



## Ecodistrict Profile

### Ecological Landscape Analysis Summary Ecodistrict 360: **Mulgrave Plateau**

An objective of ecosystem-based management is to manage landscapes in as close to a natural state as possible. The intent of this approach is to promote biodiversity, sustain ecological processes, and support the long-term production of goods and services. Each of the province's 38 ecodistricts is an ecological landscape with distinctive patterns of physical features. (Definitions of underlined terms are included in the print and electronic glossary.)

This Ecological Landscape Analysis (ELA) provides detailed information on the forest and timber resources of the various landscape components of Mulgrave Plateau Ecodistrict 360. The ELA also provides brief summaries of other land values, such as minerals, energy and geology, water resources, parks and protected areas, wildlife and wildlife habitat.

The Mulgrave Plateau Ecodistrict is located west of the Strait of Canso and northwest of Chedabucto Bay. These two bodies of water make the area prone to strong coastal winds. The total area of the Mulgrave Plateau Ecodistrict is 102,824 hectares.

Two plateau portions of the ecodistrict comprise extensive areas of imperfectly drained level to hummocky topography. The steep slopes of these plateaus, approximately 200 metres above sea level, are well-drained and support a mixture of shade-tolerant hardwoods and softwoods.

Low relief drumlins dot the eastern portion of the ecodistrict around Goose Harbour Lake. The Roman Valley River flows toward Chedabucto Bay via the Milford Haven River which, along with Guysborough Harbour, is an example of a drowned estuary in which the mouth of a river is submerged due to a rise in sea level.



Two plateau areas, separated by the Milford Haven River, are forested with black spruce, white spruce and balsam fir on the level to hummocky topography with maple and yellow birch on smaller hills and drumlins such as this one at Clam Harbour Lake.

The granites and associated metamorphic rocks of the Cape Porcupine Complex underlie Porcupine Mountain and are an important source of bedrock aggregate.



Porcupine Mountain is an important source of crushed rock.

The forests on the well-drained, coarse-textured hills that border the Strait of Canso and Chedabucto Bay are similar to the coastal forests of the Atlantic Coastal Ecoregion. On the plateau, red maple and yellow birch dominate

the drumlins with scattered sugar maple on the lower slopes. Elsewhere on the gently undulating plateau, a softwood forest of balsam fir, white spruce, and black spruce dominate. But where soils are deeper, better-drained and slightly richer, a mixedwood forest of yellow birch, red maple, white spruce, and balsam fir will occur.

Provincial Crown land ownership accounts for approximately 37% of the total Mulgrave Plateau Ecodistrict area. About 59% of the ecodistrict is under private ownership.

Landscapes are large areas that function as ecological systems and respond to a variety of influences. Landscapes are composed of smaller ecosystems, known as elements. These elements are described by their physical features – such as soil and landform – and ecological features – such as climax forest type. These characteristics help determine vegetation development.

Element descriptions promote an understanding of historical vegetation patterns and the effects of current disturbances. This landscape analysis identified and mapped eight key landscape elements – one dominant matrix element, six smaller patch elements, and a corridor element – in Mulgrave Plateau.

**Tolerant Hardwood Hills** is the matrix element, representing 52% of the ecodistrict. This element naturally supports climax forests of long-lived species that generally grow well in shade, such as sugar maple, beech, and yellow birch, which dominate on crests and upper and middle slopes. On lower slopes, shade-tolerant species such as red spruce, hemlock, and yellow birch are found, along with white spruce.

Forests of black spruce, white spruce, and balsam fir are most common in **Spruce Pine Flats**, the largest patch element. The remaining patch elements, in order of size, are **Tolerant Hardwood Hills and Drumlins, Wetlands, Floodplain** – with the largest floodplain on the Milford Haven River – **Salt Marsh**, and **Coastal Beach**.

**Valley Corridors** is a linear element associated with the major watercourses in the ecodistrict.