

BC's Coast Region: Species & Ecosystems of Conservation Concern

Horned Lark, *strigata* subspecies (*Eremophila alpestris strigata*)

Global: G5T2 Provincial: SXB, SNA COSEWIC: E BC List: Red



Adult Male



Juvenile

Notes on *Eremophila alpestris strigata*: A member of the family Alaudidae (“true Larks”), *alpestris* is the only representative of the genus *Eremophila* in the New World. Also referred to as “Streaked Horned Lark” there is genetic data that suggest the subspecies was once part of a larger Pacific Coast lineage but has been evolving independently for some time. Five subspecies are recognized in BC. Prior to European settlement, natural and human-induced fires helped to maintain the open habitat required by grassland birds like Horned Lark. Agricultural clearing by early settlers may have also increased local habitat for Horned Lark by creating additional open spaces, a similar condition which allowed for Barn Owl to spread into southern BC. Much of the biology of the *strigata* subspecies is derived from the species as a whole.

Description

Wing span 9.5-10.2 cm, length ~6.5 cm. A ground dwelling specialist, Horned Lark gets its name from black feather tufts or “horns” that stand up on either side of the head. These are more prominent on males than females. Body plumage is marked with a black breast band, black lores (space between the eye and bill), and black cheek patches that contrast with the yellow to white supercilium (coloured line of plumage that runs from the lores around the eye to the back of the head), ear covers and chin. The nape, back, rump, and upper area of the tail are shades of brown streaked with dusky brown to black. Males are larger than females. The *strigata* subspecies is somewhat darker with a yellowish wash on the breast and belly, a pinkish or rufous tinge to the darker brown upperparts and sides, and an extensively yellow throat and supercilium. The mottled brown and grey plumage of chicks and juveniles provides camouflage during rearing and fledging which occurs on the ground.

Diet

Adults consume primarily grass and other plant seeds but also feed on insects during the breeding season including species of butterflies, grasshoppers and crickets. These are also fed to the young. In the winter, the diet switches almost exclusively to seeds. Horned Lark typically search for food on the ground, foraging amongst grasses and other vegetation. They will also perch on boulders, shrubs and low growing plants, taking seeds directly from plant seed heads.

Look's Like?

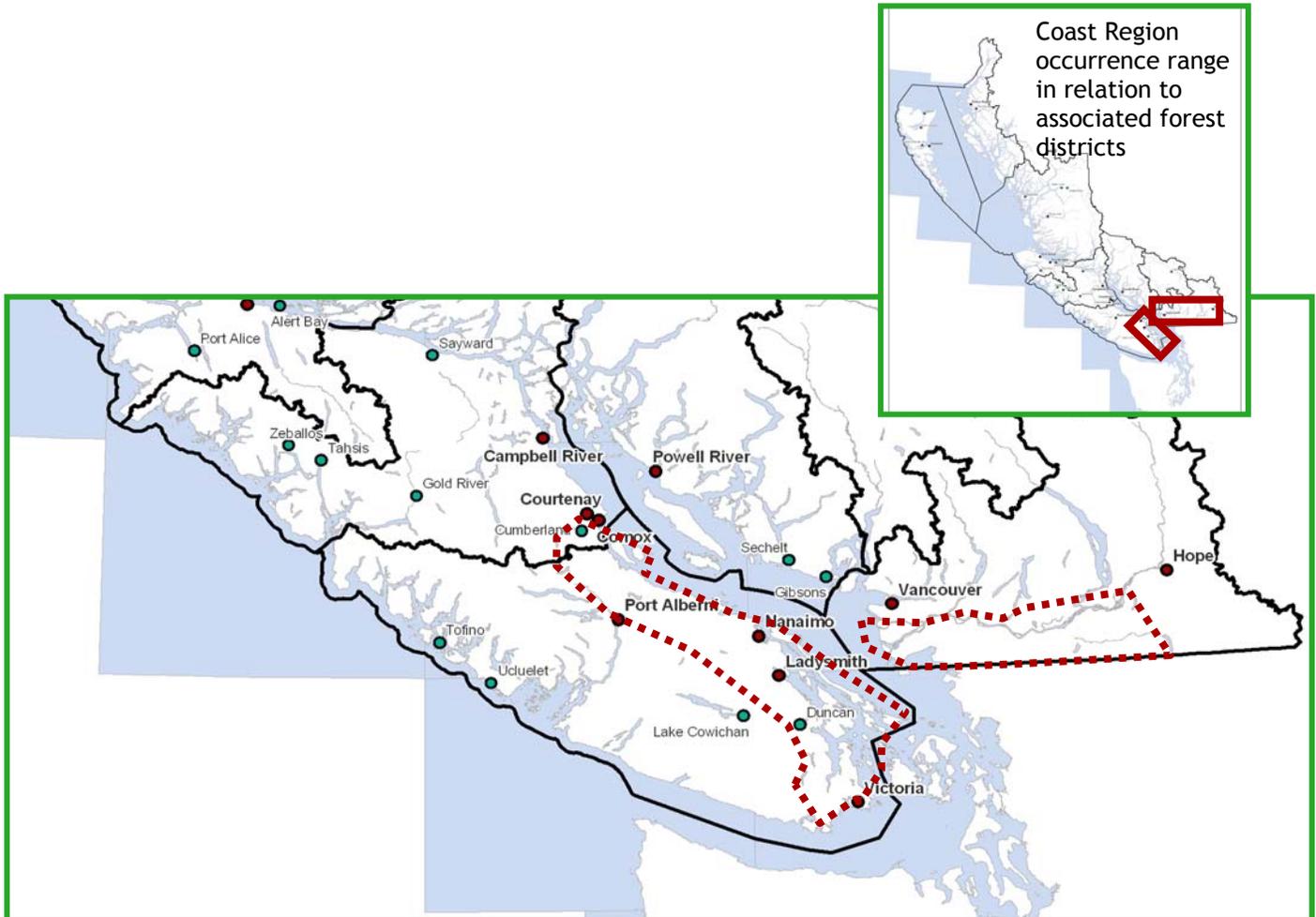
Although equally rare along the South Coast, immature Western Meadowlark may be confused for juvenile Horned Lark, as may female or juvenile Red-winged Blackbird or Brown-headed Cowbird. Killdeer, a small ground oriented shorebird which shares many nesting habitat preferences with Horned Lark has similar dark on light plumage patterns and could be mistaken for adult Horned Lark as it scurries amongst vegetation.



Killdeer

Distribution

Elevations 0-850 m. This subspecies has not been observed breeding since 1978 and is believed extirpated as a breeding population from its historic range in the southern portion of the Coast Region. Historically the breeding range of this subspecies was limited to the coastal plain of southwestern British Columbia, Washington and Oregon. In BC distribution was limited to a few sites in the Fraser Lowlands including Delta, Tswassen, Richmond and in and around the Chilliwack and Abbotsford area (Matsqui, Sumas, Huntingdon). On southeast Vancouver Island breeding pairs were known from Comox and Victoria. Individuals may still summer in these areas. Other subspecies of Horned Lark (e.g. *Eremophila alpestris arctica* and *Eremophila alpestris alpina*) may migrate through the Fraser Lowlands and are likely the source of seasonal sightings and observations.



Horned Lark *strigata* subspecies (*Eremophila alpestris strigata*), historic breeding occurrence range for the Coast Region

Habitat Preferences This subspecies is considered to be a short-grass specialist, closely associated with open areas dominated by grass and herbaceous plants and bare ground, including spits, estuaries, sand dunes and Garry oak meadows. They are also known to utilize disturbed sites such as graveled, paved and/or dirt surfaces and have been observed mating and breeding near airport runways. Open soil-based agricultural areas and mowed or short-grass grazing sites with low densities of livestock are also exploited, as well as some modified areas such as pastures and playing fields.



Historically, the *strigata* subspecies of Horned Lark bred in sparsely vegetated, dry rocky short grass communities and dune areas with a preference for the prairies and open coastal habitats of the Georgia Depression and Puget Sound Lowlands.

Critical Features This subspecies is highly territorial. Nests are generally built in open, barren areas that are sparsely vegetated or have very short vegetation. Horned Lark may require patches up to 5-10 ha within an open landscape (e.g. dunes, coastal island or coastal prairie habitats). A suitable habitat patch would likely need to be larger if surrounded by forest, buildings or other tall structures that reduce visibility.

Seasonal Life Cycle

Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
			Breeding / Nesting, 2-5 eggs incubated 11 days								
			Chick's in nest								
									Young of the year, Juveniles & adults over winter to the south		

Number of broods for BC breeding pairs is unknown, other subspecies of Horned Lark are known to have multiple broods per breeding season.

Threats

- ◆ Horned Lark populations across the Pacific Northwest have declined considerably as a result of loss of prairie and other native grassland communities. Degradation of remaining habitat due to urban and industrial development, increased disturbance at remaining suitable or restorable sites, intensified agricultural practices and loss of historic dune habitat in the Fraser River delta due to dyking present ongoing recovery challenges.
- ◆ Nest predation has been identified as the primary source of nest failure though primary nest predators have not been identified for populations in the U.S. As well (though infrequent), Horned Lark is subject to Brown-headed Cowbird parasitism.
- ◆ Disturbance to nesting areas from recreational activities (off-road vehicle use, mountain biking, hiking).
- ◆ Colonization and conversion of native grassland communities by non-native grasses and shrubs.
- ◆ The use of pesticides may have direct lethal and sub-lethal effects as well as reducing critical insect food sources during breeding season.

Conservation & Management Objectives

- ◆ Apply conservation and management objectives as set out in the “Proposed Recovery Strategy for the Horned Lark *strigata* subspecies (*Eremophila alpestris strigata*) with consideration for the Vesper Sparrow *affinis* subspecies (*Poecetes gramineus affinis*) in Canada.

- ◆ Assess, inventory and monitor using methodology set out in the RISC standards #15 Inventory Methods for Forest and Grassland Songbirds Version 2.0

Specific activities should include:

- ◆ Surveys should be undertaken for singing males in high suitability grassland habitats to determine if any remnant breeding pairs of the *strigata* subspecies still exist. A detailed study of the breeding biology of a well established population (e.g. in the Puget Lowlands) should be undertaken as well as studies that assess the impacts of cowbird nest parasitism.
- ◆ Protect known nest sites from human disturbance, including prohibition of all recreational activities near nesting areas; and modify mowing regimes to avoid nest destruction.
- ◆ Identify suitable breeding and rearing habitat and targeted for acquisition or long-term stewardship agreements (e.g. agricultural set-asides) with landowners. Although suitable habitat is likely limited at present, some suitable habitat likely exists and more could be made available through habitat restoration activities.
- ◆ Work to reduce the need for industrial and cosmetic pesticide use through broader application of integrated pest management programs.
- ◆ Effective long-term control and reduction in competition from invasive or aggressively spreading vascular plants (e.g. invasive grasses, Scotch broom) must form part of strategies to protect and recover populations. Disturbance to native plant species and communities must be minimized during control activities.
- ◆ Consider implementation of controlled burning (where feasible) to induce natural processes and maintain short-grass communities.
- ◆ Recent stewardship initiatives to manage for old-field communities in the Fraser Delta (e.g. Delta Farmland Wildlife Trust) would be of value as a model for the conservation of this subspecies.

This species is listed under the Federal Species at Risk act (SARA) and is subject to protections and prohibitions under the Federal Migratory Birds Convention Act and BC Wildlife Act. Habitat for this species may also be governed under provincial and federal regulations including the Fish Protection Act and Federal Fisheries Act as well as Regional and local municipal bylaws.

Content for this Factsheet has been derived from the following sources

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Every effort has been made to ensure content accuracy. Comments or corrections should be directed to the South Coast Conservation Program: info@sccp.ca. Content updated August 2010.

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