

2009 Annual Report for Park Use Permit # V10610242: Leach's Storm-petrel survival in British Columbia

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In 2009 I completed the third year of a survival study of Leach's Storm-petrels (*Oceanodroma leucorhoa*) on Cleland Island in the Cleland Island Ecological Reserve. The field work took place on July 1-3, 2009, and involved one biologist. The study area, delineated in 2007, is along the western side of the storm-petrel colony denoted in the B.C. Seabird Colony Inventory (Rodway and Lemon 1990; British Columbia Seabird Colony Inventory: Report #5 – West Coast Vancouver Island, CWS Tech. Rpt. No. 94; see attached map). All work was conducted according to the methods described in my research permit proposal.

My field work consisted of checking all burrows in the study area. I recorded the band numbers on all banded storm-petrels found and banded all unbanded storm-petrels encountered. Burrows with an unbanded bird during the initial encounter were checked on the following day. The totals in the area were 267 banded birds and 82 unbanded birds in 305 active burrows. All occupied burrows contained birds incubating eggs. In four cases, the ``burrows`` were actually tunnels made in the long grass rather than dug into the soil. This suggests that good nesting habitat for storm-petrels is limited, at least in my study area.

As in 2007 and 2008, the occupancy rate was over 95% and all birds found were Leach's Storm-petrels.

In previous years, we marked each Leach's Storm-petrel burrow with a numbered tongue depressor and mapped the locations of all marked burrows. As noted in my 2008 annual report, it was very difficult to spot the tongue depressors even when we were on our hands and knees looking at the burrow entrances. Although that difficulty does not negatively impact my study, it is of concern if overlapping studies are permitted in the same area. I tried using flags on longer wire to mark the edges of my study site, but found that flags that would be readily visible to another researcher on the island would also be visible to members of boat tours using binoculars so chose not to leave those flags in place. As the Canadian Wildlife Service is scheduled to collect storm-petrel eggs from Cleland in 2010, I will inform their researchers of my study site and request that they avoid the area.

During my field work, I was dropped off and picked up on the east side of the island each day. I walked to the west side along the rocky edge of the island and approached the study area from the Camp Beach. I returned to the Camp Beach for breaks.

No collections of any specimens were made during this study.

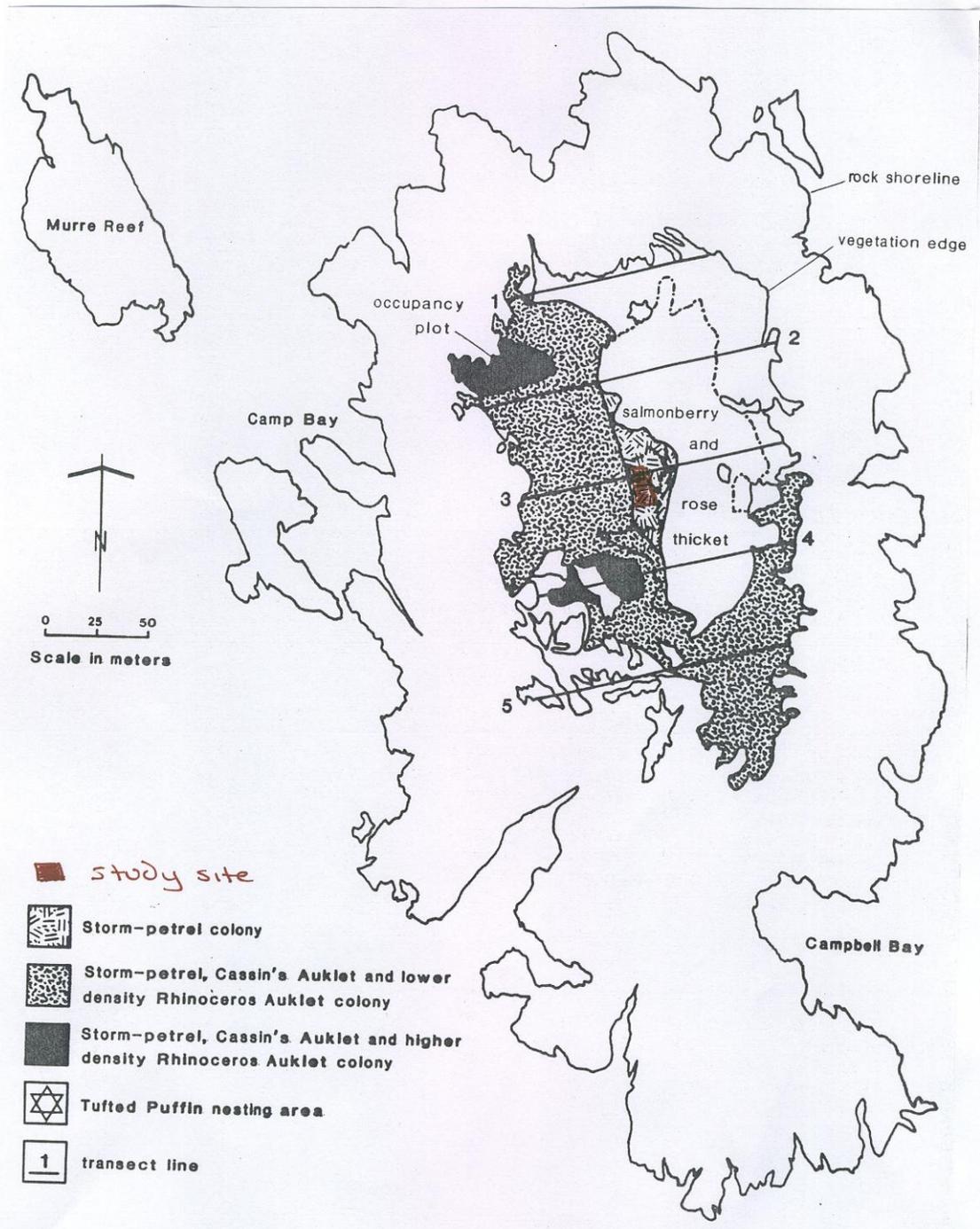


Figure WV410-1. Seabird colony areas on Cleland Island in 1988. Scale is distorted between the main island and "Murre Reef".