

## FARM PRACTICE

## HABITAT MANAGEMENT

### Description

British Columbia farmers are responsible for the management of a significant portion of the province's most productive land. This land tends to be located in valley bottoms, which is where many of B.C.'s indigenous species also reside. This means that farmers own the land on which many plants, birds, fish and wildlife species depend for habitat.

Many different land types and land uses can apply to a farm. Land types can include fields, wetlands, wooded areas, floodplains, riparian areas and watercourses. Land uses can include cropping, pastures, farm structures, storage, husbandry and silviculture.

The challenge for farmers and environmental agencies is to accommodate agriculture productivity while taking into account fish and wildlife needs. There are beneficial management practices that balance agronomic, economic and ecological concerns, and which ensure that the long-term sustainability of both agricultural enterprise and the environment is satisfied.

### Activities and Operations

#### Channel Maintenance

Many streams and ditches that run through agricultural lands are sensitive areas which require careful management. Regular maintenance of drainage outlets and irrigation intakes is essential. Maintenance schedules for licensed works are often covered by water licenses. For any works in and about a watercourse, authorizations must be obtained from the Department of Fisheries and Oceans (DFO). A *Fisheries Act* approval is required from the DFO for maintenance works in channelized and natural streams. Under British Columbia's *Water Act*, approval must also be obtained from the Ministry of Environment before doing any work in and about a stream. The *Agricultural Watercourse Maintenance Guide* should be followed for constructed ditches.

See also Farm Practice:      [Drainage](#)  
                                         [Irrigation](#)

#### Riparian Habitat Protection

Riparian habitat is important to protect water quality; to regulate water temperature and stream flows; to stabilize stream banks and reduce erosion and sediment input; to provide a source of cover for fish from predators and solar radiation; and to provide organisms and leaf litter which become the primary nutrient source that drives the aquatic ecosystem.

The *Fish Protection Act* requires that a process be developed for riparian protection in agricultural areas. In addition and prior to any vegetation management or works being carried out in a riparian area,

authorizations must be obtained from the Department of Fisheries and Oceans. A riparian health assessment tool has been developed to assist producers in determining the level of riparian protection which is acceptable to environmental agencies in agricultural areas.

### **Floodplains**

Floodplains are typically low-lying areas or valley bottoms which are occasionally wetted by overflows from streams during storm or freshet events. Seasonally-flooded lands in British Columbia contain habitats that may be used by regionally important fish stocks.

### **Wetlands**

Wetlands are typically very sensitive and very productive environments. Wetlands are often home to many species and play a key role in water storage and filtration. Soils within wetlands are usually high in peat content and require special care. Parties wishing to establish cooperative wetland protection projects can contact organizations such as Ducks Unlimited.

### **Wildlife Habitat Reserves**

The Agricultural Land Commission has a policy on wildlife habitat reserves which clarifies definitions associated with substantial works and which specifies when an application under the *Agricultural Land Commission Act* is required.

## **Related Farm Practices**

Other farm practices that pertain to habitat management include, but are not limited to, the following.

### **Land Clearing**

The clearing of land for agricultural purposes may have significant negative impacts on fish and wildlife habitat. Clearing to the edge of a watercourse may damage important fish habitat and may therefore require approval from the Department of Fisheries and Oceans. Habitat issues should be considered prior to developing a land clearing plan.

See also Farm Practice: Land Clearing

### **Wildlife Damage Control**

Producers need to protect their land and crops from destructive wildlife. Conditions surrounding appropriate measures for such control are outlined in the farm practice fact sheets noted below.

See also Farm Practices: [Wildlife Damage Control – Interior BC](#)  
[Wildlife Damage Control – South Coastal BC](#)

## **Legislation**

Information on federal and provincial legislation can be found in Appendices B and C. Acts, regulations and bylaws that regulate or may affect habitat management include, but are not limited to, the following.

### **Federal Legislation**

The *Canada Wildlife Act* makes provisions for the conservation of Canadian wildlife.

The *Fisheries Act* protects fish and fish habitat in ditches, streams and wetlands.

The *Migratory Birds Convention Act* protects migratory birds which inhabit Canada.

The *Species at Risk Act* outlines measures to mitigate or prevent damage to habitat that may be caused by activities conducted around watercourses or in sensitive habitats.

## **Provincial Legislation**

The *Fish Protection Act* enables local governments to provide habitat protection measures along watercourses.

The *Wildlife Act* regulates hunting, angling and management of fish and wildlife resources.

## **Publications**

Publications that provide further information on habitat management include, but are not limited to, the following. Refer to Appendix D for details.

*Agricultural Building Setbacks from Watercourses in Farming Areas*

*Agricultural Watercourse Maintenance Guide – Lower Mainland and Vancouver Island*

*Best Management Practices: Farm Forestry and Habitat Management*

*Fringe Benefits: A Landowner's Guide to the Value and Stewardship of Riparian Habitat*

*Land Development Guidelines for the Protection of Aquatic Habitat*

*Riparian Management*

*Watershed Stewardship: A Guide for Agriculture*