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Body size of Northern Goshawks on coastal islands of British Columbia.—The Northern Goshawk (*Accipiter gentilis*) is broadly distributed across the boreal parts of North America and Eurasia. Small-bodied insular populations recognized as subspecies occur in Sardinia-Corsica and Japan (Brown and Amadon 1968). Goshawks probably occur on most of the larger coastal islands of British Columbia where the species is apparently resident (Taverner 1940, Beebe 1974). There are specimen records from Vancouver, Graham, Denman, Mayne, Sydney, and Pender islands.

In his description of these insular populations as the subspecies *A. g. laingi,* Taverner (1940) made no reference to body size. Beebe (1974, 1976) characterized the populations of Vancouver Island (and the Olympic Peninsula of Washington) as an undescribed subspecies with a mass fully one-third smaller than the mainland form. For a male weighing 500 g (Beebe 1976), this represents a linear (cube root) reduction of 12.5%. He described goshawks inhabiting the Queen Charlotte Islands as similar in size to continental birds. There are few published data on *A. g. laingi* body size (Palmer 1988) and that available (e.g., Brown and Amadon 1968:454) is inadequate to evaluate these conclusions.

In this note I compare the body size of *A. g. laingi* populations with those of mainland British Columbia. For this study I utilized measurements of 180 specimens (132 males and 48 females) housed in collections at the Burke Museum, University of Washington (BMUW), University of Puget Sound (UPS), Royal British Columbia Museum (RBCM), Cowan Vertebrate Museum, University of British Columbia (CVM), Royal Ontario Museum (ROM), Museum of Natural Sciences, Ottawa (MNS), and Museum of Vertebrate Zoology, University of California, Berkeley (MVZ). Wing length was measured as the convex distance (arc) from the right wrist to the tip of the longest primary. Culmen length (chord) was measured as the distance from the cere to the tip of the bill. I made >85% of the measurements used in this analysis; the remainder were provided by Ross James (ROM) and Michel Gosselin (MNS).

Specimens were sexed based on tag information and body size. When the tag information was lacking or in conflict with that provided by measurement, the sex as determined by measurement was accepted as correct. Age groups were identified as hatching year (HY), second year (SY), or after second year (ASY) based on plumage characteristics. I excluded HY birds collected before September 1 because of the greater potential of misidentifying their sex based on body size. Two birds in typical SY plumage collected in July demonstrated unusually short wing lengths: RBCM 2644 (labelled female) WL = 325 mm and MVZ 42044 (labelled male) WL = 290 mm. These values are shorter than HY birds in this sample, suggesting that growth of replacement primaries was incomplete. Because of this variability and the small number of SY birds available, that age class was excluded from the analysis.

There was no significant difference in wing length between populations of Vancouver Island and the Queen Charlotte Islands (Kruskal-Wallace ANOVA test, Table 1). However,

TABLE 1
MEAN WING AND CULMEN LENGTH (MM, ± SE) OF NORTHERN GOSHAWKS FROM BRITISH COLUMBIA

	Sex	Age group HY	Age group ASY
Wing length			
Mainland	M	326.0 ± 1.2[a] (43)	331.5 ± 1.3[a] (37)
	F	357.8 ± 1.7[a] (21)	366.4 ± 2.2 (7)
Vancouver Island group	M	315.1 ± 2.0 (20)	324.7 ± 2.3 (22)
	F	340.9 ± 2.1 (10)	
Queen Charlotte group	M	316.9 ± 1.3 (8)	325.0 (1)
	F	346.9 ± 3.9 (8)	360.0 (2)
All islands	M	315.6 ± 1.5[a] (28)	325.2 ± 2.2[a] (24)
	F	343.6 ± 2.2[a] (14)	360.0 (2)
Culmen length			
Mainland	M	21.1 ± 0.1[a] (42)	21.4 ± 0.1 (36)
	F	23.6 ± 0.2[a] (21)	24.4 ± 0.3 (7)
Vancouver Island group	M	20.4 ± 0.2 (20)	21.5 ± 0.3 (21)
	F	23.0 ± 0.2 (10)	
Queen Charlotte group	M	20.8 ± 0.2 (8)	21.5 (1)
	F	23.8 ± 0.3 (6)	23.4 (2)
All islands	M	20.5 ± 0.1[a] (28)	21.6 ± 0.3 (23)
	F	23.3 ± 0.2 (16)	23.4 (2)

[a] Significant difference ($P < 0.05$) between regions. Sample size in parentheses.

wing length and culmen length were significantly different between insular and mainland populations in four of eight comparisons (Table 1), confirming that coastal island goshawks are 2–3% smaller than mainland birds. Because wing length values represent curvature (arc) distance, it is inappropriate to compare them with wing chord measurements (e.g., Henny et al. 1985). One may question whether the sample of mainland birds is representative of a resident population, given the periodic invasion of goshawks in the Lake States (Mueller et al. 1977). There is, however, no clear pattern of goshawk migration west of the continental divide (Beebe 1974), suggesting that the sample of mainland birds is probably representative of the breeding population there.

Dimorphism indices (ASY male wing length as a proportion of ASY female wing length) are 0.91 and 0.9 for insular and mainland populations, respectively. These values are similar to those of other North American populations (e.g., Great Lakes: 0.91, calculated from Storer 1966).

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Close nesting of a Black Vulture and a Turkey Vulture.—Close nesting by Black Vultures (*Coragyps atratus*) was reported by Hoxie (cf. Bendire 1892) who observed "perhaps a dozen or twenty pairs nesting on a 1.5 acre island near Beaufort, South Carolina." Baynard (1909, 1913) commented on large numbers of nesting Black Vultures in Florida swamps but did not indicate exact numbers or proximity of nests. However, Turcotte (1933) found two Black Vulture nests within 100 m of each other in Mississippi. Whereas Black Vultures have been noted to nest in close proximity (Bendire 1892, Turcotte 1933), Davis (1979) and Jackson (1983) reviewed the literature and found no evidence that Turkey Vultures (*Cathartes aura*) nest in close proximity. Jackson (1983) suggested that this may be a result of the more solitary and perhaps territorial nature of Turkey Vultures. Here I report the close nesting proximity between a Black Vulture and a Turkey Vulture.

On 5 March 1988, a Black Vulture nest was discovered in an abandoned one-story house in a mixed-deciduous forest about 6 km northeast of Pheba, Clay Co., Mississippi. The nest contained two eggs, and was located in a room (1.5 m × 3.5 m) with a window through which a Black Vulture exited upon being disturbed. On 8 May 1988, I observed two downy, buff-colored Black Vulture chicks in an adjacent room. A Turkey Vulture was also observed on this date peering through an opening (about 1.5 m^2) in the ceiling and roof. On 21 May 1988, I observed an adult Black Vulture with two chicks in the house. The chicks were still downy, but some black feathers were emerging from the remiges and rectrices. A Turkey Vulture was flushed from the attic and exited through the roof opening. I inspected briefly the attic but did not locate eggs or chicks. On 11 June 1988, the two Black Vulture chicks were fully feathered but not fledged. I inspected the attic again and found two downy white Turkey Vultures (2–4 weeks old) in a corner of the attic. On 9 July 1988, the Black Vulture chicks were gone and presumed fledged. On this day, I observed the Turkey Vulture chicks on the main floor of the house. The rectrices and remiges were well developed, but the body