eared Owl** were counted near W. Lebanon 1/6 (SG) and 1/28 (L&L Hess).

The **N. Shrike** invasion merely touched *Indiana* with reports only at Gipsy 1/22 (M&RH) and at YC 3/4-18 (m..ob.). After reports of two **Fish Crow** in Indiana in early Feb, (SG,G Syster), armed with a tape recorder SG attempted to record them which he succeeded in doing on 3/2; reports from various observers continued through the quarter's end. **Pine Warbler** returned 3/9 (M&RH) near Shelocta, the second earliest date of return on record since 1983; the early record was 3/6/97 at the same location.

The Garobel's race **White-crowned Sparrow** was present all quarter near Shelocta but had not yet completely molted into its black and white striped crown; by the last week of March, it had begun to sing daily from its favorite perch in the quince.

Juniata County

Highlights of the quarter were raptors and owls. The 23 **Long-eared Owl** counted on the CBC stayed most of this quarter and at least 7 **Short-eared Owl** were counted at various times. Deuane Hoffman and yours truly found 12 **Rough-legged Hawk** on 2/5 in 1½ hours, all within a 4-mile radius. **N. Shrike** were seen in a number of places until about mid-March.

We again had a ♂ **Green-winged Teal** winter on Little Lost Cr. in a flock of **Mallard** and **Am Black Duck**. The **House Wren** on Rockland Ridge on 1/27 was very late. With our first measurable snowfall for the season on 1/20, we again had several large flocks of wintering **Am. Robin**, **Hermit Thrush**, **E. Bluebirds**, **blackbirds**, and **E. Meadowlark** here most of the quarter. The **Am. Bittern** was a nice find in a marshy area near Oakland Mills.

Lackawanna County

Bill Reid sent the following observations: 1 **Horned Grebe** on 3/18. 650 **Canada Geese** on 3/7. 3-8 **N. Pintail** from 3/9-18. 14 **Ring-necked Duck** on 2/29, with a high of 211 on 3/14. See report for **Tufted Duck** notes. A **Bufflehead** from 3/6-19. A **Hooded Merganser** on 3/7.

Turkey Vulture on 3/9+. A **Rough-legged Hawk** at Schultsville on 2/27. An **Am. Coot** on 3/6 with from 3/18+. 2 **Am. Woodcock** on 3/15+.

300 **Ring-billed Gull** were at Tayler landfill on 1/10. 17 **Herring Gull** on 1/9. 2 **Great Black-backed Gull** on L. Scranton on 1/19.

First **E. Phoebe** on 3/9. Latest **Am. Tree Sparrow** were 5 on 3/2. And 2 **Rusty Blackbird** on 3/2. Above records were all at Ford's Pond unless otherwise indicated.

Lancaster County

Highlights for the quarter were 1-3 **Ross' Geese** at Middle Creek WMA between 2/26 and 3/26 (T Garner, R Miller, A Mease). A dark phase **Rough-legged Hawk** was in Lititz on 1/29 (R Miller).

A **Little Gull** was totally unexpected over farm fields near Churchtown on 3/28, as were the **Bonaparte's Gulls** with which it seemed to be traveling with (F Haas).

A **Bullock's Oriole** was first seen 1/15 (M Gockley) and photographed. Other observers were P Robinson, R Spreha, TG, RM, B Carl, J Heller, and AM.

Lebanon County

Thunder storms during the night produced a nice number of waterfowl on Memorial L. (ML) on 4/12: 10 **Wood Duck**, 1 ♂ **Eurasian Wigeon**, 40 **Am. Wigeon**, 4 **Redhead**, 150 **Ring-necked Duck**, 650 **Gr. Scaup** (new high), 150 **Ls. Scaup** (new high), 2 **Oldsquaw**, 1 **C. Goldeneye**, 4 **Bufflehead**, 12 **Hooded Merganser**, 150 **C. Merganser**, 10 **Red-breasted Merganser**, and 3 **Ruddy Duck**.

Snow Geese numbers peaked in late-Feb. with 75,000. On 2/27 3 **Ross' Geese** were found at Middle Creek WMA (MC). **Tundra Swan** peaked at MC in late-Feb with 5000 seen. At MC on 2/26 were 100 **N. Pintail**. A **C. Goldeneye** at ML from 3/3-26 was found sleeping under one of the benches.

80 **Wild Turkey** were being fed on Little Mt. this winter. A flock of 29 turkeys at ML was seen several times. **Am. Woodcock** peaked at 21 on 3/8 at SGL-145.

An adult **Ls. Black-backed Gull** on 3/3 at ML set a new late date. A nice flock of 2200 **Horned Lark** on Mt. Pleasant Rd was seen on 2/13. A **Tree Swallow** on 3/12 set an early date at ML and a **Barn Swallow** on 3/9 near Annville was another good find.

Am. Robin were in good numbers; 75 were at Union Canal Park on 2/5. A **Louisiana Waterthrush** at MC on 3/26 set an early date. **Fox Sparrow** peaked with 8 on 3/8 at SGL-145. A **Dark-eyed "Oregon" Junco** on 3/10 at ML with 30 other junco was a good find. A flock of 250 **Snow Bunting** on Blue Mt. Rd on 2/20 was good. The 1-2 **Purple Finch** at Camp Shand were the only ones reported.

Lehigh County

The mixed weather for the period provided some interesting though limited birding. Of note this year were the unusual numbers of **Am. Robin** occurring in large flocks in Jan. in various locations in the county. Feb. warbler reports included a **Pine Warbler** at a feeder in West Allentown through the quarter till 3/5. This is the second year in a row that a **Pine Warbler** has been present at this feeder in winter.

Two **N. Saw-whet Owl** were found roosting Jan. through Feb. at an undisclosed location. **Lapland Longspur** (high count 6) showed up with **Horned Larks** (high count 800) and **Snow Buntings** (high count 50) near Alburdis in late Jan. and Feb. Prior to the deep freeze which left area lakes and ponds frozen the usual complement of ducks was reported from the area. As the water thawed with unseasonably warm weather the first week in March the waterfowl returned to area waters including thousands of **Snow Geese** on the Fogelsville Quarry

Red-Winged Blackbird arrived in mid-Feb. followed by **Am. Woodcock** displaying in early March near Alburdis. On 3/12, the Whitehall Pky held an **E. Phoebe**, an **E. Bluebird**, and a flock of about 100 Robins. Around 20 **Am. Woodcock** were seen displaying at the Whitehall Pky during the end of the month.

Luzerne County

A great way to start your Birding Year's List is by participating on a CBC in Jan. Those fortunate *Luzerne* birders who did not have to work on ½ got off to a great start during the Nescopeck Mt. CBC. Highlights during the count were **Redhead**, **N. Bobwhite**, **White-crowned**

Sparrow, and **Evening Grosbeak**. Bill Reid started his year list with a **White-winged Scoter** at Harveys L. on 1/3. Large flocks of **Snow Geese** flew high in the sky on 2/28. Migrating **Snow Geese** are not often observed here. Towards the end of Feb., several **Tundra Swan** decided to rest a few days at Plains Flats and Plymouth Flats. Alan Gregory discovered a **Rough-legged Hawk** at Conyngham on 3/27. **Short-eared Owl** made the former East Side Landfill a brief winter retreat for the second year in a row. The resident **Peregrine Falcons** were seen around the Wilkes Barre area and Bob Wasilewski has high expectations that the pair will nest again at Plains.

Once again, Autumn Pfeiffer at Hobble reported early mid- Feb. **Am. Woodcock**. Plymouth Flats provided enough food and cover for the lingering **Fox Sparrow** and **Gray Catbird** found during the previous Dallas CBC.. Several **N. Shrike** wintered in our area and Stanley Galanty had the good fortune to find 3 **N. Shrikes**. Jim Hoyson had the pleasure of hearing an immature **N. Shrike** sing at the Berwick Riverlands while Doug Gross kept records of at least 5 **Bald Eagle** at the same location. An early **Bonaparte's Gull** was reported at Harveys L. on 3/28. With some patience and repeat visits to gray birch stands throughout our area, several birders found flocks of hungry **C. Redpoll**.

Lycoming County

During March observers spent time on N. White Deer Ridge counting hawks, concentrating on the number of **Golden Eagles**, which may use this area during migration. It looks to be a promising site.

A high count of 63 **Bonaparte's Gull** was spotted at Rose Valley L. on 3/31 (R Beach, W Egli). Winter finch reports were few. A high count of 6 **C. Redpoll** was at the Reish's in Upper Fairfield Twp on 2/21. Individuals or pairs were also reported from Jersey Shore and Muncy (D Rockey, WE). The only report of **Pine Siskin** was from Muncy on 2/26 (WE).

EXOTIC: Two people reported a **Eurasian Goldfinch** in the Loyalsockville area on 2/26,27 (R Campbell, T Dietrick).

Mercer County

A **Sandhill Crane** was found at Skunk Run Rd. 1/1, 2/29 and 3 were present there 3/8 (M Troyer). The big flocks of **Tundra Swan** were missed, but 50+ were counted over Williamson Rd. 3/6 (Troyer family). 1 **Osprey** returned to Shenango R. Res. on the early date of 3/26, and a pair were noted on a nesting platform 6 days later. **Am. Coot** began a huge appearance with 60 at SRR 3/26, with hundreds to follow in April. **Canada Geese** began incubation at Hermitage on the very early date of 3/25.

After 3 days of frigid weather, 4 hungry **Red-tailed** and 4 **Red-shouldered hawks** were seen hunting 1/23, all within a half mile stretch of W. Lake Rd. Maybe they thinned out the 200 **Am. Robin** and 100 **Cedar Waxwing** also, in the same area. A **Red-shouldered Hawk** was seen copulating 2/17 at Hermitage.

Surely due to the warm early March, **E. Phoebe** arrived 3/9 at Hermitage and Williamson Rd., 9 days earlier than average. And 3 swallow spp. arrived earlier than ever before: **Barn** on 3/26 at Zahnizer Rd., **Tree** on 3/9 at WR and **Purple Martin** 3/4 at Sk.R.Rd. (TF).

N. Shrike showed up in this county also, with 1 on 1/9 at the McKean farm (Troyer family), and 1 on 2/25 at Pensey Swamp (R Stringer).

Red-breasted Nuthatch were around all quarter, with one particular bird, which arrived in late Aug. '99, still coming to a feeder in Hermitage 3/31+.

The 4 **Pine Siskin** at Nicklin Lane 3/9 (TF) was hardly noteworthy, but maybe the 4 **C. Redpoll** 2/28 at WR (TF) and 18 on 3/2-6 at Grove City (RS) could be called a mini-invasion. A **Hoary Redpoll** was noted among the latter group 3/2-3, with details to follow.

Mifflin County

On 2/8 in a misty, rainy-snowy area in Belleville and Allensville we saw hundreds of **Mourning Doves**, plus **Horned Larks**, 1 **Lapland Longspur**, and 8 **Rough-legged Hawks** (including 2 dark phase) over the Big Valley. Also that day we saw a **Dark-eyed Junco** at a feeder near Belleville. It had a little white cap and the white extended down to the chin. It came in for about two weeks with regular feeder birds.

On 3/8 Steve Kanagy observed a pair of **Red-tailed Hawk** at nest in an area just out our own back woods.

Monroe County

After a relatively mild first half of Jan., cold and snowy conditions followed and lasted through Feb. The quarter ended with more mild weather.

The earliest return dates reported for vultures were 3/23 for 4 **Black Vultures** over E. Stroudsburg (ES) (B Hardiman) and 3/27 for **Turkey Vulture** at Zimmer Preserve (E Parnum). Two **Green-winged Teal** were found on King's Pond near ES on 3/8 (J Jos ).

An imm. **N. Goshawk** spent part of the winter near the Meesing site in Delaware SF and was seen on 3/9 carrying a crow in its talons as it was mobbed by other crows (BH). **Red-shouldered Hawk** were uncommonly common this quarter: reports came in from Skytop 1/23 (J Serrao); near ES 1/25, including a pair there 2/4 (JJ); Marshall's Creek 2/22-23 (BH), Canadensis 3/7 (JS); and along River Rd in Delaware Water Gap National Recreation Area (DWG) on 3/9 (JJ). Serrao found an albino **Red-tailed Hawk** near Appensel 3/20. A great find by Rich Kane and his N.J. Audubon group was a **Golden Eagle** at Mt. Minsi in the DWG 2/5.

The only **Am. Woodcock** report was displaying birds seen 3/7 along River Rd in DWG (JJ). Robert Burns, from Monroe Lakes in the Marshall's Creek area, reported a pair of **Pileated Woodpecker** regularly visiting a suet feeder on his deck throughout the winter. The male was a more frequent visitor than the female. An **E. Phoebe** arrived early in Minisink Hills 3/9 (BH).

N. Shrike made a showing this winter: Spruce L. Retreat near Canadensis reported 1 the last week of Jan. (J Atwell); JJ had an adult near ES 3/1; and individuals were noted near Canadensis 3/7 and ES 3/17 (JS).

C. Raven are again occupying the nest on Mt. Minsi in the DWG. First seen at the nest 2/21, the pair continued there for the remainder of the quarter (BH). Other than 2 seen at Monroe County Environ. Educ. Ctr (EEC) 3/30 (BH) and a single report from Zimmer Preserve 3/27 (EP), **Golden-crowned Kinglet** seemed to be absent. The first **Chipping Sparrow** of the season was seen 3/30 at EEC (BH) and an outstanding count of 38 **Fox Sparrow** in the

west end of *Monroe* on 3/12 was reported on the Eastern Pa. Birdline. A flock of **C. Redpoll** was reported at a Marshall's Creek feeder on 3/15 (M Feder).

Montgomery County

The first quarter brought winter weather to our region for the first time in several years. Green Lane Res. (GLR) was completely ice-covered except for a small area at the Hill Rd office. Both **Pied-billed** and **Horned grebes** were reported in small numbers (GA Franchois, m.obs). **Great Blue Heron** vacated GLR due to ice, but were found along the Schuylkill R. at Valley Forge National Park (VFP) on 1/30 (L Tull, M Harvel). Waterfowl variety was modest at best, with 21 spp. reported. This was due (in part) to extreme cold weather followed by extreme mild, clear weather in early March (77° on 3/8). No storms means no storm-related fallout! A **Gr. White-fronted Goose** was at Hill Rd. GLR 2/24 (A&J Mirabella, m.obs), and for the second consecutive year, a **Gr. White-fronted X Canada Goose** hybrid was reported there. Unlike last year's bird, this individual had orange (not gray) legs. (K Crilley, m.obs). A **Ross' Goose** (2nd county record) found at Hill Rd 1/24 (J Horn) was last seen 2/12 (C&D Miller). **N. Pintail** reached their highest count in years, with 355+ at GLR 2/24 (KC). High counts of **Green-winged Teal** continued this quarter with 130+ present 3/24 (GAF). **Canvasback** numbers at Church Rd. GLR peaked at 3 on 3/22 (A Curtis), and **Ring-necked Duck** reached an impressive high of 192 there 3/4 (GAF). 1-2 **Bald Eagle** wintered at Hill Rd GLR, where they fed on several dead Canada Geese on the ice. (KC, m.obs).

A **N. Goshawk** was a nice find at Fort Washington State Park (FWP) 3/13 (B&N Murphy). **Red-shouldered Hawk** has been relatively scarce at GLR in recent years, so reports from Walt and Church Rds. in all three months of the quarter were very welcome. (A&JM, GAF). **Rough-legged Hawk** was also observed at GLR in all three months with the latest report 3/5 (GAF, KC). Up to 7 **Am. Woodcock** were observed in courtship flights at GLR between 2/25 and 3/9 (GL Freed, GAF). A third-year **Iceland Gull** was at Church Rd., GLR 1/9, along with 6 **Ls. Black-backed** and 2 **Great Black-backed gulls** (KC, GAF, P&A Guris). A **Barred Owl** was seen along Rte. 29 in Collegeville during the snowstorm of 1/25 (P&AG), and 2 **Long-eared Owl** were found at GLR 1/24 (JH). Our rare owl "hat-trick" was realized with a **Short-eared Owl** perched on a stump near Niantic 2/9 (A&JM).

The **N. Shrike** at Church Rd GLR remained until at least 3/22 (AC, m.obs). A **Blue-headed Vireo** near UPVP 3/11 was unusually early (P&AG). While not as numerous as last quarter, a few **Red-breasted Nuthatch** wintered at feeders near GLR and Lansdale (GAF, K Reiker). Single **Winter Wren** were reported from Upper Gwynedd Twp 1/6 (A&JM) and VFP 1/30 (LT, MH). An **Orange-crowned Warbler** appeared at a "peanut-butter" suet cake near GLR on 1/25 and 1/30 (during major snowfalls) (GLF). Interestingly, one was found at a similar feeder less than ¼-mile away on many other days (including pleasant ones). It was last seen 3/2 (T Myers, ph.) Once again, an **E. Towhee** spent the winter at FWP (B&NM). **Fox Sparrow** are normally not found in *Montgomery* before March, so sightings, in Jan. and early Feb. at FWP and Unami Creek Valley were a surprise (B&NM, KC). Another good find at FWP came in the form of a **Rusty Blackbird** 1/30

(B&NM). **Purple Finch** numbers reached a peak of 25 on 2/27 near UPV (P&AG). The Guris's feeders also hosted our lone **C. Redpoll**, a female on 1/30. Two **Pine Siskin** were at Hill Rd. GLR on 1/26, just after our first big snowstorm. (KC).

Northampton County

The hottest news of the quarter was up to 3 **Barrow's Goldeneye** (1 ♂ and 2 ♀♀) that were found at Foul Rift on the Delaware R. from 2/20-27 (J Horn, D Farbotnik). Another ♂ (different markings) was found at Portland on 2/26 (RW, S Boyce). This was a 1st county record. Birders looking for the Barrow's Goldeneyes, turned up a **Pacific Loon** on 2/27 (B Boyle, K Thompson, H&K Burk). A **Double-crested Cormorant** was seen on the Lehigh R. near Easton on 1/2 during the Bethlehem CBC (D Brandes, D DeReamus). **Gr. White-fronted Geese** of the Greenland race were found near the Martins Cr. PP&L flyash basin 2/22-26 and at Nazareth on 2/24 for the 2nd and 3rd county records (R Wiltraut). An imm. white morph **Ross' Goose** was found in a huge flock of **Snow Geese** near the flyash basin 2/28 for a 3rd county record (RW, DF, JH) and another (same?) Was seen on Kessler'sville Rd 3/7 (RW). A high count of 218 **Ring-necked Duck** was at Albert Rd 3/12. A **White-winged Scoter** was on the Delaware R. at Portland 2/19-27 (B Hardiman, RW).

A dark-morph **Red-tailed Hawk** returned to the flyash basin for the 9th consecutive winter and an adult **Red-shouldered Hawk** was seen feeding on a deer carcass at Pt. Phillips on 2/9 (RW). **Rough-legged Hawk** were found in Williams Twp (A Koch), near Martins Creek (JH, DF), and at Green Pond (K Stagl). Another highlight was an imm. **Peregrine Falcon** of the *anatum* race at a nesting box of the power plant in March. Another imm. *anatum* Peregrine was seen near Tatamy 3/21 (RW). Single **Merlin** were at Green Pond 1/18 (I Baldoch, JH, RW), Klecknersville 1/29-2/3 (SB, RW), and near the power plant 2/28 (DF, JH, RW).

A **Sandhill Crane** was present at Green Pond from 1/14 to 4/7, the longest that a crane has ever stayed in the county (m.obs.). A 1st winter **Glaucous Gull** at the flyash basin 2/29 was the 2nd county record.

A **Long-eared Owl** was seen in Williams Twp on 1/1 (AK) and at Kessler'sville Rd 2/23. A **Short-eared Owl** was at the flyash basin 1/15-18 (RW). An early or over-wintering **E. Phoebe** was seen at Pt. Phillips 2/10 and 2 early **Am. Pipit** were on DelHaven Rd 2/13 (RW). **N. Shrike** were seen in Jan. in Williams Twp (AK), and Forks Twp (R Johnson). At least 4 shrikes were found in the county.

A **Palm Warbler** was seen in Williams Twp on 1/18 (AK). A **Clay-colored Sparrow** returned for the 2nd year at the power plant and remained through most of the period (BH, RW). An imm. Gambel's **White-crowned Sparrow** was present at the flyash basin through the period and up to 13 **Savannah Sparrow** were there after the snows 1/28. 6 **Lapland Longspur** were at Graver's Hill 1/20 and 100 **Snow Bunting** were at Schlegel Rd 1/28. A **Rose-breasted Grosbeak** visited a Bethlehem feeder on 1/28 (T Mutchler). A flock of 20 **White-winged Crossbill** stopped over in Williams Twp on 2/18 (AK). Large flocks of **Am. Robins** were present throughout the winter.

Perry County

The most impressive report of the season came from

Dan Brauning. He reported having a conversation with a Newport man that had reported a vulture roost near Newport. Upon investigation the roost contained 100+ **Black** and 150 **Turkey vultures!** There have been roost in the area in previous winters, but this is by far the largest.

Philadelphia County

A foot of snow fell on 1/20 and subsequent small snows covered the ground for three weeks. Freezing temps in Feb. were followed by a warmer and drier than avg. March. First, the Bad News: On 2/5 at John Heinz NWR at Tinicum (TI) 190,000 gals. of crude oil leaked from an underground pipe whose welded joint failed. Sub-freezing temps slowed the advance of the spill which was confined to two acres. The frozen impoundment kept the oil under ice, limiting the spread and insuring that no birds were injured. Long term effects of the spill are being assessed and the enormity of the cleanup operation will alter Tinicum for years to come.

The Good News: The 14th Philadelphia Mid-winter Bird Census (MBC) was conducted on 1/8 by Keith Russell and 43 volunteers who recorded 108 species (138 cumulative), the highest number for the second time in three years, including three firsts: **Prairie Warbler** east of the Airport Area (K Somerville), **Red-breasted Merganser** at FDR Park (S Sherman), and **Baltimore Oriole** at Judy Stepanaskie's feeder (J Siler, C Hetzel). Missed, were C. Loon, Am.. Woodcock, and C. Grackle. Seen at TI the day after the count were **Marsh Wren** and **Am. Bittern** (J Miller). The MBC found 21 **Pied-billed Grebe**, 12 of them at the East Park Res. (EPR). Other high counts were 24 **Ruby-crowned Kinglet**, 248 **N. Pintail**, and 33 **E. Screech-Owl**.

Other MBC notables were: an **Iceland Gull** at Pleasant Hill Park along the DR (D Cutler), 3 **Ls. Black-backed Gull** on the DR (DC, Lyman family), 2 **Long-eared Owl**, one along Poquessing Creek and one near the NE Airport (M Sharp), a **N. Saw-whet Owl** at TI (R&M Miller), **Rough-legged Hawk** near TI (D McGovern), and **Orange-crowned Warbler** near the Art Museum (S K, S SZ).

A **Great Egret** was at TI on 3/11 (D Brennan) and a **Snowy** and **Great egrets** were at FDR Park 3/27 (MS). **Horned Grebe** were at EPR 3/17 (KR) and TI on 3/26 (B S). Numbers of **Great Cormorant** are common along the DR. **Snow Goose** flocks of 400 on 3/9 (KS) and 700 on 3/15 (MS) seen moving north could not rival the counts in neighboring counties.

All dabbling ducks were seen on the MBC except **Blue-winged Teal**, which was reported on 2/27 at TI (DB). **Redhead** was missed again this year. The first reported **Osprey** was 3/14 (MS) and the light morph MBC **Rough-legged Hawk** was spotted again 1/28 (JM). In addition to the 8 **Black Vulture** on the MBC, JM had his second TI record in more than 45 years on 3/3. In Mt. Airy a **N. Goshawk** was seen 3/24 (S Lawrence).

Matt Sharp at the Academy of Natural Sci. Phila. reports that the **Peregrine Falcons** at City Hall had 3 eggs on 3/28. Girard Point and Betsy Ross Bridge birds also had eggs as of 3/27. The status of the Ben Franklin bird(s) is unknown, and the Whitman birds are not using the nest box and may not be on the bridge at all. Other Peregrine reports come from CM at the Saul School in the n.w. and

DM at Baxter Water Treatment Plant on the DR near the Tacony Palmyra Bridge.

The deep freeze of Jan-Feb pushed **Am. Woodcock** further south where they still died by the thousands, but by 3/4 they were seen again at the Old Prison Farm (KS) and 3/5 Benj. Rush SP (MS). Birds danced as usual at SCEE and at TI in spite of the oil spill clean up activity. DB saw the first **C. Snipe** at TI on 3/12. Hundreds of **Laughing Gull** were reported moving north along the DR in the last weeks of March (MS).

Red-bellied Woodpecker on 1/23 and **E. Bluebird** on 2/19 were unexpected TI visitors (DB). **E. Phoebe** returned to Germantown 3/24 (SL) and TI 3/26 (EP). 4 **Horned Lark** were found on the MBC and JM saw a group of 10 in the TI area on 2/5. Earliest **Tree Swallow** were seen 2/29 (JM) and 3/5 (DB). At least 3 **Brown Thrasher** and 3 **Gray Catbird** attempted to overwinter. CL spotted 34 **Tree Sparrow** in the NE on 3/23. The 3/18 public walk at TI produced an **E. Towhee** (SC). Scattered early reports of **Red-winged Blackbird** and **C. Grackle** probably came as a result of the birds seeking feeders in the wake of the extreme cold. In addition to **Orange-crowned**, 7 **Yellow-rumped**, **Prairie**, 10 **Palm warblers** and 2 **C. Yellowthroat** seen on the MBC, SL had a **Pine Warbler** in Carpenter's Woods and at a feeder on 1/16. F Winfelder's NE feeder hosted a **C. Redpoll** from 3/4-15. **Pine Siskin** were present throughout the county, but reported predominantly in Mt. Airy and the NE. 8 **Snow Bunting** were seen on the MBC.

Schuylkill County

This first quarter of 2000 was marked by a lack of **Yellow-rumped Warbler** and **Golden-crowned Kinglet**.

A **Great Egret** was at the Sweet Arrow L. (SAL) on 3/27 (T Clauser). Thirty **Brant** flew past the north lookout at the Hawk Mountain Sanctuary (HMS) on 1/1 (Keith Bildstein, Greg George). A ♀ **Oldsquaw** was seen at the Landingville Dam (LD) on 2/28 (B Jucker) and 3 were at SAL on 3/10 (L Ealy, D Kruehl).

The late season hawk watching was very productive at HMS as some nice raptor flights were being seen in Jan. Total counts of 17 **Bald** and 3 **Golden eagles** were observed at HMS from 1/1 through 2/2 (S Thorpe, R Homa, J Scholtes). A **Merlin** was seen here on 1/26 (RH) and another was seen in Dreherstown on 1/22 (RH). A number of **Rough-legged Hawk** were seen in the county, with 4 at HMS during Jan. On 2/6-7 a **Rough-legged Hawk** was seen in the Hidden Valley area (AM Liebner). Two **Rough-legs** were at the Schwartz Valley Rd area on 2/23 (S Weldensaul). Probably early by a couple weeks, an **Osprey** was seen on 3/15 at SAL (D Donmoyer, TC). A **N. Bobwhite** was seen near Landingville on 3/5, and another was near McKeansburg on 3/20 (L Goodrich).

A pair of **Bonaparte's Gull** was at LD on 3/28 (TC), and single was seen there on 3/29 (B Clauser). For the third year in a row, an **E. Phoebe** was seen in Jan. at LD, and it continued to be observed throughout the quarter at this location (m.obs). **Pine Warbler** arrived maybe a few days early to the Owl Cr. watershed area on 3/24 (M Ward). Two **Palm Warbler** arrived at the end of the first quarter at SAL on 3/27 (TC). **Horned Lark** made a good showing in the county with a high count of 300 on 2/5 (TC) in the Lewistown Valley (LV). Small groups of up to 12 **Snow Bunting** were seen on a number of dates in this area. A

pair of **Lapland Longspur** was seen in LV on 2/5-2/6 (TC, BJ) and a single was seen here on 2/21 (TC).

A few of the northern finches were observed, with **Pine Siskin** and **Purple Finch** being seen throughout the first quarter and at a number of locations. A flock of 25 **C. Redpoll** was seen at HMS on 115 (ST). Two separate flocks of about 50 **C. Redpoll** were at the Oneida strip mine area on 1/25-1/26 (A Gregory), and a group of 8 were in the Shenandoah area on 1/29 (DK).

Somerset County

Ducks and finches were a poor showing for the winter and early spring. But the Yough R. at Confluence had its normal nice variety of mid-winter waterfowl (A Marich). A flock of Southern James Bay Population **Canada Geese** wintered near Rockwood (AM). The flock was tracked and identified by a collared bird initially banded east of Moosonee, Ontario, on 7/4/98.

Rare for our county, 6 **Black Vulture** flew over Payne's house on 3/24 (LP). **Ls. Yellowlegs** was early on 3/19 (J&L Payne). **Pectoral Sandpiper** was early as well on 3/19 (J&LP). Thirty was a high count for **C. Snipe** on 3/19 (J&LP). Three **Long-eared Owl** were at a roost until early Feb. (S Bastian). **E. Phoebe** arrived on 2/26 (LP).

N. Shrike (adult) was seen on 1/23-27 (R Musser, J&LP) and another about ten miles away a few days later (SB). **C. Raven** enjoyed nesting success at a variety of locations (AM, JP). **Tree Swallow** were early on 3/25 (JP). **Lapland Longspur** and **Snow Bunting** were noted at several locations from early Jan. to mid-Feb. (SB, J&LP).

Sullivan County

Waterfowl presence was generally expected as to species and arrival dates. Exceptions included 19 **Tundra Swan** heralding in the New Year over Mildred on 1/1 (J&B Exley) and not recorded again until 33 were found on Hunters L. on 3/12 (N Kerlin). A pair of **Oldsquaw** put in a rare appearance also at Hunters L. on 3/11 (NK). **Canada Goose** made a major movement north on 3/1 with thousands sighted in numerous flocks throughout the county (v.o.).

Bald Eagle occurred on 3/6 in Cherry Twp (J Loper) and Hunters L. on 3/18 (NK). A rare sighting of a **Golden Eagle** was noted in Eagles Mere on 3/4 (F Crafts). A **Carolina Wren** remained at an Eagles Mere feeder until 1/25 (H Remoff). A flock of up to 22 **Snow Bunting** took advantage of a feeder at Sullivan Elementary School in Laporte from beginning of the quarter until 3/19, to the delight of students and teachers (L Worthington). **C. Redpoll**, **Pine Siskin**, and **Evening Grosbeak** were spotty in distribution and numbers throughout the quarter. Maximum numbers never exceeded 30 individuals at a time and most were in the half dozen range at feeders (v.o.).

Susquehanna County

Bill Reid had the following observations in Springville Twp: First **Great Blue Heron** on 3/21 and first **Wood Duck**, 3, on 3/11. Two **Green-winged Teal** on 3/11, with a high of 11 on 3/31. Six **Am. Wigeon** on 3/13 to 2 on 3/23. First **C. Merganser** were 6 on 3/11.

First **Turkey Vulture** on 3/24. 4 **Killdeer** noted 3/11. Five **C. Snipe** on 3/21 to 4 on 3/28. First **E. Phoebe** noted 3/24.

22 **Horned Lark** on 2/21. 50 **Am. Tree Sparrow**

found 2/16. First **Tree Swallow** were 5 on 3/24. 40 **Snow Bunting** on 2/11.

Tioga County

The nesting pair of **Bald Eagle** in the Pine Creek Gorge were present most of the quarter. Sitting on nest began somewhere between 2/19 (not there) and 2/26 (sitting). Two young hatched about 4/5 (C Dillon). The nesting pair at Hammond L. was observed simultaneously near the nest on 3/4 (R Ross).

Venango County

The new millenium began with a productive first quarter. In comparison with 1999, a total of 70 spp. was recorded in Jan., down from 82; but Feb. produced 77 spp. compared to 54 a year ago, and the March total soared to 98 spp. compared to 81. The total for the quarter was 107, up about 10% from 98 last year.

Highlights included early **Ruddy Duck** (1/1); **Wood Duck** (1/1) and **Green-winged Teal** (1/29) records; 15 **Redhead** on the Allegheny R. beginning 1/29; a **Merlin** at the Franklin hospital parking lot from 1/27-2/3 (J Stanley).

Long-eared and **Saw-whet owls** were present 2/20 to 3/11 and 2/28 respectively and **N. Shrike** were seen in several locations from 2/1-26.

Seven **Carolina Wren** were recorded 1/2 possibly indicating a close to full recovery from prior harsh winters. **Golden-crowned Kinglet** were scarce the entire quarter but **Am. Robin** were almost abundant. Walt Fye reported a rare winter record **Hermit Thrush** at Kahle L. (1/24) and a **N. Mockingbird**, not recorded annually, was seen near Utica 2/23 (G Edwards, R States). Both **Song** and **White-throated sparrow** numbers appear to be down. Ten **White-winged Crossbill** were located in Franklinn on 2/17. **Evening Grosbeak** were recorded early (1/2) but thereafter went unrecorded.

Warren County

One **C. Loon** on the Allegheny R. in Warren (Wa) 1/8 (T Grisez, D Watts). Ten **Double-crested Cormorants** flying downriver through Wa 1/6 (DW).

Tundra Swan include 115 flying near Tidioute 2/29 (J King), 3 at Chapman SP 3/5 (TG), 8 over Wa 3/6 (S Grisez), and 125 over Saybrook (Sa) 3/6 (C&M Neel). Three **Mute Swan** at Starbrick (St) through the period (vo).

An **Am. Wigeon** at St 3/3 (TG). Ten **Redhead** at St 2/4 (B Hill, A Morrison). Four **Ring-necked Duck** at St 2/25 (J Schultz), and 27 **Oldsquaw** there 3/27.

Ten **Turkey Vulture** near Russell, 12/26 (BH, Q Strandburg). A very early **Osprey** along the river in Wa 2/18 (TG). (I could clearly see the diagonal lines made by the black tips of the underwing coverts.) Four **Bald Eagle** along the river between Wa and the *Forest* line 1/8 (DW, TG). A **N. Harrier** in the Lander (La) area 3/15 (TG). A **Sharp-shinned Hawk** hung around a feeder at Sa Jan. into Mar., and a **Cooper's Hawk** in the area 2/25-26 (C&MN). Two **Red-shouldered Hawk** near St 2/12 (B Watts, DW). Three **Rough-legged Hawk** at La 3/13 (TG).

Two **Am. Coot** in Wa 2/18 and 6 2/20 (TG). Seventeen **Bonaparte's Gull** at St 3/29 (DW).

A **Yellow-bellied Sapsucker** used a feeder at Sa from Dec. to Mar. 16 (C&MN). Three **C. Raven** continued to come into Wa for bread (B Highhouse), and three (the same?) were being chased by crows just outside of Wa 3/8

(TG).

A **N. Shrike** on State Line Rd 1/2 and 2/20, and 1 in Chandler Valley 2/12 (BW, DW).

Nine **Rusty Blackbirds** at Akeley Swamp 3/8 (BH, AM). Two **White-winged Crossbill** at St 2/15 (JS), and 4 near Russell 3/13 (B Nelson). About 40 **C. Redpoll** on Hatch Run 3/13 (J Palmer). **Pine Siskin** at Sa Jan-Mar with a max. of 100 1/9 (C&MN). **Evening Grosbeak** through the period at Sa with a max. of 35 in Jan. (C&MN), and 10 in Wa 3/7 (C MacKenzie).

Washington County

The following were reported by Bill Hintze and Ken Behrens at SGL-117 on 1/30 while investigating the megarost found by Chuck Tague: **Red-shouldered Hawk**, 3 **Cooper's Hawk**, ± 150 **Ring-billed Gull** flying towards the landfill, **Yellow-bellied Sapsucker**, **Brown Creeper**, **Eur. Starling** (I've forgotten what Ken guessed: many thousands anyway), 3 **Golden-crowned Kinglet**, thousands of **Am. Robin** (Ken may know), **E. Towhee**, ± 10 **Am. Tree Sparrow**, ± 10 **White-throated Sparrow**, ± 40 **Red-winged Blackbird**, ± 1500 **C. Grackle** (this may be the count from a second visit; in any case there were lots of grackles on 1/30).

I wonder if the icterids are also feeding at the Pittsburgh landfill. Almost all seem to come in from the east. On a second trip I stood on the west edge of the megarost (Ken stood on the east edge), and counted jillions of startlings and robins (12,000 robins, if I remember correctly), but only 10 grackles and no blackbirds - unless I missed them!

On 2/23 my wife and I went out and there were 3 **Am Woodcock** displaying at dusk.

Westmoreland County

With more than the usual amount of open water available to them this quarter, many species of waterbirds could be found wintering or were recorded earlier than usual as migrants. An early **C. Loon** was at Saltsburg 2/25 (L Hess) Bob Shaw had a blue morph **Snow Goose** at Trout Run Res. 3/23, and found the first northbound flock of 30 **Tundra Swan** over Ligonier 2/23. The **Ross' Goose** found on the Bushy Run CBC was still at Beaver Run Res 1/1 (M McConaughy). Two early **Blue-winged Teal** were at Trout Run 3/12 (Westmoreland Co. Bird Club outing), while 4 **N. Shoveler** were on Derry L. 2/26 (MM). Both **Canvasback** and **Redhead** had reached the Ligonier Valley 2/20 (B Leberman). A **Gr. Yellowlegs** near Mammoth 2/27 (MM) was early for this area.

An **Osprey** had returned to Donegal L. 3/27 (BL), and I or 2 **Bald Eagle** frequented Beaver Run much of Jan. and Feb. (MM). **Golden Eagle** were at Acme 2/6 (J Gruber) and Ligonier 3/20 (BL). **N. Goshawk** was a good find at Mutual wetlands 3/18 (MM). A **N. Shrike** remained in the Mammoth area most of the period (m.ob.). At Crabtree **Horned Lark** peaked at 300 2/5 (MM). A very early **N. Rough-winged Swallow** was near Latrobe 3/23 (T Vechter). A **Townsend's Solitaire** found by McConaughy near Slickville 1/15, unfortunately could not be relocated on later searches. The **Spotted Towhee** discovered at Export during the Bushy Run CBC at Joe Corsales' feeder continued to be seen well into March (m.ob.)

Wyoming County

Snow Goose seen on 1/7 at L. Carey was an adult blue morph. Phelps Swamp continues to be taken over by **Canada Geese** to the detriment of ducks and marsh birds. On 3/3 there were 17 geese there in the samll area which was unfrozen. Of the 17, 14 in pairs—not a good sign for other birds to arrive later.

Several species of ducks remained into Jan. (most at L. Carey before it closed tight wiht ice) and are thus listed for latest dates as well as arrival dates in March. These include **Wood Duck, Gadwall, N. Pintail, Green-winged Teal** and **Hooded Merganser**.

An extremely early bird was a **Gr. Yellowlegs** found on 2/28 in a flooded field along the Susquehanna R. in Eaton Twp.

A ♂ **Purple Martin** at Sordoni's farm on 3/30 was extremely early.

Am. Tree Sparrow seemed to leave very early. Latest date was 3/16. I looked for them unsuccessfully after that date.

On 1/7 I saw a flock of ± 80 **Cedar Waxwing** along Rte 29 in Tunkhannock Twp. As they flew directly overhead into a tree near me, one bird appeared considerably lareger than the others. Unfortunately, in the 3-4 minutes they were in the tree, I could not pick it out. Possibly it was a Bohemian Waxwing, but we will never know.

York County

Fourteen **Double-crested Cormorant** were aat Codorus SP (CSP) on 3/31 (P Robinson). **Black-crowned Night-Heron** started to return to Kiwanus L. rookery on 3/16 and R. Erb found 2 **Yellow-crowned Night-Heron** with them. For part of Feb. about 1000 **Snow Geese** settled on Owen Blum's farm pond near Shrewsbury.

A **Peregrine Falcon** was at L. Redman on 2/5 (D Wildasin). As many as 4 **Short-eared Owl** continued their stay at Long Arm Dam through Jan. (m.obs.). **N.Saw-whet Owl** was reported throughout the quarter, with 24 banded in March. Two were recoveries from W.Va. (B Fortman, R Phillips).

E. Phoebe was numerous during March. The **N. Shrike** found by Dan Heathcote on 12/30 was seen my many on 1/1. An estimated 250 **Horned Lark** were seen at a farm on Flickinger Rd 1/28 (PR). The 22 **Tree Swallow** at CSP on 3/6 set a new early record (PR). Good numbers of **Am. Robin** continued to seen seen. A **Gray Catbird** was at CSP 1/29 (K Lippy, C Krenzer). A **Brown Thrasher** was at the home of J&L Downs near Wrightsville.

There were two different sightings of **E. Towhee** in Jan. A new early date for **Chipping Sparrow** was 3/11 near Ski Roundtop (J Pheasant). An elusive **Vesper Sparrow** was seen 3/9. **Lapland Longspur** was noted at two different locations in Jan. (PR, BF). As many as 70 **Snow Bunting** near Smith Station on 1/8 (KL, PR). Thirty **Rusty Blackbird** were in the Ski Roundtop area on 3/9 (JP). On 2/2 a **Baltimore Oriole** showed up at F&N Clark's feeder in Hanover.

ERRATA

This table was inadvertently omitted from last issue's Fall Hawk Migration Report.

Table 1. Watchsites reporting counts for autumn 1999.

Watchsite	County	Hours of Observation
Allegheny Front	Bedford	719
Brady's Bend	Clarion	253
Council Cup	Luzerne	138
Hawk Mountain	Berks	1129
Jack's Mountain	Mifflin	263
Little Gap	Northampton	789
Militia Hill	Montgomery	448
Rocky Ridge	York	158
Second Mountain	Lebanon	1077
Sterrett's Gap	Perry	147
Stone Mountain	Huntingdon	381
Tuscarora Summit	Fulton	425
Waggoners Gap	Cumberland	1094
Broadwing SEPT	Bucks	469

Seasonal Occurrence Tables - January through March 1999

A summary of frequently reported species with arrival/departure dates and high counts

HOW TO READ THE TABLES

The species listed in the following tables represent the “expected” species in most areas. The following 26 species, permanent residents that occur in **almost** every county, are not included.

Ruffed Grouse, Ring-necked Pheasant, Wild Turkey, Rock Dove, Mourning Dove, Eastern Screech and Great Horned owls, Belted Kingfisher, Red-bellied, Downy, Hairy, and Pileated woodpecker, Blue Jay, American Crow, Tufted Titmouse, White-breasted Nuthatch, Carolina Wren, Eastern Bluebird, Northern Mockingbird, Cedar Waxwing, European Starling, Northern Cardinal, Song Sparrow, House Finch, American Goldfinch, and House Sparrow

Not all of the above are “permanent residents” in the strictest sense. Kingfishers, for example, will leave an area if all of the open water freezes up. Blue Jays migrate, but since Pennsylvania is in the center of their summer and winter ranges, they are present year round. Comments on the above species can be found in either the *Summary of the Season* or *Local Notes*.

All other reported species can be found in the *Birds of Note* section.

CODES

The codes used in the tables are as follows:

A = Present All quarter. This species was present from the first day of the quarter through the last day of the quarter. This could refer to individual birds or the species as a group.

P = Present Part of the quarter. This species was present, but specific dates are not available.

R = Permanent Resident. This species breeds and is present year round in this county.

L = Late or Low. An L after a date indicates an unusually late date. An L after a number indicates an unusually low number.

H = High. An H after a number indicates an unusually high number.

E = Early. An E after a date indicates an unusually early date.

- = An arrow before a date indicates the species was present from the beginning of the quarter to at least that date.

An arrow after a date indicates the species was present starting with that date and through the rest of the quarter.

() = Numbers in parentheses indicate high counts for the season. No number means only 1-3 individuals or no number was reported.

***** = Something noteworthy. Comments about the record may usually be found in the Local Notes section.

sp. = Species unknown, such as Scaup.

A comma between dates indicates that the species was not present during that interval.

A blank does not necessarily mean that the species does not occur in that county, just that no reports were received by the compiler for that species.

EXAMPLES:

2/27-3/6(24)-3/30 means the species was first reported on 2/27 with a high of 24 on 3/6 and last reported on 3/30.

1/6-3/22(250)- means the species was first reported on 1/6 with a high of 250 on 3/22 and present through the rest of the quarter.

-1/5,3/15- means the species was present up to 1/5 then returned on 3/15 and was present through the rest of the quarter.

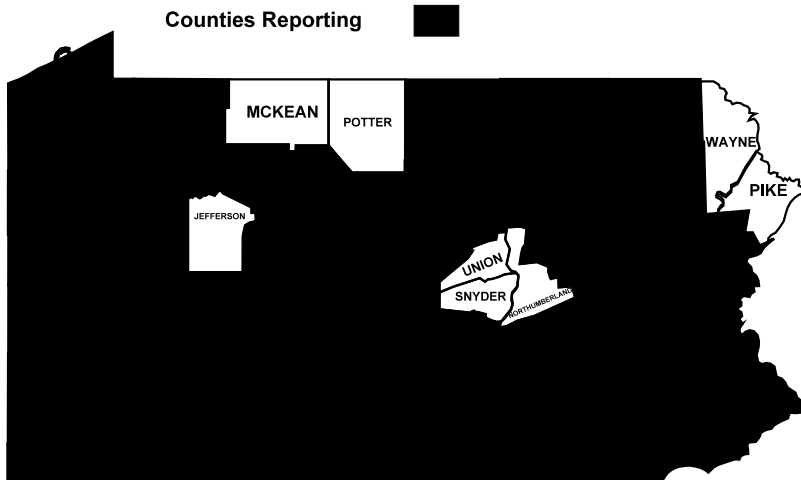
5/6- means the species was first seen on 5/6 and remained the rest of the quarter.

A-5/6(25) means the species was present all quarter with a high of 25 on 5/6.

9/4E means the species was reported on 9/4, which was early for this county.

1/15-2/26(300H)- means the species was first reported on 1/15, with a high count of 300 on 2/26, which was unusually high for this county. †

COUNTIES REPORTING - JANUARY TO MARCH 2000



SEASONAL OCCURRENCE TABLES - JANUARY THROUGH MARCH 2000

	ADAMS	ALLEGHENY	ARMSTRONG	BEAVER	BEDFORD	BERKS	BLAIR	BRADFORD	BUCKS	BUTLER
LOON, COMMON	3/24	-	3/26→	3/10	-	→1/26,3/31→	3/25	-	-	3/10-26(9)→
GREBE, PIED-BILLED	3/15→	A	2/12→	A	3/11→	→1/2,3/13→	1/1	-	1/15→	→1/15,3/11(7)→
HORNED	-	3/11→	3/17-19(4)	-	-	3/9→	3/11	-	3/2→	3/10-11(22)→
CORMORANT, DOUBLE-CRESTED	3/29	3/14→	-	-	-	3/26→	3/25(5)	-	-	3/18→
HERON, GREAT BLUE	R	R	A-1/1(3)	-	R	R	R	-	R	2/27→
EGRET, GREAT	3/27→	-	-	-	-	-	-	-	-	-
VULTURE, BLACK	R	-	-	-	-	R-1/30(15)	-	-	R	-
TURKEY	R	3/29→	2/27→	2/28→	2/24→	R-3/6(70)	2/27→	2/25→	R	2/25-3/15(38H)→
GOOSE, SNOW	1/16(3)	-	-	-	-	A-2/24(10000)	3/10	-	A	-
CANADA	R	R	R-2/12(364)	R	R-1/14(67)	R	R	R-1/21(150)	-	-
SWAN, MUTE	-	3/24	-	-	-	R	-	-	-	-
TUNDRA	3/25(4)	3/4(25)	3/19(3)	3/4(4)	3/4-11(42)	1/16-3/12(38)-19	3/4-6(600)	2/29-3/11(30)	R	1/18-2/21(90)-3/13
DUCK, WOOD	3/6	R	3/26(14)→	2/16→	1/14	→1/8,3/4→	R	-	R	→1/9,3/7(37)→
GADWALL	-	1/31	-	3/16	-	A-1/30(71)	-	1/11(10)-3/8	1/15-3/25	2/26E-3/10(10)→
WIGEON, AMERICAN	2/13	1/31-2/10	3/19(8)	2/22(5)-3/16	→3/11(9)	→1/2,2/23→	-	-	2/22→	→1/1(10),3/10→
DUCK, AMERICAN BLACK	A-1/23(15)	A-2/10(8)	2/19	A	1/14(4)	A	3/30	A-3/8(37)	R	→1/15,3/3-11(22)→
MALLARD	R	R	R-2/12(36)	R	R-1/14(16)	R	R	R	R	2/20-3/11(30)→
TEAL, BLUE-WINGED	3/25→	-	-	3/16(5)→	-	3/15→	-	-	3/15→	3/17(6)
SHOVELER, NORTHERN	1/16-3/25	-	-	-	3/11(8)	3/23(6)	-	-	2/13-3/12(5)	2/25-3/11(8)-26
PINTAIL, NORTHERN	3/6(85H)-25	2/15	-	-	3/4-11(6)	A-2/27(295)	-	-	A	→1/2,2/25-3/4(15)→
TEAL, GREEN-WINGED	3/6(6)→	1/31	3/19(23)	2/27(4)-3/19	-	A-3/21(10)	1/9	-	A	3/11(22)→
CANVASBACK	-	1/29-2/19	2/12	2/6(3)	3/11	→1/14,3/9(15)→	-	-	1/22-2/26	→1/2(6),3/18
REDHEAD	-	1/29-2/19	-	2/6(3)-3/19	-	3/12	-	-	1/30-2/7	2/26-3/18(5)
DUCK, RING-NECKED	2/13-3/25(42)→	2/29(8)→	1/24-3/2(18)→	2/6-3/16	3/4(71)-11	A-3/19(330)	-	3/1-22(100)	A	→1/1,2/25-3/11(310)→
SCAUP, GREATER	3/25	1/31-3/27(15)	3/26(15)	2/22(7)	3/11(42)→	3/5-12(13)→	-	-	1/15-3/25	→1/1,3/10(25)→
LESSER	-	-	2/12→	-	-	1/16	-	-	-	3/7-31
OLDSQUAW	-	-	-	-	-	-	-	-	-	-
BUFFLEHEAD	-	A-3/12(8)	2/12-3/19(5)→	2/6(9)-3/16	2/26	A	3/11	-	A	2/25-3/26(64)→
GOLDENEYE, COMMON	-	→3/24	-	2/6(4)-3/16	-	1/7	-	-	-	→1/15,3/3(4)→
MERGANSER, HOODED	3/2	A-1/16(29)	2/27-3/26(4)→	2/6-3/16	2/26-3/8(5)	→1/9,3/12(9)→	-	3/18	A	→1/15(6),2/25-3/11(29)→
COMMON	3/29	1/4-2/15	2/12(12)-3/2	2/6(5)	3/4	A-3/12(800)	3/11	R-3/1(50)	R	3/12-26(4)
RED-BREASTED	3/29	3/11→	3/19-26(40)→	2/22-3/10(6)	3/4	3/5-12(13)-28	03/11	-	R	3/1-11(300)→
DUCK, RUDDY	3/29(5)	-	3/26	2/22(4)	-	3/4-3/1(60)→	1/1	-	A	→1/1(80),2/25-3/26(130)→
OSPREY	3/29	-	-	-	-	3/26→	3/25	-	3/13→	3/26→
EAGLE, BALD	-	-	-	2/6	-	→1/12(5),3/3→	-	-	2/28-3/2	R(4)
HARRIER, NORTHERN	1/16→	-	A	2/11→	1/14	A	1/15	-	A	1/24-2/20
HAWK, SHARP-SHINNED	R	R	R	-	-	R	R	R	R	A
COOPER'S	R	R	R	-	-	R	R	R	R	R
GOSHAWK, NORTHERN	-	2/17	-	-	-	1/5-2/2	2/12	-	-	3/7-25
HAWK, RED-SHOULDERED	R	R	-	-	2/26	A	3/18→	-	-	3/18→
BROAD-WINGED	-	3/31→	-	3/30	-	-	-	-	-	-
RED-TAILED	R	R	R-2/26(5)	R	R	R	R	R	R	R
ROUGH-LEGGED	→1/23	2/16-18	-	2/11	-	→2/12(4)-19	→2/11	-	→3/25	1/28-2/19
EAGLE, GOLDEN	-	-	-	-	1/29	1/12-28	-	-	-	-
KESTREL, AMERICAN	R	R	R	-	R	R	R	R	R	R
MERLIN	-	A(4)	-	-	-	1/26→	-	-	A	3/26
FALCON, PEREGRINE	-	R	-	-	-	-	-	-	R	-
COOT, AMERICAN	A	A-1/8(16)	2/12-3/26(24)→	A	1/14-3/11(14)→	R	1/1	-	A	3/11-26(110)→
KILLDEER	R	2/24→	2/24-27(4)→	3/16→	2/23→	A	2/23→	3/8→	R	2/20→
YELLOWLEGS, GREATER	-	-	-	-	-	-	-	-	-	3/26→
LESSER	-	-	-	-	-	-	-	-	3/13	-
SNIPE, COMMON	A	A-3/10(3)	-	-	-	A	-	-	A-3/27(27)	3/10-MAR(7)→
WOODCOCK, AMERICAN	2/24→	2/23→	2/29(7)→	2/27→	3/24→	2/29→	2/24→	2/22E→	1/20→	2/23→
GULL, BONAPARTE'S	-	3/11-12(66)→	-	-	3/11(5)	→1/1,3/28→	3/25(3)→	-	1/17(15)	1/15-3/31(75)→
RING-BILLED	A	A-1/29(350)	2/12-3/5(15)→	→2/22	3/11(27)	A	1/9→	3/1-5(70)-8	A	2/11-3/1(300)→
HERRING	-	R	-	→2/22	-	A	-	-	A	1/1-3/26(5)
ICELAND	-	-	-	-	-	1/7	-	-	1/22-3/25	-

SEASONAL OCCURRENCE TABLES - JANUARY THROUGH MARCH 2000

	ADAMS	ALLEGHENY	ARMSTRONG	BEAVER	BEDFORD	BERKS	BLAIR	BRADFORD	BUCKS	BUTLER
LESSER BLACK-BACKED	-	-	-	-	-	A-2/26(3)	-	-	A	-
GREAT BLACK-BACKED	-	1/1-2/6	-	-	-	A-1/6(5)	-	-	A	-
OWL, BARN	R	-	-	-	R	R	-	-	R	-
BARRED	R	R	R	R	R	R	R	R	R	R
LONG-EARED	-	-	-	-	-	1/23-2/5(5)→	2/2	-	A	3/13
SHORT-EARED	A-1/22(6)	-	-	-	-	-	-	-	1/23-2/13	1/19
NORTHERN SAW-WHET	1/17	-	-	-	3/5	1/30	3/7	-	R	JAN-FEB(6)
WOODPECKER, RED-HEADED	R	-	-	-	-	R	R	-	R	-
SAPSUCKER, YELLOW-BELLIED	A	A	3/23	3/30	-	A	1/20	-	1/20	-
FLICKER, NORTHERN	R	R-1/9(12)	A	3/2→	R	R	R	R	R	A
PHOEBE, EASTERN	3/7→	3/24→	3/19→	3/16→	3/10→	3/8→	3/9→	3/8→	1/11→	3/10→
SHRIKE, NORTHERN	-	-	-	-	-	→3/7	-	-	→3/5	-
CROW, FISH	-	-	-	-	-	R	-	-	R	-
RAVEN, COMMON	R	-	-	-	R	R	R	-	-	-
LARK, HORNED	A-2/5(60)	A-3/10(3)	-	-	R	A-2/20(1000)	R	R-2/9(8)	A-1/30(105)	A
SWALLOW, TREE	3/25(12)→	-	-	-	3/31→	3/17(20)→	3/25→	-	3/7→	3/7E-27(150)→
NORTHERN ROUGH-WINGED	-	-	-	-	-	3/29→	-	-	3/27→	-
BARN	-	-	-	-	-	-	-	-	3/30→	3/31→
CHICKADEE, CAROLINA	R	R	-	R	-	R	-	-	R	-
BLACK-CAPPED	A	R	R-3/26(10)	R	R	R	-	-	R	R
NUTHATCH, RED-BREASTED	→3/28	A	A	A	-	A	1/20	-	→3/3	A
CREEPER, BROWN	A	A-3/28(4)	A	A	3/12→	A	R	-	-	A
WREN, WINTER	A	A	3/26	-	-	→1/25	A	-	→3/4	-
KINGLET, GOLDEN-CROWNED	A	A-3/31(10)	A-3/26(6)	A-2/6(3)	-	A	A	R	A	A
RUBY-CROWNED	3/25→	-	-	-	-	3/5→	-	-	1/22	3/31→
HERMIT	A	1/1	-	-	-	→2/20	-	-	→3/25	A
ROBIN, AMERICAN	R	R-1/8(1500)	R-3/10(78)	-	-	R	R-2/16(100+)	3/8→	R	A-1/22(850)
CATBIRD, GRAY	-	-	-	-	-	-	-	-	A	-
THRASHER, BROWN	-	-	-	-	-	-	-	-	1/27→	-
PIBIT, AMERICAN	A-3/15(4)	-	-	-	-	-	-	-	1/14(40)	3/12(8)
WARBLER, YELLOW-RUMPED	A	A-1/9(25)	-	-	-	A	-	-	A	P
PINE	3/31→	-	-	-	-	3/9E→	-	-	1/18→	-
TOWHEE, EASTERN	3/15→	1/22→	-	1/31→	3/26→	A	-	-	R	A
SPARROW, AMERICAN TREE	→3/12(10)	→2/13	A-1/28(50)	A	A	→3/1(6)	A-1/2(38)	→2/13	A	→1/28(35)-3/11
CHIPPING	3/27→	3/28→	3/26→	3/26→	3/25→	→1/13,3/21→	3/25→	-	3/29→	3/29→
FIELD	2/10→	3/5→	2/6→	2/6→	-	3/29→	3/10→	-	R	3/25→
SAVANNAH	-	-	-	-	-	2/13	-	-	R	-
FOX	A	A-3/29(4)	-	3/10→	2/27	A	2/26-3/7(9)→	-	A	2/13
SWAMP	-	1/1	-	2/6(6)→	-	A	R	-	R	2/27→
WHITE-THROATED	A	A-3/4(25)	A-1/25(4)	A-2/6(6)	-	-	A	A	A	A-1/22(50)
WHITE-CROWNED	A	2/6-3/13(12)→	-	-	-	-	-	-	A	1/28(13)
JUNCO, DARK-EYED	A	A	A-3/23(18)	A	A-2/26(25)	A	A	R	A	A
LONGSPUR, LAPLAND	-	-	-	-	-	→2/20(12)	-	-	2/5-7	-
BUNTING, SNOW	R	A-2/29(8)	2/26-3/10(80)→	2/16→	-	→1/30(600)-2/20	A	→2/19(150)	-	-
BLACKBIRD, RED-WINGED	R	A-2/29(8)	3/10→	3/7	2/26(65)→	→1/30,2/20→	2/26→	3/1→	R	2/25→
MEADOWLARK, EASTERN	A	3/10→	-	-	-	1/30→	3/8→	-	R	2/23→
BLACKBIRD, RUSTY	1/29(5)-3/25	2/6(200)→	2/16→	2/16→	2/26(36)→	1/30-2/6(22)-21	2/6→	-	2/2→	-
GRACKLE, COMMON	R	2/6(200)→	2/27-3/1(24)→	2/16→	-	→1/2,2/25→	2/6→	3/8→	R	2/24→
COWBIRD, BROWN-HEADED	R	2/19(4)→	-	2/16→	-	R	3/6→	-	R	3/3→
FINCH, PURPLE	3/25→	2/27→	-	3/8	-	A	1/2(14)	A-2/11(6)	R	R
REDPOLI, COMMON	-	1/31-2/20	-	1/26-3/14	-	1/5(25)	-	→2/16(300)-3/8	2/3	1/19-2/2(21)
SISKIN, PINE	3/17(12)-29	-	-	-	-	A	1/15(17)	-	-	-
GROSBEAK, EVENING	-	-	-	-	-	-	3/1(5)	-	-	-

SEASONAL OCCURRENCE TABLES - JANUARY THROUGH MARCH 2000

	CAMBRIA	CARBON	CENTRE	CHESTER	CLARION	CLEARFIELD	CLINTON	COLUMBIA	CRAWFORD	CUMBERLAND
LOON, COMMON	3/24-31	1/2	3/6→	-	3/22→	3/28	-	-	-	3/28
GREBE, PIED-BILLED	3/31(12)	A	3/6→	A-3/15(5)	3/9-22(3)→	3/28	3/16	3/31	R-1/8(10)	3/28→
HORNED CORMORANT, DOUBLE-CRESTED	-	A	3/6-30(85)→	-	3/12-22(41)→	3/28	1/14	-	3/11(38)	3/26(4)→
HERON, GREAT BLUE	A	A	A	3/7	3/29(6)	-	-	R	3/11-19	P
EGRET, GREAT	-	-	3/28→	A	-	3/28	A	R	R-3/11(3)	A
VULTURE, BLACK	-	-	-	-	-	-	-	-	-	-
TURKEY	3/12→	R	2/25→	R	1/16E-3/12(4)→	3/28	3/5-14(26)→	1/23→	3/8(9)→	R
GOOSE, SNOW	R	3/4(21)	-	R	1/15(4)	-	-	-	1/8(3)-2/25	-
CANADA SWAN, MUTE	R	3/5	-	R	1/2-2/25(1200+)→	3/28	R-1/24(300)	R	R-2/12(22500)	R
TUNDRA	1/8-3/12(650)→	-	3/2→	3/8-25	2/25-3/5(18)	-	3/5-17(9)	3/13	3/11-26	-
DUCK, WOOD	3/10(5)→	2/26→	3/8→	2/25→	1/1L(47),3/6(650+)→	-	A-3/16(21)	R	A-3/16(100)	-
GADWALL	-	-	-	1/8	3/6→	-	-	-	A-3/11(6)	P
WIGEON, AMERICAN	3/11(4)	2/5(3)→	-	A-3/8(32)	3/18(7)→	-	3/16	-	A-3/19(36)	-
DUCK, AMERICAN BLACK	2/29(21)→	R	P	A-3/5(15)	R	3/28	R-2/22(100)	R	2/26-3/19(897)	A
MALLARD	R	R	A	R	R	3/28	R-1/1(21)	R	R-1/1(3185)	R
TEAL, BLUE-WINGED	3/31→	-	3/6→	3/8→	-	-	-	-	-	-
SHOVELER, NORTHERN	-	-	3/5-18	3/8(5)	-	-	-	-	2/26-27(7)	-
PINTAIL, NORTHERN	3/19(35)→	3/12(5)	3/2-18	A-3/6(27)	-	-	3/9-16	-	3/11(276)	-
TEAL, GREEN-WINGED	-	3/12	-	3/17-25(22)→	-	-	3/11-16	3/8	3/11-19(1450)	-
CANVASBACK	2/29-3/17	A	2/5	3/1-7	-	-	-	-	1/15(12)-3/11	-
REDHEAD	-	A	2/5-3/17	→1/1,3/5	3/22	3/28	3/17	-	→1/8(26)-2/27	-
DUCK, RING-NECKED	3/11-19(85)→	→3/25(250)	3/2→	A-3/22(140+)	3/9-22(62)→	3/28	2/24-3/14(53)	3/6-13(25)→	1/8-3/18(5)	3/26(4)→
SCAUP, GREATER	-	A	3/9-17	→1/2	3/22(7)	-	-	-	→3/19(24)	-
LESSER	-	A	3/11-17	1/1-3/17(6)→	3/14(12)→	3/28	-	-	→3/19(24)	-
OLDSQUAW	-	3/12	3/26-31	3/12(3)	3/29→	-	-	-	3/11	3/26
BUFFLEHEAD	3/4→	A	3/5→	A-3/1(30)	3/6-22(9)→	3/28	2/20	-	3/5-19(90)	A
GOLDENEYE, COMMON	-	1/22	3/11	2/25-3/8	3/22→	3/28	1/8-2/22(40)	-	→1/8(60)	A
MERGANSER, HOODED	3/9→	A	A	2/25-27(46)-3/15	3/24→	3/28	3/8-26(5)→	-	→3/11(253)	A
COMMON	-	A	A	→3/1(112)-6	1/10(20)→	3/28	R-1/18(23)	R	A-3/5(80)	A
RED-BREASTED	-	3/25	3/8→	-	3/12(12)→	-	3/17	-	→3/19(35)	-
DUCK, RUDDY	3/19(17)→	A	3/15	A-1/2(40+)	3/9-26(60)→	3/28	-	-	→3/19(45)	-
OSPREY	-	-	3/30→	3/31→	-	-	-	-	-	3/27→
EAGLE, BALD	-	A	A	1/13-3/15	1/29,3/16→	-	2/6	JAN	R-1/1(14)	3/3
HARRIER, NORTHERN	A	A	P	A	R	-	1/14	R	A	A
HAWK, SHARP-SHINNED	R	R	R	R	R	-	R	R	A	R
COOPER'S	R	R	R	R	R	-	R	R	A	R
GOSHAWK, NORTHERN	-	1/26	2/27-3/10	-	1/29-3/31	-	R	-	-	-
HAWK, RED-SHOULDERED	A-2/29(3)	-	A	3/18	P	-	-	-	A	A
BROAD-WINGED	-	-	-	-	-	-	-	-	-	3/26→
RED-TAILED	R	R	R	R	R	3/28	R	R	R	R
ROUGH-LEGGED	2/12-3/12	→2/26	→3/4	-	→2/5(4)-3/13	-	1/24-2/21	→2/15	→2/13	-
EAGLE, GOLDEN	-	-	-	-	3/23	-	-	-	-	-
KESTREL, AMERICAN	R	R	R	R	R	3/28	R	R	R-3/11(5)	-
MERLIN	-	-	2/24-27	-	1/6	-	-	-	2/26	→3/3
FALCON, PEREGRINE	-	-	-	-	3/4	-	2/7	-	-	-
BOBWHITE, NORTHERN	-	-	-	R	-	-	-	-	-	-
COOT, AMERICAN	3/18(35)→	A	3/18→	A-1/2(150+)	3/7(15)→	3/28	3/1→	3/13→	→1/8(2500)	A
KILLDEER	A	2/24→	A	R	3/12(10)→	3/28	-	-	2/25-3/19(8)→	A
YELLOWLEGS, GREATER	-	-	3/14	-	-	-	-	-	3/11-18(4)→	-
LESSER	-	-	-	-	-	-	-	-	3/11	3/26→
SNIPE, COMMON	-	3/11	A	3/8-25(6)→	3/22(4)	-	-	-	-	A
WOODCOCK, AMERICAN	3/12→	3/16)→	3/7→	3/8→	3/1-7(10)→	-	2/29→	2/23→	2/29→	-
GULL, BONAPARTES	3/10	3/25	3/28→	3/30	3/15(3)	-	-	-	3/18(3)	-
RING-BILLED	A	A	P	A-2/9(100+)	3/3-7(46)→	3/28	1/4-2/28(130)	-	→1/8(319)	A
HERRING	-	1/26	P	A	3/15	-	-	-	→1/8(60)	A

SEASONAL OCCURRENCE TABLES - JANUARY THROUGH MARCH 2000

	CAMBRIA	CARBON	CENTRE	CHESTER	CLARION	CLEARFIELD	CLINTON	COLUMBIA	CRAWFORD	CUMBERLAND
GREAT BLACK-BACKED OWL, BARN	-	-	-	2/27	-	-	-	-	-	A
BARRED	R	R	R	R	R	R	R	R	R	R
LONG-EARED	-	-	1/30-3/5	→3/11(3)	-	-	-	-	-	-
SHORT-EARED	-	-	-	-	→2/25	-	-	1/30	→1/19	-
NORTHERN SAW-WHET	1/13	-	MAR	→2/27	-	-	2/29-3/8(5)-26	-	-	A
WOODPECKER, RED-HEADED	-	-	1/15	-	-	-	-	-	-	-
SAPSUCKER, YELLOW-BELLIED	A	3/18	A	→2/8	2/21	R	R	2/2→	1/1	A
FLICKER, NORTHERN	A	R	A	3/24-28(5)→	R	R	R	R	R	A
PHOEBE, EASTERN	3/20→	3/11→	3/9→	3/8→	3/16→	3/28→	3/20→	3/16→	2/26→	3/9→
SHRIKE, NORTHERN	-	→2/26	→3/13	1/30-3/10	→2/27	-	-	1/30	→1/2	-
CROW, FISH	-	1/27→	A	1/29→	-	-	2/27→	R	-	R
RAVEN, COMMON	A	1/19	R	-	R	R	R	R	-	R
LARK, HORNED	A	1/3(50)	A	2/2(32)→	A-3/12(100's)	3/28	1/12-221(20)	R	→1/19(45)	R-1/24(300+)
MARTIN, PURPLE	-	-	-	-	-	-	-	-	3/26→	-
SWALLOW, TREE	3/25(15)→	3/23→	3/25→	3/15→	3/26(4)→	-	3/8→	3/15→	3/11(120)→	3/9→
NORTHERN ROUGH-WINGED BARN	-	-	3/30→	3/30→	-	-	3/28→	-	-	3/26→
CHICKADEE, CAROLINA	-	-	-	R	-	-	-	-	-	R
BLACK-CAPPED	R	R	A	→3/5	R-2/8(18)	R	R	R	R	R
NUTHATCH, RED-BREADED	-	A	A	A	A	A	2/19	A	1/1	A
CREEPER, BROWN	R	-	R	A	R	-	1/2-3/5	R	1/1	A
WREN, WINTER	-	-	-	-	-	-	-	-	-	A
KINGLET, GOLDEN-CROWNED	-	3/18	R	A	A-1/15(4)	3/28	-	3/26→	-	-
RUBY-CROWNED HERMIT	3/27→	-	A	A	-	-	-	-	-	-
ROBIN, AMERICAN	R	R-2/7(50)	A	→2/6	A	3/28→	3/7(9)→	R	A-3/18(1500)	A
CATBIRD, GRAY	-	-	→1/20	→1/22	-	-	-	-	-	-
THRASHER, BROWN	-	-	3/31→	-	-	-	-	-	-	-
PIBIT, AMERICAN	-	-	-	-	2/1-3/12(18)	-	3/17(70)	-	-	-
WARBLER, YELLOW-RUMPED	-	-	A	A-3/7(12)	-	-	-	-	1/8	A
PINE	-	-	3/19→	3/2→	-	-	-	-	-	3/12→
TOWHEE, EASTERN	-	-	3/28→	R	-	-	3/10→	-	3/18→	A
SPARROW, AMERICAN TREE	A	→2/12(25)	P	→3/5	→1/15(65)	-	→2/20(5)-3/20	→3/24	→2/13(30)-3/18	A
CHIPPING FIELD	-	-	3/30→	1/29(3)→	-	-	3/28→	3/25→	-	3/26→
FOX	3/2-30	2/26(5)	3/28	2/27-3/16(11)-20	-	-	-	3/17→	3/3-30	-
SWAMP	A	A	→1/20	A	-	-	-	P	A-1/23(5)	-
WHITE-THROATED	A	A	A	A-FEB(54)	→3/11	-	A	A	A	A
WHITE-CROWNED JUNCO, DARK-EYED	-	-	2/2	A-1/13(9)	-	-	3/3	-	1/1	A
LONGSPUR, LAPLAND	→1/20	A-2/12(31)	A	A-1/24(22)	-	-	A	R	1/15-16	→1/24(10)
BUNTING, SNOW	-	2/20(4)	-	-	→1/21(17)-2/5	-	1/12(21)	-	→1/29(15)	→1/24(50)
BLACKBIRD, RED-WINGED	A	2/26(16)→	2/26→	2/22-27(2000)→	A	-	2/25→	2/22(100+)→	2/25-3/11(3265)→	A
MEADOWLARK, EASTERN	3/25→	3/3→	-	3/15→	3/12→	3/28→	-	3/17(10)→	3/18(4)→	A
BLACKBIRD, RUSTY	-	3/7	3/26	-	3/12(30)	-	-	-	3/11(50)	3/26(7)
GRACKLE, COMMON	2/20(30)→	2/26→	3/28→	R	2/23(50)→	3/28→	2/23-3/9(7)→	2/23(10)→	2/24-3/11(150)→	A
COWBIRD, BROWN-HEADED	2/23(10)→	3/16→	P	R	1/2(400)→	-	3/23→	R	A-3/26(3)	A
FINCH, PURPLE	R	1/15	A	→3/19	A-2/7(24)	-	2/21-3/26	R	3/2	A
REDPOLL, COMMON	-	1/27(8)	2/20	-	→1/15(100+)-3/3	-	1/12-3/8(6)-10	→3/5(10)	→1/19(20)	-
SISKIN, PINE	-	1/1(20+)	A	-	→3/30	-	A-2/16(12)	-	→3/18	A
GROSBEEK, EVENING	-	-	1/9	-	A-1/20(15)	-	1/21	-	3/14(20)	-

SEASONAL OCCURRENCE TABLES - JANUARY THROUGH MARCH 2000

	DAUPHIN	DELAWARE	ERIE	FAYETTE	FOREST	FRANKLIN	FULTON	GREENE	HUNTINGDON	INDIANA
LOON, COMMON	3/31→	3/25→	P	-	1/8	-	3/30→	-	3/27→	-
GREBE, PIED-BILLED	3/19→	A-1/11(8)	A	3/11→	3/25	3/22→	3/8-30(6)→	3/8	A	2/29-3/28(6)→
HORNED CORMORANT, DOUBLE-CRESTED	2/27(5)→	-	3/12(2000)	3/12(4)→	-	3/22→	3/8-19(11)→	-	3/26	3/4-18(14)→
HERON, GREAT BLUE EGRET, GREAT VULTURE, BLACK	3/5→ A 3/15-26(35)→	P R 3/27→	A A -	- - -	- - -	R-2/3(28)	A	A	R	3/31→ A-3/26(5)
TURKEY	R	R	P	3/8→	3/15→	2/6(49)→	3/30(4)→	-	R	-
GOOSE, SNOW	2/29(100±)	2/22-3/24(30000)	01/09	-	-	R	2/26-3/8(9)→	2/18→	R	2/25-3/15(5)→
CANADA SWAN, MUTE	2/22→	R	R	-	3/20-25(34)→	R	R-1/8(83)	R	R	R-2/25(212)
TUNDRA	1/30-3/13(1100)→	2/25	P	1/8	-	-	-	-	-	1/9
DUCK, WOOD	2/24-29(120)→	-	A	1/8(5)	3/25(3)	3/11(7)	2/26-3/4(9)→	3/8	2/28-3/8(100)	2/23-3/7(217)→
GADWALL	A-3/25(30)	1/2	3/3E→	A-3/11(7)	3/20(7)→	R	2/26-3/4(9)→	3/8	2/27→	3/3-4(9)→
WIGEON, AMERICAN	2/27-3/4(15)→	-	P	3/12	-	2/1-3(12)→	1/8	3/8	2/9	3/4
DUCK, AMERICAN BLACK MALLARD	R R	R R	A A	- -	- A-1/6(5)	3/11 R	→1/8(4)-3/8 R-3/8(34)	3/8 R	A R	2/23-3/4(43)→ 2/25-3/7(56)→ A-3/1(67) 3/18→
TEAL, BLUE-WINGED SHOVELER, NORTHERN	3/19→	-	3/16E→	3/12(6)→	-	-	-	-	3/10→	-
PINTAIL, NORTHERN	2/27-3/19(300±)→	2/22(24)	P	3/11(5)	-	-	-	3/8	-	2/23-3/7(22)-18
TEAL, GREEN-WINGED	2/24-3/25(30)→	3/25(31)	2/27E(10)→	3/8(4)	-	A	A-3/30(4)	3/8	3/7→	2/25-3/11(40)→
CANVASBACK	2/19→	-	A	2/21	-	-	-	-	2/5	2/29-3/7
REDHEAD	1/29→	-	A	3/12(7)	-	-	2/27	-	2/4-12(32)	2/23-3/17(12)-18
DUCK, RING-NECKED	1/30-3/8(43)→	2/29(26)	A	2/21-3/11(197)	3/25(10)	3/11(11)→	A-3/8(20)	3/8	2/9→	2/25-3/4(141)→
SCAUP, GREATER	3/4(6)→	-	A	3/12-18(46)	3/25(17)	3/1-22(5)→	3/8-30(10)→	2/20	2/28(6)	2/29(16)→
LESSER OLSQUAW	2/6(4)→	1/11	A	3/8-18(12)	-	-	-	-	A	2/23-3/11(42)→
BUFFLEHEAD	A-3/4(100±)	-	P	-	-	-	-	3/8	A	2/29-3/28(14)→
GOLDENEYE, COMMON	A-2/13(32)	1/8-2/22	A	3/8	-	3/8	3/8	-	3/1-8	-
MERGANSER, HOODED	A	1/8(5)	A	2/12-3/18	-	3/13→	3/8→	-	R-3/12(42)	2/25-3/18(10)→
COMMON	A	A-2/26(80)	A	A	A-3/20(10)	-	-	-	→1/20(120)-3/24	2/23-3/25
RED-BREASTED DUCK, RUDDY	3/4(5)→ 3/4(7)→	- A-1/11(18)	A A	3/11-12(6) 3/8-12(30)	- -	- A-3/19(3)	3/19→ -	3/11 3/8	3/22→ 3/26	3/4-17(38)→ 3/4-31(25)→
OSPREY	3/25→	3/9→	3/5E→	-	-	P	-	-	3/31→	-
EAGLE, BALD	R	2/29-3/18	A	-	A-1/7(3)	-	-	-	R	1/5
HARRIER, NORTHERN	A	A	P	-	3/18	-	-	-	A	A
HAWK, SHARP-SHINNED	R	A	P	R	R	R	R	R	R	A
COOPER'S	R	R	A	R	R	R	R	R	R	A
GOSHAWK, NORTHERN	-	2/10	-	-	1/7	-	-	-	-	3/4
HAWK, RED-SHOULDERED	R	A-3/6(3)	P	R	-	-	-	3/8	R	A
RED-TAILED	R	R	R	R	R-1/7(7)	R	R	R	R	R-3/4(10)
ROUGH-LEGGED	→2/10	1/23-3/20	P	-	→3/18	2/4-20	-	-	→2/28	1/25-3/4
EAGLE, GOLDEN	-	-	-	-	-	-	-	-	2/17-3/24(10)	-
KESTREL, AMERICAN	R	R	R	R	R	R	R	R	R	R
MERLIN	1/2-15	-	1/2-3/13	-	-	-	-	-	3/14	-
FALCON, PEREGRINE	R	P	1/31-3/30	-	-	-	-	-	3/18	-
COOT, AMERICAN	A	A-1/2(14)	A	1/8→	-	2/11→	3/30(4)→	2/27	→1/31	2/25-3/14(159)→
KILLDEER	2/16→	R	MAR→	1/8→	3/20→	2/5→	2/26(8)→	2/18→	2/24→	2/24-3/4(12)→
YELLOWLEGS, GREATER	-	-	MAR→	-	-	-	-	-	-	-
LESSER	-	3/25(4)	-	-	-	-	-	-	-	-
SNIPE, COMMON	2/24-3/22(21)→	-	3/12→	3/11-18(13)	-	-	-	-	A-3/21(9)	-
WOODCOCK, AMERICAN	3/3→	FEB→	MAR→	-	-	2/24→	2/27→	3/5→	2/25→	2/25-3/9(5)→
GULL, BONAPARTE'S	2/29→	-	P	3/12	3/25	-	-	-	3/27(19)→	3/7-25(33)→
RING-BILLED	A-2/29(5000±)	A	A	2/23(12)-3/12	3/25(9)	P	2/26-3/1(26)→	-	A-3/10(400)	2/21-25(122)→
HERRING	A	A	A	-	-	-	-	-	-	-
ICELAND	-	-	2/11-3/30	-	-	-	-	-	-	-
LESSER BLACK-BACKED	-	-	1/30-3/2	-	-	-	-	-	-	-

SEASONAL OCCURRENCE TABLES - JANUARY THROUGH MARCH 2000

	DAUPHIN	DELAWARE	ERIE	FAYETTE	FOREST	FRANKLIN	FULTON	GREENE	HUNTINGDON	INDIANA
GREAT BLACK-BACKED OWL, BARN BARRED	A	A	A	-	-	-	-	-	-	-
LONG-EARED	R	-	R	R	R	R	R	R	R	R
SHORT-EARED	→1/14(7)-MAR	-	2/13→	-	-	-	-	3/5	-	→1/6(5)-2/21
NORTHERN SAW-WHET	→2/24	-	1/2→	-	-	-	-	-	-	-
WOODPECKER, RED-HEADED	2/10	1/9	3/29→	-	-	-	-	-	-	-
SAPSUCKER, YELLOW-BELLIED	2/26	-	MAR→	-	-	R	-	-	R	-
FLICKER, NORTHERN	A	R	MAR→	R	3/26→	R	-	A	A	A
PHOEBE, EASTERN	2/25→	3/15→	3/11→	R	3/24→	3/8→	3/7→	3/4→	3/8→	3/7-26(6)→
SHRIKE, NORTHERN	3/16	R	A	-	-	-	-	-	→3/5	1/22-3/18
CROW, FISH	R	R	-	-	-	R	-	-	3/8→	2/20→
RAVEN, COMMON	R	-	R	R	R	R	R	R	R	A
LARK, HORNED	A-1/23(100±)	-	P	R	-	R	R-1/22(32)	2/24→	P	A-1/23(200)
MARTIN, PURPLE	-	-	MAR→	-	-	-	-	3/24→	-	-
SWALLOW, TREE	3/3→	3/4-10(22)→	MAR→	3/18→	3/25(5)→	3/14→	3/8-30(23)→	3/24→	3/8→	3/25-28(6)→
NORTHERN ROUGH-WINGED BARN	3/25→	-	3/15E→	-	-	3/29→	-	-	-	-
CHICKADEE, CAROLINA	R	R	-	R	-	R	-	R	-	-
BLACK-CAPPED	R	→3/17	R	R	R-3/25(9)	R	R	A	R	R-3/28(22)
NUTHATCH, RED-BREASTED	A	A	P	-	R	A	-	A	R	A-1/18(5)
CREEPER, BROWN	R	A	P	-	3/10	-	R	P	R	A-3/28(3)
WREN, WINTER	A	A	MAR→	-	-	-	→3/30	-	R	1/26
KINGLET, GOLDEN-CROWNED	A	A	P	1/8-3/18	3/25(5)	-	-	A	A	A-3/26(19)
RUBY-CROWNED	A	P	-	-	-	-	-	-	A	-
HERMIT	R	A-1/24(4)	-	-	-	2/20	-	3/19	R	-
ROBIN, AMERICAN	R	R	A	-	3/7-18(12)→	R	R	P	R	R-1/26(88)
CATBIRD, GRAY	-	-	-	-	-	-	-	3/30→	-	3/28→
THRASHER, BROWN	-	-	P	-	-	-	-	-	-	-
PIBIT, AMERICAN	1/26→	-	-	-	-	3/29(4)→	-	-	-	-
WARBLER, YELLOW-RUMPED	2/24→	-	A	2/12→	-	A	-	A	P	A-3/26(6)
PINE	3/10→	3/15(4)-25	-	3/11→	-	-	-	3/8→	-	3/9→
TOWHEE, EASTERN	P	-	P	-	-	-	-	-	-	-
SPARROW, AMERICAN TREE	A	P	A	→3/11	A	→2/14	→2/20(6)-26	3/25→	→3/22	→1/22(15)-3/26
CHIPPING FIELD	-	A	→1/9	-	-	3/27→	R	3/8→	3/26→	3/2-22(5)→
SAVANNAH FOX	-	R	2/12→	3/18→	-	-	-	3/8→	R	A-3/26(9)
SWAMP	P	→2/26	-	-	-	-	-	-	3/10→	-
WHITE-THROATED	A	R	MAR→	-	-	A-1/22(3)	3/30→	-	A	A-3/2(4)
WHITE-CROWNED	A	-	-	-	-	-	2/26→	-	A	3/25→
JUNCO, DARK-EYED	A	-	P	→3/11	-	A	A	A	A	A-1/30(6)
LONGSPUR, LAPLAND	A	A	A	→3/18(6)	R-1/6(20)	A-3/50+	A-1/22(155)	A-3/11(16)	A	A-2/20(77)
BUNTING, SNOW	1/26-2/5	-	-	-	-	1/20-2/1(6)	-	-	-	-
BLACKBIRD, RED-WINGED	1/23-26(22)	1/2	P	2/26-3/11(40)→	3/7-25(10)→	2/27→	2/26(158)→	2/22-3/13(62)→	-	2/26
MEADOWLARK, EASTERN	→JAN, 2/23→	R	P	3/7→	-	3/4→	R-1/22(4)	2/28→	A	2/25-3/25(71)→
BLACKBIRD, RUSTY	3/10	2/1(7)	MAR→	3/11-18(6)	-	1/29(15)	-	3/11-26(17)→	3/10→	1/25(13)→
GRACKLE, COMMON	2/7→	R	2/24→	2/28-3/18(40)→	3/20→	A	2/27-3/4(107)→	2/28→	3/9→	→1/30(26)-2/3
COWBIRD, BROWN-HEADED	R	R	3/11→	3/11→	3/18→	1/20→	-	2/28→	2/23→	2/17-25(31)→
FINCH, PURPLE	A	P	R-2/21(10)	-	R	3/26→	2/20	-	A	1/21-3/28(30)→
REDPOLL, COMMON	-	-	→3/18	-	A	3/15(12)	-	-	-	1/8-3/26(21)→
SISKIN, PINE	A-3/31(25)	A-2/10(32)	A	-	A-3/28(4)	-	-	-	A	1/7(15)-2/18
GROSBEAK, EVENING	-	-	-	-	A-1/4(64)	-	-	-	→2/12(8)	-

SEASONAL OCCURRENCE TABLES - JANUARY THROUGH MARCH 2000

	JUNIATA	LANCASTER	LAWRENCE	LEBANON	LUZERNE	LYCOMING	MERCER	MIFFLIN	MONTGOMERY	MONTOUR
LOON, COMMON	-	-	-	3/26	3/15→	3/31	3/18-21	-	3/30→	-
GREBE, PIED-BILLED	-	-	3/4→	3/10(10)→	A	3/31(6)	3/5→	-	→1/30,3/22→	-
HORNED	-	-	-	3/17	-	3/31(6)	3/4-12(19)-31	-	3/11-17	-
CORMORANT, DOUBLE-CRESTED	-	-	2/26(6)→	-	-	-	3/30(6)→	-	-	-
HERON, GREAT BLUE	A	R	R	R-3/30(12)	R	3/31→	R	-	A	R
VULTURE, BLACK	R	R	-	R-3/30(210)	-	-	-	-	R-3/10(30+)	-
TURKEY	R	R	3/4→	R	2/24→	3/3(8)→	3/3-31(8)→	R-3/10(16)	R-3/10(100+)	-
GOOSE, SNOW	2/29(400+)	→2/26(75000)-3/9	3/4	A-2/27(75000)	2/28→	-	-	-	1/22-3/23(3000+)-25	2/22-3/5(4000)-12
CANADA	R	R	R-1/29(300+)	R	R	R	R	R-3/11(175+)	R	R
SWAN, MUTE	A	-	-	-	-	-	3/25(9)	-	1/28-3/22	-
TUNDRA	2/24(2000)	→2/27(5000)	3/4(32)	2/26(5000)-3/26	2/27→	-	3/1-6(50+)-10	-	1/2-2/27(70)-29	1/9-3/6(50)-12
DUCK, WOOD	→1/10	A	-	2/5-3/12(10)	R	-	3/3-21(5)→	1/4(18)→	3/12→	3/12→
GADWALL	-	-	-	3/26	→2/28	-	3/19(15)	-	A-2/28(15)	3/5(4)
WIGEON, AMERICAN	P	→1/2(16)	-	2/27-3/12(40)	2/26→	3/31(5)	→1/6,3/19(40)-29	-	A-3/8(10)	-
DUCK, AMERICAN BLACK	A	→1/2(105)-3/12	1/29(11)→	R-3/29(500)	R	3/31	1/6-2/25	R-3/2(6)	A	-
MALLARD	R	R	R-1/29(100+)	R	R	R	R	R-3/11(11)	R	R
TEAL, BLUE-WINGED	P	-	-	-	-	-	3/14→	-	-	-
SHOVELER, NORTHERN	-	-	-	1/7-3/26(12)	-	-	-	-	-	-
SHOVELER, NORTHERN	-	-	-	1/7E-2/26(100H)	2/24→	-	3/7(6)-21	-	→2/24(3554)-3/22	1/9-3/5(185)-12
PINTAIL, NORTHERN	-	→2/27(300)	2/26(5)→	2/27-3/26(62)	2/26→	-	3/4(8)-21	-	A-3/24(130+)	1/9-3/12(15)
TEAL, GREEN-WINGED	A	2/24-3/12	2/13→	-	-	-	-	-	1/9-3/22(3)	-
CANVASBACK	-	-	-	-	A	1/23	-	-	-	-
REDHEAD	P	2/26	P	3/12(4)	A	1/23	3/26	3/21(70+)	-	3/12(6)
DUCK, RING-NECKED	P	→2/26(75)	3/4-25(14)→	1/7E-3/12(150)	A	3/31(12)	1/14-3/4(150+)-29	-	1/22-3/4(192)-25	1/14-3/7(32)→
SCAUP, GREATER	P	2/26	3/4→	3/12(650H)-26	A	-	-	-	-	-
LESSER	-	-	-	3/3-12(150H)-18	A	-	→1/14,3/25(19)	-	2/1-3/11(15)→	-
OLDSQUAW	-	-	-	3/12E	-	-	3/10	-	-	3/12
BUFFLEHEAD	-	-	-	A-3/26(10)	-	1/23-3/31(28)	3/4-7(8)→	2/18(3)	1/30-2/28(4)	2/26-3/8(43)→
GOLDENEYE, COMMON	1/3→	-	-	3/3-26	A	-	-	2/18	→2/3	3/8
MERGANSER, HOODED	P	-	3/4→	2/26-3/12(12)-25	R	3/31(6)	1/6,3/15(5)-28	2/22(11)	→2/26(11)-3/3	1/9-3/7(12)→
COMMON	A	2/24-27(15)-3/12	-	A-3/5(382H)	R-1/2(70)	R	1/2-3/4(24)-21	-	A-3/5(400+)	1/5-9(200+)
RED-BREASTED	P	-	-	3/12(10)	A	-	3/1-31(100+)	-	-	3/12
DUCK, RUDDY	P	-	-	3/10→	A	3/31(4)	→1/6,3/26(30)→	-	1/4→	3/12→
OSPREY	3/30→	-	-	-	-	-	3/28E→	-	3/18→	-
EAGLE, BALD	2/5-25	-	-	A	A	1/7-29	R	3/2	A	-
HARRIER, NORTHERN	A	1/8	R	-	R	1/19	A	-	→A	→2/12
HAWK, SHARP-SHINNED	R	R	R	R	R	R	R	R	R	-
COOPER'S	R	R	R	R	R	R	R	R	R	-
GOSHAWK, NORTHERN	-	-	-	-	-	-	1/30	-	3/13	-
HAWK, RED-SHOULDERED	1/14	1/17-28	R	R	R	-	R	-	→3/7	-
BROAD-WINGED	-	-	-	-	-	-	3/4(4)→	-	3/28(15)→	-
RED-TAILED	R-2/25(30+)	R	R	R	R-1/2(43)	R	R	R	R	R
ROUGH-LEGGED	A-2/5(12)	→1/29	A	A-2/26(16)	3/27	-	→MAR	-	→3/5	→3/8
KESTREL, AMERICAN	R	R	R	R	R	R	R	R	R	R
FALCON, PEREGRINE	-	-	-	-	R	1/22	-	-	-	-
BOBWHITE, NORTHERN	-	-	-	-	1/2	-	-	-	-	-
COOT, AMERICAN	-	-	-	3/3-10(19)	A	3/31	3/1-25(60)→	-	1/22-2/1(5)→	2/17→
KILLDEER	A	R	P	R	A	3/2→	A	R-3/10(6)	2/16-3/5(15)→	3/28→
YELLOWLEGS, GREATER	-	-	-	-	-	-	-	-	-	-
SNIPE, COMMON	A	A-2/22(4)	2/6→	-	3/15→	-	1/4(3)→	-	3/8-18(4)-25	-
WOODCOCK, AMERICAN	2/26→	3/5→	P	2/23-3/8(21)→	2/15→	2/26→	2/25→	-	2/25-3/7(7)→	-
GULL, BONAPARTE'S	-	3/28	-	3/5-26	3/28→	3/31(63H)	3/21-30	-	-	-
RING-BILLED	P	A	1/7(2000+)	A-2/26(5000)	A	-	A-3/7(200)	-	-	1/9-2/28(150)→
HERRING	P	A	-	3/4(150)-3/17	A	3/13(10+)	1/5-2/24(75+)-3/30	-	-	-
ICELAND	-	-	-	-	-	-	-	-	1/9	-
LESSER BLACK-BACKED	-	A-3/28(12+)	-	3/3L	-	-	-	-	→1/9(6)-3/19	-
GREAT BLACK-BACKED	-	3/28	-	→2/29	-	-	-	-	1/9-3/22	-
OWL, BARN	-	-	R	-	-	-	-	-	-	-

SEASONAL OCCURRENCE TABLES - JANUARY THROUGH MARCH 2000

	JUNIATA	LANCASTER	LAWRENCE	LEBANON	LUZERNE	LYCOMING	MERCER	MIFFLIN	MONTGOMERY	MONTOUR
BARRED	R	R	R	R	R	-	R	R	-	-
LONG-EARED	A-2/5(23)	-	-	-	-	-	1/2	-	1/24	-
SHORT-EARED	A(7)	-	-	-	1/9(3)	-	1/9-FEB	3/8-9(7)	2/9	-2/16(5)-23
NORTHERN SAW-WHET	-	-	-	-	R	-	R	-	-	-
WOODPECKER, RED-HEADED	-	R	A	R	-	-	R	-	-	-
SAPSUCKER, YELLOW-BELLIED	A	-2/17	P	A-2/13(3)	-	-	1/22	-	1/22-3/18	-
FLICKER, NORTHERN	R	R	R	R	R	-	R	R-2/27(5)	R	R
PHOEBE, EASTERN	A	3/8→	-	3/12→	3/6→	-	3/9E→	2/16→	3/7→	R
SHRIKE, NORTHERN	P	-	1/7	-	-	-	-	2/28	-3/22	-2/12
CROW, FISH	3/5→	R	-	R	R	3/10→	-	3/24→	-	-
RAVEN, COMMON	R	R	-	R	R	R	-	R	-	-
LARK, HORNED	R	R	R-1/29(600+)	R-2/13(2200)	R	R	A-2/9(75)	2/10(100+)	2/9(35)-20	-1/21(200+)-2/21
MARTIN, PURPLE	3/24(8)→	-	-	-	3/18→	-	3/14E→	-	-	-
SWALLOW, TREE	3/2(12)→	-	-	3/12E→	3/28→	3/31(100+)→	3/9E→	3/29(6)→	3/7→	-
NORTHERN ROUGH-WINGED	-	-	-	-	-	-	-	-	3/24→	-
BARN	-	-	-	3/9E→	-	-	3/28E→	-	-	-
CHICKADEE, CAROLINA	-	R	-	R	-	-	-	-	R	-
BLACK-CAPPED	R	R	R	R	R-1/2(355)	R	R	R-2/18(19+)	P	R
NUTHATCH, RED-BREADED	A-1/15(4)	1/2	P	-3/17	R	R	A	A	-3/24	-
CREEPER, BROWN	R	-	P	R	R	R	A	A	-3/12	-
WREN, WINTER	A	-	P	R	R	-	3/28→	3/8	1/6-30	-
KINGLET, GOLDEN-CROWNED	A	2/17	R	R	R	-	1/4-3/22(4)	3/6	3/18-24	-
RUBY-CROWNED	-	-	-	-	A	-	-	2/18	-	-1/14
HERMIT	A	A	P	-	A	-	-	-	-	-
ROBIN, AMERICAN	A-2/15(150+)	R-1/30(450)	R-1/29(8)	R-2/5(75)	R-1/2(11)	R	R	A-3/22(150+)	R	A-2/24(18)
CATBIRD, GRAY	-	-	-	-	A	-	-	-	-	-
THRASHER, BROWN	-	3/26→	-	3/26→	-	-	3/27→	-	3/26→	-
PIPIT, AMERICAN	P	A	A	A-3/25(110)	-	-	3/7-22(40+)	-	-	-
WARBLER, YELLOW-RUMPED	A-1/1(18)	-	A	-	-	-	2/25(3)	-	A	-
PINE	-	-	-	3/25	-	-	-	-	-	-
TOWHEE, EASTERN	-	-1/2	A	R	-	-	A	-	1/22→	-
SPARROW, AMERICAN TREE	A	-2/18	A-2/26(12)	A	-1/2(422)-2/14	-	-3/1(20)-27	A-2/18(5)	-1/2(24)-2/24	A-2/6(200+)
CHIPPING	-	-	-	-	A	-	3/28E→	-	-	-
FIELD	3/3→	-	-	R	R	-	3/26-31(11)→	-	A	-
SAVANNAH	A	-	2/12→	R	-	-	3/26→	-	-	-
FOX	-	-	P	3/8(8)-18	A	-	3/26	-	1/22-2/12(3)-3/17	3/2
SWAMP	-	-	R	R	R-1/2(16)	-	R	-	A-1/2(6)	-
WHITE-THROATED	A	A	A-3/4(5)	A-2/13(45)	R	-	2/23→	A-3/8(8)	A	A
WHITE-CROWNED	A-1/30(12)	A	A-1/29(12)	-	1/2	-	1/1(5)	3/21	P	A
JUNCO, DARK-EYED	A	A	A-2/29(50+)	R-2/13(300)	R-1/2(535)	R	A	A-2/28(12)	A-2/20(30±)	A-2/6(25)
LONGSPUR, LAPLAND	2/5(6)	1/26-2/26	1/29-2/6	2/13(3)-20	-	-	-	2/8	-	-
BUNTING, SNOW	2/5(3)	1/26	1/23-2/5(8)	2/20(250)	-	-	2/9(3)	2/8(33)	-	-2/21(16)
BLACKBIRD, RED-WINGED	1/27	2/24→	2/7(300+)→	R-3/26(2000)	R	2/26→	A-FEB(250+)	3/10(100+)→	2/21→	2/24(5)→
MEADOWLARK, EASTERN	A-1/24(12)	R	2/26(14)→	3/26→	A	-	2/28	R	A	2/1→
BLACKBIRD, RUSTY	P	-	-	3/5	3/14→	-	2/28	-	1/30(3)	-
GRACKLE, COMMON	P	R-3/4(40000)	2/12→	R-3/10(5000)	R	2/26→	2/23(50+)→	3/10→	1/30→	2/26(5)→
COWBIRD, BROWN-HEADED	P	R	P	R-3/10(400)	R	-	1/22	R	1/26→	-
FINCH, PURPLE	A	P	P	A	R	-	A-3/4(3)	-	A-2/27(25)	-
REDPOLL, COMMON	-	-	-1/29(100+)→	-	A	2/21(6)-3/15	3/9(4)-10	FEB(7)	1/30	-
SISKIN, PINE	A	-	P	-	A-1/2(6)	2/26	-	2/15(15)	1/26	-
GROSBEEK, EVENING	P-1(2+)	-	-	-	1/2(3)	-	-	2/16(6)	-	-

SEASONAL OCCURRENCE TABLES - JANUARY THROUGH MARCH 2000

	PERRY	PHILADELPHIA	SCHUYLKILL	SOMERSET	SULLIVAN	TIOGA	VENANGO	WESTMORELAND	WYOMING	YORK
LESSER BLACK-BACKED	-	1/8(3)	-	-	-	-	-	-	-	-
GREAT BLACK-BACKED	-	A	-	-	-	-	-	-	-	A
OWL, BARN	R	R	R	-	-	-	-	-	-	R
BARRED	R	-	R	R	R	R	R	R	R	R
LONG-EARED	-	O	-	-2/12(3)	-	-	2/20-3/11	-	-	-
SHORT-EARED	-	-	-	-2/20	-	-	1/1-3/22	-	-1/5	1/22(4)-29
NORTHERN SAW-WHET	A	-2/18	R	-	-	1/6-9	2/20-28	-	-	A
WOODPECKER, RED-HEADED	-	-	-	-	-	-	-	-	-	R
SAPSUCKER, YELLOW-BELLIED	A	P	A	1/14-2/15	-	3/31→	-	A	-	-3/26
FLICKER, NORTHERN	A	R	R	A	2/21→	3/12→	A	R	R	R
PHOEBE, EASTERN	3/4→	3/24→	1/9→	2/26→	3/15→	3/12→	3/14→	3/9→	3/13→	3/1→
SHRIKE, NORTHERN	-	-	-	1/27	-	-2/4	-2/27	P	-	-1/1
CROW, FISH	R	R	A	-	-	-	-	-	-	R
RAVEN, COMMON	R	-	R	R	R	R	-	R	R	R
LARK, HORNED	R-1/23(200+)	-2/25	1/29-2/5(300)-3/5	A-1/2(330)	-	1/20-2/20(180)	A	A-2/5(300)	R-2/21(200)	A-1/28(250)
MARTIN, PURPLE	-	-	-	-	-	-	-	-	3/30E→	-
SWALLOW, TREE	3/27(4)→	2/29→	3/12→	3/25→	-	3/31→	3/26→	3/12(8)→	3/17-30(625)→	3/6→
NORTHERN ROUGH-WINGED	3/27→	-	-	-	-	-	-	3/23→	3/31→	-
CHICKADEE, CAROLINA	R	R	2/14-21	-	-	-	-	R	R	R
BLACK-CAPPED	R	-	R	R	R	R	R	R	R	A
NUTHATCH, RED-BREASTED	A	P	R	1/2	R	-	1/8-3/4	R	A	A
CREEPER, BROWN	A	P	R	1/2-9	R	R	A-1/2(5)	R	R	-3/8
WREN, WINTER	A	-	2/11→	-	-	-	-	A	R	-
KINGLET, GOLDEN-CROWNED	A	P	R	1/2	R	3/17→	A	A	R	A
RUBY-CROWNED	A	P	1/1-7	-	-	-	-	P	-	1/1-8
HERMIT	A	-	A	-	-	-	-	A	-	-2/13
ROBIN, AMERICAN	A	R	R	A	2/25(6)→	2/6→	R	A	R	R
CATBIRD, GRAY	-	-	-	-	-	-	-	-	-	-1/29
THRASHER, BROWN	-	-1/8(3)	-	-	-	-	-	-	-	3/18→
PIPIT, AMERICAN	-	-1/8(3)	-	-	-	-	-	-	-	-
WARBLER, YELLOW-RUMPED	A	1/8(7)	-	-	-	-	3/12(50+)	-	-	-
PINE	3/23→	1/16	3/24→	-	-	-	-	A	-	A
TOWHEE, EASTERN	A	3/18→	3/15→	-	-	-	-	A	-	-
SPARROW, AMERICAN TREE	A	A-3/24(34)	A	-2/20	-3/11	-1/19(24)-3/30	A	A	-1/27(10)-3/16	-2/13
CHIPPING	3/21→	-1/8	3/23→	-	-	-	-	3/27→	-	-
FIELD	A	A-1/8(30)	A	3/9→	-	-	2/24→	A	-	R
SAVANNAH	-	1/8	-	3/22	-	-	-	-	3/11→	1/1
FOX	-	1/8(22)	2/23-3/18(21)→	2/26-3/13	3/2→	2/29-3/10(4)-27	-	2/5→	3/11-25	A
SWAMP	-	R	A	1/21	-	A	3/31→	A	-	R
WHITE-THROATED	A	A-1/8(1549)	A	1/25	A	A	-3/12	P	A	A
WHITE-CROWNED	A	1/8(6)	A	-	-	-	-	A	-	A
JUNCO, DARK-EYED	A	A	A	A	R	A-3/4(10)	A	A	-	A
LONGSPUR, LAPLAND	1/23	-	2/5-21	1/2-2/19	-	2/20-22	1/1-3/12	-	2/7-21	1/21-28
BUNTING, SNOW	1/23(10)	1/8(6)	2/5(12)-21	1/2-23(6)	-3/3(22)-19	2/20-22(11)	1/23-2/5	-	1/27-2/21(400)	1/8(50+)-21
BLACKBIRD, RED-WINGED	2/17(25)→	A	2/23→	2/1→	2/25-26(350)→	1/25-2/26(68)→	1/2	A	3/2-11(300)→	R
MEADOWLARK, EASTERN	-	-	3/10→	3/8→	-	3/22→	A	3/14→	3/10→	R
BLACKBIRD, RUSTY	-	1/8	2/26-3/12(40)→	1/27-3/19(5)	-	2/24-3/2(40)→	-	A	-	1/9(30)-11
GRACKLE, COMMON	2/17(10)→	-	2/17(25)→	2/23→	-	2/26(8)→	2/23→	P	3/7→	R
COWBIRD, BROWN-HEADED	2/17→	1/8	2/24→	A	2/26(8)→	2/26-3/1(80+)-	1/15→	A	3/11(5)→	R
FINCH, PURPLE	A	P	A	3/25	R	A	A	A	A	R
REDPOLL, COMMON	-	3/14-15	1/5-25(50)-29	-	-2/16(25)-3/8	A-3/8(175H)	-3/18	-3/22(3)	-1/17(400)-3/2	-
SISKIN, PINE	2/14(100+H)	P	A	-	1/25-3/29(10)→	3/9→	2/13	P	1/7	-3/14
GROSBEAK, EVENING	-	-	-	-	A-2/1(30)	-	-	A-2/15(50)	-	-

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