## NOTES

## CHANGING STATUS OF RING-NECKED DUCKS WINTERING ON SALT SPRING ISLAND, BRITISH COLUMBIA, 1978-2004

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Annual mid-winter counts of birds on and around Salt Spring Island, British Columbia from 1978 through 2004 indicate a sharp increase in numbers of Ring-necked Ducks (*Aythya collaris*) in the 1990s. The greatest increase after 1992 occurred on St. Mary Lake, where the species had only previously been seen infrequently.

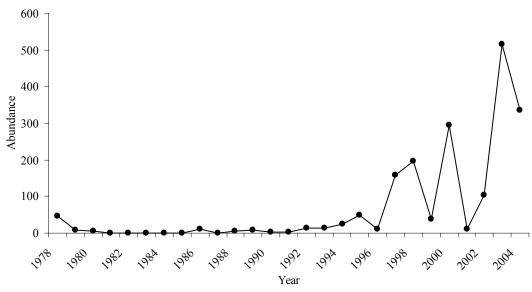
Ice-free wetlands, including lakes, sloughs, and marshes scattered throughout southwestern British Columbia together may support a significant population of wintering Ringnecked Ducks. Traditional surveys of breeding populations in North America suggest that numbers are stable to increasing but the data are imprecise (Hohman and Eberhardt 1998). Estimates of total winter populations, trends, and specific over-wintering sites are poorly known on the continent and unknown for much of southern and southwestern British Columbia (Campbell et. al. 1990). The purpose of this paper is to report on a significant wintering population of Ring-

necked Ducks in British Columbia and examine changes in numbers over a 26-year period for a local population.

Since 1978, volunteers have counted all species of birds on Salt Spring Island and nearby waters on a designated day each mid-winter. Figure 1 summarizes the survey results for Ring-necked Duck, although annual variations in numbers of birds, field experience of counters, and weather conditions must be considered in interpreting the results. Nevertheless, annual counts appear to support three conclusions:

- 1) Ring-necked Ducks were uncommon during winter on Salt Spring Island until about 1992. Fraser (1989) considered the species as "uncommon, winter only" prior to 1988;
- 2) from 1992 to 1996 the species was seen more regularly in modest numbers, and in five of the seven most recent surveys (e.g., 1997 to 2003) counts far exceeded previous tallies; and
- 3) essentially all of the increases after 1991 occurred on St. Mary Lake.

Local counts give no evidence as to whether wintering numbers of Ring-necked Ducks increased regionally during this period, or whether Salt Spring Island attracted an unusual share of over-wintering birds. If the Salt Spring Island increase is unique to the region, the question arises as



**Figure 1**. Mid-winter counts of Ring-necked Ducks on Salt Spring Island, BC. Some years include counts at Prevost Island, although numbers of birds there were low. In 1998 a large flock was on Bullock Lake, 1 km from St. Mary Lake.



**Figure 2.** Adult male Ring-necked Duck, Vancouver, BC. 9 February 1993. (R. Wayne Campbell). Although hundreds of "ring-necks" are now over-wintering on fresh-water lakes on Salt Spring Island, they are rarely seen from May through October.

to whether habitat conditions improved after the 1980s in St. Mary Lake. No direct studies were made, but limnological surveys show that the lake is undergoing eutrophication. Biomass of molluscs or other food sources could be increasing, but this is conjecture. Also, Lesser Scaup (*Aythya affinis*), which winter on Salt Spring Island, and occur most years on St. Mary Lake, did not become more numerous in the past decade or so. If habitat changes did occur, they seem to have benefited only Ring-necked Ducks.

Campbell et al. (1990) sketch the usual calendar of Ringnecked Duck movements to and from British Columbia wintering areas. My observations suggest only minor differences from their description. On Salt Spring Island, Ring-necked Ducks are rarely seen from May to late October (Figure 2). First autumn sightings usually are in early November as duck numbers build for 4 to 6 weeks. The main departure occurs in late February through mid-March. The mid-winter "lull", when populations are highest, encompass the dates of all mid-winter bird counts in Figure 1. By April, sightings are of small groups or single birds, and are more often on ponds, built or natural, than on St. Mary Lake. My only May to June sightings are of single males, possibly the same one, on my farm pond on 8, 24, 29, and 30 May, and 7 June 1996.

## Literature Cited

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## About the Author

Bob was guided through his Ph.D. at the University of British Columbia in 1959 by Dr. Ian McTaggart-Cowan. The same year he married Judith Stenger, also a Ph.D. student, and moved to Alaska. Bob headed Alaska's waterfowl, bird, and furbearing animal research for a decade, his own research being on ptarmigan population dynamics. He joined the University of Alaska (Fairbanks) in 1970. He taught natural resources law and politics, environmental decision-making, and ethics for 20 years. Bob wrote 80 scientific/technical papers and 2 books about conservation in Alaska, as well as many articles for general audiences. Judy and Bob retired to Salt Spring Island in 1990, where Judy is a master potter and Bob tends a 200-tree orchard of heritage fruit trees, works in a local Conservancy, writes, and, as always, watches birds.

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