

# Non-vascular plant biodiversity in mixedwood forests

Lead by: Ellen Macdonald

Theme: Vegetation

Status: Continuing

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## Participants

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## Background

Non-vascular plants (mosses and liverworts) have exacting conditions for establishment and survival in forest ecosystems. The composition and diversity of bryophyte assemblages is typically related to micro-habitat availability and micro-environmental conditions. Dispersal constraints may also be important.

## Objectives

To understand factors and processes influencing bryophyte diversity and composition in mixedwood forests and the influence of disturbance by partial-harvesting and fire upon this.

## Key Results

In un-managed conifer-dominated forest, the diversity and composition of bryophytes can be largely related to the availability of key micro-habitats for establishment: i.e., downed logs, stumps, standing dead and live trees, disturbed patches on the forest floor. Diversity and composition of bryophytes on woody substrates

varies with the species of wood (conifer vs hardwood), the type of wood (downed dead, stump, standing dead, live), and the stage of decay for dead wood.