

# Farm Woodlot Management Plan Template

Name of the Woodlot \_\_\_\_\_

Owner of the Woodlot Is: \_\_\_\_\_

Legal Description - section\_\_\_\_\_ township\_\_\_\_\_ range\_\_\_\_ meridian\_\_\_\_

**My objectives of owning the Woodlot are** - (this could include very varied reasons , such as : *financial, bio-diversity, wildlife, personal health, old growth forest, family heritage, etc.*)

This template is a step by step out-line for the development of a management plan for a woodlot of any size, this means that not all steps will apply to all woodlots due to the high variability of each woodlot.

## Step 1.0

1.1 The first thing that you should do is write a brief history of your woodlot, this could include, *how long you have owned the land what the land was used for in the past i.e. farming, grazing, was it logged, have trees been planted or any other points of interest. This is more for those that will follow your ownership, as otherwise this history may be lost.*

1.2 Timber type map is a must for all woodlot management plans, this is a tool that one uses for all management of the woodlot. (**see**

appendix 1 for timber typing ) You will have to get a professional to construct the map from aerial photos. But you can add things that do not show on the photographs such as, *boundary of the woodlot, fences, gates, trails, etc.*

The map must have a legend that includes, the scale in metric or imperial, and any symbols used to identify things.

Your map should not be smaller than 6 inches to a half mile, otherwise it will become too cluttered to work with.

Each timber type should be numbered.

1.3 Aerial photography, there are a number of different types aerial photos available which are:

- a) Aerial photos come in overlapping pairs in order to see stereo to see tree heights these are commercially used to type out timber types and all features shown on the photos.
- b) Satellite photos these are a picture of your land, Google Earth is developing a program of polygons to measure areas
- c) Photos from drone again are only a picture of your land.

*(You can purchase Aerial photos at - Air Photo Distribution @ 780-427-3520)*

## Step 2.0

This step deals with obtaining the age and volume in cubic metres and condition of each timber type.

2.1 The average age of each species in each timber type should be established. This can be obtained by: a) fell several trees and count the rings and average the age. b) with the use of an increment bore drill the tree and extract the core and count the rings on it.

Ages are taken at two heights either at 12 inches or at 4.5 feet from the ground, but you must add the years it took to grow to that height.

The rule of thumb used is :

	at 12" stump height	at 4.5' from ground
Spruce	add 5 years	add 15 years
Pine	add 3 years	add 10 years
Aspen	add 2 years	add 6 years

*(aspen trees rings are hard to count as there is not a very great difference between spring and summer growth)*

2.2 There are several means to obtain how much volume in cubic meters your woodlot contains this is important in order to put a value on the woodlot, these are:

- a) You or an experienced logger can do an ocular estimate of each type, this can be as accurate as a cruise using sample plots but only if the timber type is small and homogeneous .
- b) You can do your own sample plots using one of several methods that are in several planing manuals, but this is not as easy as it may seem, also you would require some tools in order to carry this out. *(See section F1 Inventory in the Woodlot Management Guide)*
- c) You can employ a forest consultant who is experienced in carrying out these timber estimates. If you employ one ensure that you and they fully understand what information you want, including the costs incurred.

2.3 Regardless of what system you use to obtain the volume of each timber type, you should also record the condition of the timber, whether it is infected with, insects, diseases, experiencing wind damage, or healthy and growing well, etc.

This is important in that it will govern when it should be harvested also the age of the stand will influence your decision.

The rule of thumb for maturity of trees is:

	Young	immature	mature	over-mature
Spruce	45yrs.	70yrs.	110 yrs.	150yrs.
Pine	30yrs.	50yrs.	90yrs.	130yrs.
Aspen	25yrs.	40yrs.	70yrs.	90yrs.

*(Age alone does not indicate that the trees should be harvested for all species, the spruces can live up to 250 years, Pine up to 190 years whereas the Aspen seldom last longer than 100 years)*

2.4 Once all the information of all the timber types has been gathered and to give you a clear picture of what your woodlot contains. All of the information should be put on a spread sheet.

*(see appendix 2)*

- a) But before you can complete the spread sheet, you will have to get the total area of each timber type. The easiest method to obtain either the acres or hectare is with the use of a “dot grid” this is a clear plastic sheet covered with dots. Count the number of dots in each timber type and multiply by what each dot represents in either acres or hectare. *To obtain what each dot represents in either hectares or acres count the dots in a given area i.e. a legal subdivision (40 acres) on your map and divide the number of dots that you count into 40 acres if using acres or the number of hectares. ( 25 dots counted divide into 40 acres = 1.6 acres per dot.*

### Step 3.0

This step covers a large number of objectives, some but not all will apply to all woodlots because not all for an example would contain a creek or a muskeg, therefore they will not be any comments about them. So write about those that apply to your woodlot.

3.1 Water is one of the most important conservations areas in our woodlots. Therefore you should give a reasoned account of how you plan to deal with them.

Creeks - consider - riparian zone - crossings i.e. bridges, culverts, fords, etc.

Muskegs - consider - long term retention, harvesting, draining and converting to highland, etc.

Erosion Control - method used to prevent erosion on roads/trails, logging in summer/winter time, etc.

3.2 Wildlife - list those animals that use the woodlot, this will range from fur-bearing, ungulates, avian ,etc.

What would you do to increase habitats for the wildlife or allow hunting or trapping.

3.3 Silviculture - consider - planting, thinning & pruning, chemical spraying etc.

3.4 Harmful Agents - list - insects & deceases, physical damage by wind or snow, etc.

3.5 Woodlot Speciality Products - these include a large number of products that serve a niche market such as - Christmas trees, wild berries, mushrooms, dry flowers, mosses, cones, fence posts, firewood, etc, etc.

3.6 Recreation - list - activities that take place during the summer months and winter events, and any tours you may give to groups for outings and education, etc.

3.7 Forest Flora - list - what grows in the woodlot other than trees such as Labrador Tea, Alders, Saskatoon's, Blueberries, etc. Should there be berry patches in the woodlot it is good to mark these on the map to remind one not to destroy them when carrying out some mechanical work, such as logging or road construction.

3.8 Harvesting - Should you contemplate to do some harvesting within the next 5 to 10 years (*if further into the future than 10 years it need not be listed because conditions may change by then*) list whether you would look at - *clearcutting and size of blocks - partial cut - summer or winter logging - horse logging etc.*

3.9 Soils - To understand soils go to your Woodlot Management Guide for the Prairie Provinces, Section I Woodlot Assessment C this gives a very simplified explanation of soils. You can also use the observations you have knowledge of such as - clay, sandy wet, and active erosion etc.

## Step 4.0

This step deals with protecting the woodlot from invasive agents, such as insects, diseases, weeds, animals, and forest fires.

4.1 Insects if you have observed a harmful insect, make note of it and whom to contact for professional help. Also list what action to take should outsider invaders such as the pine beetle or spruce bud worm enter the woodlot.

4.2 Diseases these are hard for layman to identify therefore the best is to know whom to contact for professional guidance, **list the contact address.**

4.3 Weeds there are a large number of invasive weeds that should be removed, should you find some, contact the local agriculture field-person for advise, and **list their contact address.**

4.4 Animals there are only two that will cause damage these are the porcupine and beaver. The porcupine will not cause enough damage that they need be removed, but the beaver does and can cause a great deal of damage due to excessive flooding and removal may be required. List what methods should be used.

4.5 Forest Fires this is the greatest danger that the woodlot owner faces for a fire can destroy the forest in your woodlot in hours. Therefore considerable thought should be given to what you can do to reduce the loss. consider - preparing a map that can be given to the fire fighters, showing access roads/trails and points of danger i.e. oil/gas pipelines and location of water source for pumps.

*Note: You may wonder why there has not a “step” to calculate an annual allowable - cut, this is because the area and volume of most woodlots is to small to calculate one. Therefore if you harvest some of your timber will be due to the condition and the price of it, not on an annual allowable - cut.*

The question is asked “**why have a management plan**”. The answer to this is rather simple, which is “ **history has taught us that those who did not manage their forests ended up losing them even to the last tree**” That was because no-one knew what the plan was to preserve the forest, unfortunately there was no plan.

**Therefore as a woodlot owner it is very important to have a management plan in order to ensure that your woodlot remains a forest. In particular for the next generation who will need this plan even more than you to manage it in a continuous progressive way to keep it forested.**



