

"And A Partridge In A Pear Tree"

The Annual Christmas Bird Count

by Al Smith and Stu Tingley

Pre-dawn, late December, snow from a late night flurry swirls on the highway. A car speeds on to its assigned zone, the driver and passengers reminiscing of the highlights of similar excursions in years past. Time 0730, enough light, the party leader records time, mileage, weather conditions, and the eager observers step out into the chill morning air; a raven is heard calling in the distance and the Christmas Bird Count is on.

Such will be the scene again this December when the 82nd Audubon Christmas Bird Count gets underway and volunteer observers undertake the onerous task of counting all birds within the designated 15 mile diameter area of the Sackville, Cape Tormentine, and Amherst Count zones. Our three Christmas Counts are part of over 1300 counts conducted in an identical fashion each year throughout Canada, the United States, in numerous West Indian Islands, and throughout Central America.

Origins of the Christmas Bird Count go back to 1900 when ornithologist Frank M. Chapman of the American Museum of Natural History was concerned about the annual Christmas "side hunt" and proposed the bird count as an alternative. The annual "side hunt" was a tradition that persisted in the United States during the latter part of the nineteenth century. During this event, teams of shooters would compete on Christmas Day to see which side could kill the largest numbers of wild birds and mammals. Chapman's alternative was one in which participants would count, rather than shoot, birds in their local areas.

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Twenty-five Christmas bird counts took place that Christmas Day in 1900, and the results were published in Bird Lore, the official Audubon publication at that time. Frank Chapman hoped that the counts would be used "because they gave a very good idea of the distribution of winter birds on Christmas Day, with some indication of the number of individuals which may be observed in a given time".

From those modest beginnings the annual event has grown from its original 25 counts to over 1360, and the total participants from 27 to over 34,000. Each Christmas Count is a day-long census conducted during a two-week count period that spans the Christmas holiday season. For many naturalist clubs and bird societies, the count is undoubtedly the big birding event of the year, and with many groups much effort goes into the strategy, planning, and logistics of trying to amass, in a single calendar day, the largest possible list of birds for their designated zone.

The count zone or circle is roughly 177 square miles in area, and count organizers attempt to field as many competent observers as possible who are grouped into "parties" each with a pie-shaped portion of the zone to cover. There is no limit to the number of participants as in 1979 the counts ranged from a single observer to over 200 in Oakland, California. There also seems to be no limit to the numbers of birds recorded by observers in their designated areas. Obviously, count zones in warmer climates hold an enormous advantage as do counts located on or near salt water. One count (Panama Canal Zone) annually scores over 300 species, but on the average, counts tally from 30-80 species. By contrast, some of the more northerly counts annually find only 4-6 species. The number of individual birds recorded can range from a low of 92 at Churchill, Manitoba to 22,352,044 at Pine Prairie, Louisiana.

All the information from the counts is edited and published each year in the July issue of American Birds, the official publication of the National Audubon Society. Over the years, those issues make up one of the largest collections of raw ecological data in existence. Scientists use the data to examine changes in bird populations and distribution on a continent-wide basis.

Thirty-two years ago, Joan and George Boyer organized and conducted the first Christmas Bird Count in the Sackville area. On New Year's Day, 1949, they spent 8½ hours afield and recorded 20 species, 760 individuals. George Boyer was an ornithologist employed by the Canadian Wildlife Service (CWS) and he established the CWS office in Sackville in 1947. Unfortunately, the Sackville count was not continued by Boyer in subsequent years; however, Reid McManus conducted a single count in Memramcook on January 2, 1950.

The present Sackville count dates back to 1960 when three observers - Tony Erskine, Charlie Bartlett, and Don McPhail - spent 16 hours afield on December 24 and recorded 19 species, 575 individual birds. Tony Erskine, the original organizer and compiler of the Sackville count, established a second count zone at Cape Tormentine in 1961. Both counts have been conducted annually since that time with Tony serving as compiler until 1969 when the task was handed over to Al Smith who continues to organize and compile the two counts.

The Sackville count zone is centered on the Trans-Canada Highway near Long's Product Bar in Sackville, and the 15 mile diameter circle takes in Wood Point, outskirts of Dorchester, Fairfield, Mount View, Midgic, Jolicure, and Aulac. Over the 21 year history of the count, 89

species of birds have been recorded. The average annual species tally is approximately 45 with a record high of 52 species recorded in 1976. The number of observers participating in the count has grown steadily during the 1970's with up to 17 observers on the count in recent years. Each year unusual sightings are recorded and annually one or more new species may be added to the cumulative list for the count. Past counts have recorded such unusual species as a Canvasback duck near the Ram Pasture Marsh, a Cardinal at Lee Calkins' feeder, a Gyrfalcon near Westcock, and last year a young Peregrine Falcon in the same area.

The Cape Tormentine count (centered at Melrose and including Cape Tormentine, Cadman Corner, and Timber River) due to its expanse of sea coast, usually records even more rarities. The cumulative species tally for that count rose to 100 in 1980 with annual counts in recent years exceeding 50 species. The record high for the count was 55 species in 1973. Water birds normally dominate this count in terms of numbers and species. Over the years, two species of Loon, three species of grebe, gannet, two species of cormorant, and 15 species of waterfowl have been recorded, along with nine species of gulls including one observation of an Ivory Gull, a very rare northern species, and three recordings of Black-headed Gulls, a European visitor.

The Amherst Christmas Bird Count also has a long history, dating back to 1961 when Evelyn Coates (then Evelyn Lowerison) and Dora Myers recorded 13 species on Boxing Day and submitted the results to the Nova Scotia Bird Society for publication in their newsletter. The count has been conducted each Christmas since then, under Evelyn's capable leadership until 1974 when the organizing and compiling of the count was handed over to Con Desplanque, then to Stuart Tingley in 1977.

The Amherst circle encompasses the entire town of Amherst, the Elysian Fields, River Hebert, South Athol, Springhill Junction, Salem, Brookdale, and all points in between. Since its inception 20 years ago, a cumulative total of 71 species has been recorded on the Amherst CBC, with an additional ten species seen during count weeks, but not on count days. The last two years, 1979 and 1980, have produced the highest ever yearly species totals for the count, with 40 and 41, respectively. Despite its proximity to the Sackville circle, the Amherst count traditionally records five to ten species fewer than its sister count across the border. Reasons for this may be that the Amherst count usually attracts fewer observers (resulting in fewer party-hours), and is held later in the count period, usually between Christmas and New Year's. Thus lingering, half-hardy birds are less likely to be found, and open water for ducks, geese, and other water birds is scarcer.

Among the more unusual sightings on Amherst counts over the years, two in particular stand out. A Yellow-headed Blackbird, an attractive western species usually not seen in Canada east of extreme western Ontario especially in winter, appeared at an Amherst feeder during count week in 1970. During count week in 1976, several Thick-billed Murres were picked up in fields at Amherst Point. These black and white seabirds, closely related to the familiar puffin, come to land only to nest during the summer, and are normally found well out to sea during the winter. These birds had apparently become grounded after being blown over land by gale force winds blowing up the Bay of Fundy a few days previous. One Amherst Point resident commented that they looked like miniature penguins as they waddled across the highway.

Coverage of a count zone is somewhat variable from year to year; however, generally one or more members of a field party have covered that same section in previous years. Usually the more productive habitats are known to the observers and coverage time is allotted accordingly. Unlike the nesting season, bird distribution in winter is somewhat irregular. Many songbirds such as Blue Jays, Evening Grosbeaks, Starlings, and various kinds of blackbirds and sparrows become concentrated in towns and villages where winter bird feeding has become very popular, while water birds such as Black Ducks, goldeneye, mergansers, and Canada Geese are more or less restricted to the few areas of open water which remain along the sea coast and along the various local rivers. Though most wooded areas and marshland may seem completely devoid of bird life at this season, all types of habitat within the circle are covered by the observers as some birds such as Boreal Chickadees, Gray Jays, Golden-crowned Kinglets, woodpeckers, grouse, owls, and several kinds of finches remain in the more heavily forested areas all winter, and others such as Snow Buntings, Horned Larks, Lapland Longspurs, Snowy Owls, and Rough-legged Hawks are found in the windswept fields and barren, exposed marshland.

Birds of all species are counted, even the common House Sparrow. In April of 1980, the National Audubon Society's office in New York received a call from the television program *Sesame Street*. They were planning an upcoming program to deal with the U.S. Census in which Big Bird was to complain that he wasn't being counted along with other residents of the street. The caller wanted to know if the National Audubon Society did annually count birds as they wanted to be able to assure Big Bird that he was being counted, not on the U.S. Census, but on the Christmas Bird Count.

After spending eight to nine hours methodically covering their sections, field parties assemble at the end of the day to enjoy hot drinks and an evening meal and to tally up the day's observations. Gradually each group discloses its best finds and a mild competitive spirit prevails to see which party has assembled the largest species list and who has added a new species to the all time local list. The compiler reads down his summary list of species for the count, recording each party's totals and finally, what everyone is waiting for, the day's total species tally is announced. Discussion focuses on comparisons with other years and on numbers of individuals observed this year relative to other years.

To the participants, the count day is always considered a success, with numerous memorable experiences and good fellowship. Participants are all volunteers who enjoy "birding", being outdoors, and contributing to a worthwhile endeavour. New observers are always welcome to join the hardy core who continue these counts. Being afield birding on a -20°C morning at Christmas time can be an exhilarating experience, and you are guaranteed to see the common, and the unusual - perhaps even two Rock Doves - "and a partridge in a pear tree".

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Persons wishing to join the counts or to report feeder watches are asked to contact them at the above address.