

Inventory form for estimating carbon stocks in wetlands

Section 1 – Station description			
Station number:		Date and time:	
Name(s) of evaluator(s):		Project name:	
Coordinates (lat/long decimal degrees) : (_____ . _____) °N, (_____ . _____) °W WGS84 ¹			
Photos (general view of station, view of each vegetation stratum): _____			
Disturbances observed? <input type="checkbox"/> Yes <input type="checkbox"/> No			
Type of disturbance (if applicable): <input type="checkbox"/> Windthrow <input type="checkbox"/> Road <input type="checkbox"/> Partial cut <input type="checkbox"/> Clearcut <input type="checkbox"/> Drainage			
<input type="checkbox"/> Fire <input type="checkbox"/> Rutting <input type="checkbox"/> Fill/excavation <input type="checkbox"/> Other disturbance: _____			
Percentage of station covered by the disturbance (if applicable): _____ %			
Station status: <input type="checkbox"/> Preserved <input type="checkbox"/> Moved			
Comments: _____			
Section 2 – Soils			
Soil organic carbon			
Measurement	Thickness of organic deposit (cm) (include litter in the measurement)	Did the probe/auger reach the mineral deposit? (Yes/No) ²	Type of mineral deposit on contact (e.g. clay, silt, loam, sand or not identifiable (not collected))
Sub-plot 1			
Sub-plot 2			
Sub-plot 3			
Decomposition of organic matter (if organic deposit thickness ≥ 30 cm) ³ : <input type="checkbox"/> Fibric <input type="checkbox"/> Mesic <input type="checkbox"/> Humic			
Photos (decomposition level; organic/mineral contact zone): _____			
Comments: _____			

¹ Spatial reference system common on cartographic applications (e.g. Google Maps).

² If the mineral deposit is not reached on the 1st attempt (obstruction), a 2nd attempt should be made in the same sub-plot and the measurement must be noted on the 2nd line.

³ Record the decomposition level in the intermediate depth zone (50-100 cm) if possible. If the organic deposit is less than 50 cm thick, the decomposition level of the entire deposit should be recorded.

Section 3 – Woody biomass (continued)

Additional space for recording measurements

Stratum	Species	Diameter at breast height (DBH) (cm) (Measured at 1.3 m high)	Diameter at stump height (DSH) (cm) (Measured at 15 cm high)

Section 4 – Identification of the wetland type

Wetland type:

- Freshwater marsh Saltwater marsh Shrub swamp Forested swamp
 Forested peatland Open fen Open bog

Level of certainty in wetland identification: Low Medium Good Excellent

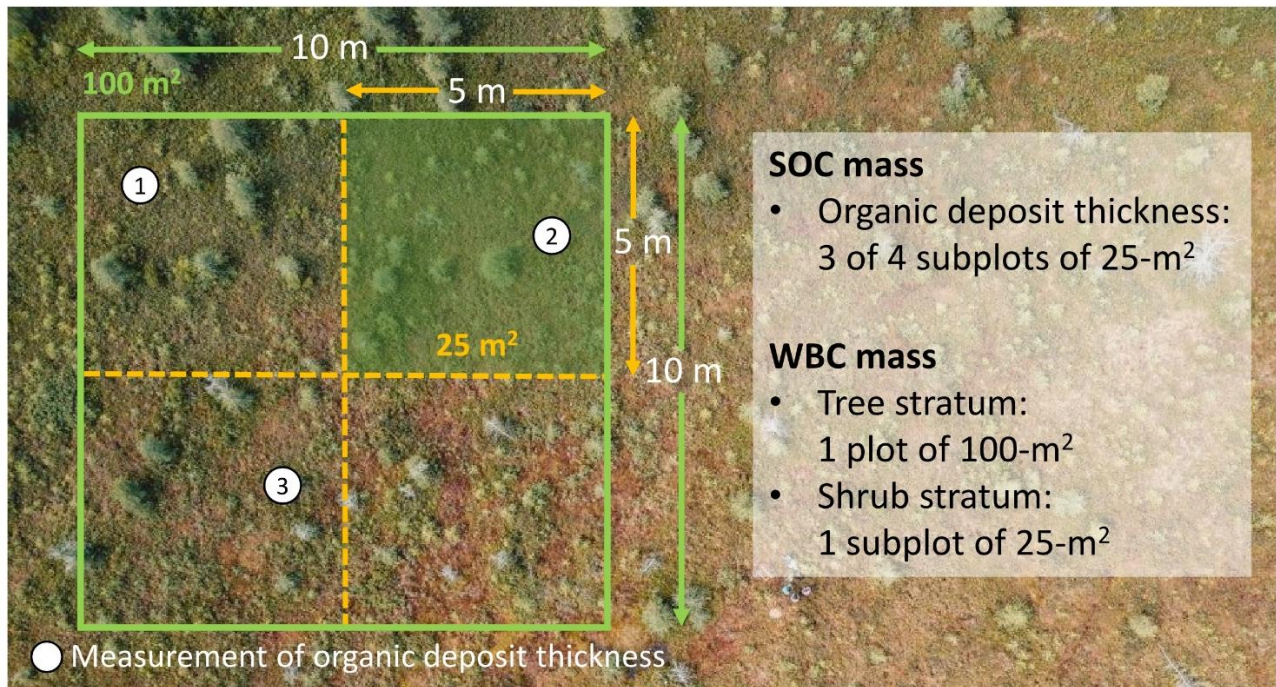
Wetland type according to wetland mapping¹⁰:

- Marsh Swamp Forested peatland Open fen Open bog Non applicable / not mapped

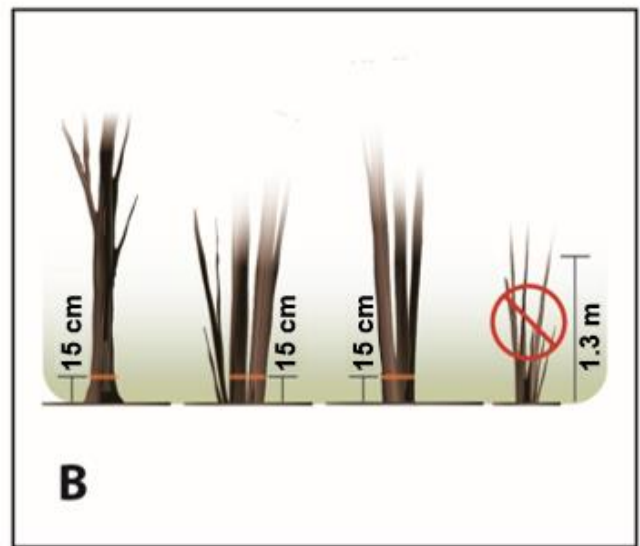
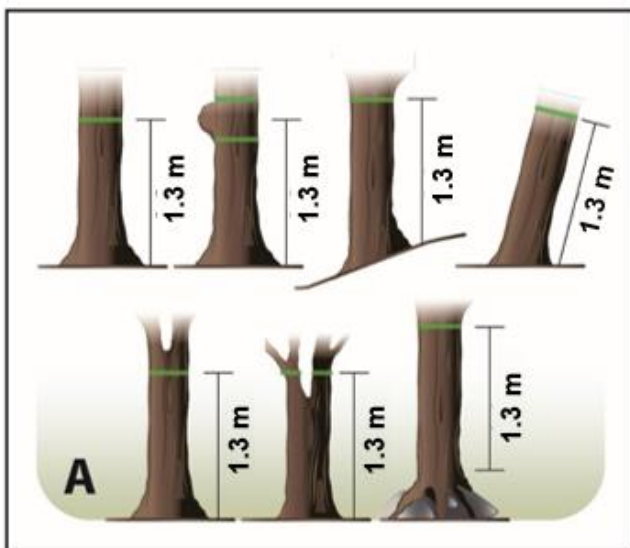
General notes: _____

¹⁰ Public mapping, Ducks unlimited wetland inventory, etc.

Reference



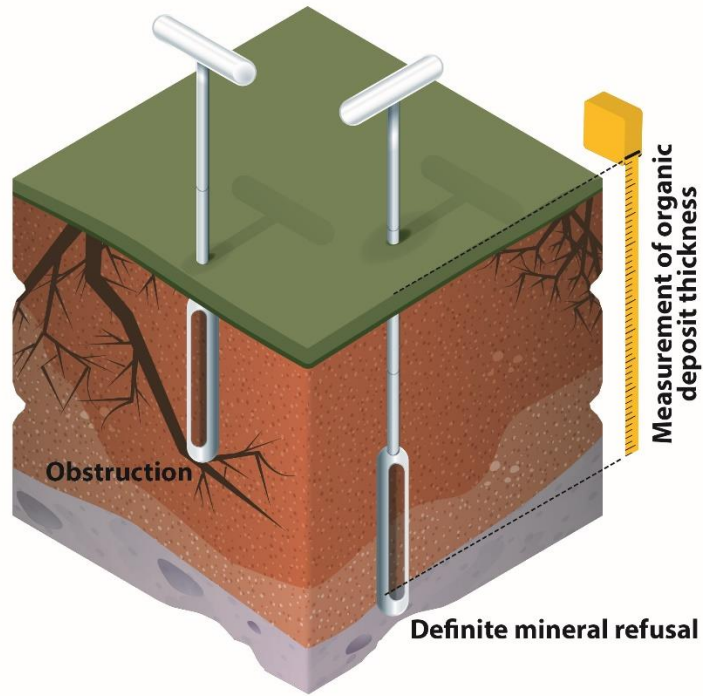
Summary diagram of SOC and WBC measurements to be carried out at an inventory station.



Location of the measurements of A) DBH and B) DSH according to different growth patterns for trees and shrubs. For each DSH measurement, a DBH measurement must also be taken. If multiple stems separate between 15 cm and 1.3 m high, measure the DBH only for the largest stem of the cluster.



Degree of organic matter decomposition: fibric, mesic and humic.



Example of an obstruction when inserting the probe into the organic deposit and a definite mineral refusal when the mineral deposit is reached.

List of species common to southern Québec wetlands for which DSH must be measured

Taxon – common name	Taxon – scientific name
Serviceberry	<i>Amelanchier spp.</i>
Black chokeberry	<i>Aronia melanocarpa</i>
Hawthorn	<i>Crataegus spp.</i>
Dwarf birch	<i>Betula pumila</i>
Chokecherry	<i>Prunus virginiana</i>
Pin cherry	<i>Prunus pensylvanica</i>
Honeysuckle	<i>Lonicera spp.</i>
Dogwood	<i>Cornus spp.</i>
Leatherwood	<i>Dirca palustris</i>
Northern bush honeysuckle	<i>Diervilla lonicera</i>
Common winterberry	<i>Ilex verticillata</i>
Canadian yew	<i>Taxus canadensis</i>
Sweet gale	<i>Myrica gale</i>
Mountain holly	<i>Nemopanthus mucronatus</i>
Buckthorn	<i>Rhamnus spp.</i>
Beaked hazelnut	<i>Corylus cornuta</i>
Common ninebark	<i>Physocarpus opulifolius</i>
Mountain ash	<i>Sorbus spp.</i>
Spirea	<i>Spiraea spp.</i>
Staghorn sumac	<i>Rhus typhina</i>
Elderberry	<i>Sambucus spp.</i>
Viburnum	<i>Viburnum spp.</i>