CIHM/ICMH
Microfiche
Series.

CIHM/ICMH
Collection de
microfiches.

1980
**Technical Notes / Notes techniques**

The Institute has attempted to obtain the best original copy available for filming. Physical features of this copy which may alter any of the images in the reproduction are checked below.

- **Coloured covers/**
  - Couvertures de couleur

- **Coloured maps/**
  - Cartes géographiques en couleur

- **Pages discoloured, stained or foxed/**
  - Pages décolorées, tachetées ou piquées

- **Tight binding (may cause shadows or distortion along interior margin)**
  - Reliure serrée (peut causer de l’ombre ou de la distortion le long de la marge intérieure)

- **Additional comments/**
  - Commentaires supplémentaires

**Bibliographic Notes / Notes bibliographiques**

- **Only edition available/**
  - Seule édition disponible

- **Bound with other material/**
  - Relié avec d’autres documents

- **Cover title missing/**
  - Le titre de couverture manque

- **Plates missing/**
  - Des planches manquent

- **Additional comments/**
  - Commentaires supplémentaires
The images appearing here are the best quality possible considering the condition and legibility of the original copy and in keeping with the filming contract specifications.

The last recorded frame on each microfiche shall contain the symbol —— (meaning CONTINUED”), or the symbol ▼ (meaning “END”), whichever applies.

The original copy was borrowed from, and filmed with, the kind consent of the following institution:

* Library of the Public Archives of Canada

Maps or plates too large to be entirely included in one exposure are filmed beginning in the upper left hand corner, left to right and top to bottom, as many frames as required. The following diagrams illustrate the method:

<table>
<thead>
<tr>
<th>1</th>
<th>2</th>
<th>3</th>
</tr>
</thead>
</table>

```
1 2 3
```

```
1
2
3
```

```
1 2 3
4 5 6
```
ARBOR DAY

A FEW ADVICES TO FARMERS
ON THE
PLANTING OF FOREST
AND
ORNAMENTAL TREES.

Published for free distribution by order of the Legislative Assembly of the Province of Quebec.
ARBOR DAY

A FEW ADVICES TO FARMERS
ON THE
PLANTING OF FOREST
AND
ORNAMENTAL TREES.

Published for free distribution by order of the Legislative Assembly of the Province of Quebec.

MONTREAL
EUSÈBE SENÉCAL & FILS, PUBLISHERS
ST. VINCENT STREET
1884
ARBOR DAY.

The first anniversary of the Arbor Day will occur in the ensuing month of May. The twelfth day of May has been selected this year for that celebration throughout the Province of Quebec.

The festival was well observed last year. In all parts of the province a great number of trees were planted. It is the duty of all to follow the noble example of the higher power, who, after having appointed the day of the festival, were the first to observe it, and to plant with their own hands trees destined to carry down to posterity the names of those whose patriotic idea it was to teach the people to love and respect their forests.

The first anniversary of the fête would be worthily observed by planting a greater number of trees than last year. We should profit by experience and avoid those errors which caused the death of a great proportion of the trees planted last year.

In order to succeed let us lay down a few rules for the guidance of those who wish to celebrate arbor day in a practical manner.
The six following questions should be studied by those who wish to plant successfully:

How to choose the plants?
How to get the plants?
How to treat the plants before planting?
How to prepare the land for planting?
How to plant?
How to treat the trees after planting?

*How to choose the plants?*—The first thing to do before planting, is to study the nature of the soil in order to select trees fit for it. All trees do not suit all soils, for the soil may be: clay, low, cool, gravel, damp, light, marshy, mountainous, stony, flat, deep, rich, sand, dry, shallow. Here follows a list of the most useful trees, and of the soils suited to each. With a choice of soils, we can plant any trees for which we may have a preference; but when restricted to a particular soil, we must plant those trees which sent it.

<table>
<thead>
<tr>
<th>TREES</th>
<th>SOILS</th>
</tr>
</thead>
<tbody>
<tr>
<td>Birches, the</td>
<td>Cool, sandy, shallow.</td>
</tr>
<tr>
<td>Ash, white</td>
<td>deep, rich</td>
</tr>
<tr>
<td>&quot; red</td>
<td>&quot; &quot; &quot;</td>
</tr>
<tr>
<td>&quot; elder-leaved</td>
<td>Low, damp, marshy.</td>
</tr>
<tr>
<td>Beech</td>
<td>Cool, gravel, mountainous, shallow</td>
</tr>
<tr>
<td>Maple, sugar</td>
<td>Gravelly, light, mountainous, stony, rich, dry</td>
</tr>
<tr>
<td>&quot; red (the plane)</td>
<td>Alluvium, gravel, damp, flat.</td>
</tr>
<tr>
<td>&quot; silver</td>
<td>Alluvium, damp, flat.</td>
</tr>
<tr>
<td>Oak, white</td>
<td>Oak, deep, dry.</td>
</tr>
<tr>
<td>&quot; red</td>
<td>Clay, cool, deep, dry.</td>
</tr>
<tr>
<td>Plant</td>
<td>Soil Conditions</td>
</tr>
<tr>
<td>-----------------------------</td>
<td>----------------------------------------</td>
</tr>
<tr>
<td>Elm, American</td>
<td>Alluvium, damp, flat, rich</td>
</tr>
<tr>
<td>&quot; red</td>
<td>Cool, mountainous, rich</td>
</tr>
<tr>
<td>Pine, Weymouth</td>
<td>Cool, damp, light, sand</td>
</tr>
<tr>
<td>&quot; rock</td>
<td>Poor, stony</td>
</tr>
<tr>
<td>&quot; soft</td>
<td>Cool, sand</td>
</tr>
<tr>
<td>&quot; red</td>
<td>Sandy, dry</td>
</tr>
<tr>
<td>Hemlock</td>
<td>Light, mountainous, stony</td>
</tr>
<tr>
<td>Fir</td>
<td>Low, damp, marshy</td>
</tr>
<tr>
<td>Willow</td>
<td>Clay, low, cool, damp, light, marshy, poor, flat, deep, rich</td>
</tr>
<tr>
<td>Mountain ash</td>
<td>Cool, mountainous</td>
</tr>
<tr>
<td>Poplar</td>
<td>Low, cool, light</td>
</tr>
<tr>
<td>Lime-tree or bass-wood</td>
<td>Cool, damp, deep, rich</td>
</tr>
<tr>
<td>Spruces, the— including the Norway’s</td>
<td>Cool, gravel, shallow</td>
</tr>
<tr>
<td>White cedar</td>
<td>Low, marshy</td>
</tr>
</tbody>
</table>

**How to get plants?**—10. By sowing, two or three years in advance, the seeds of the trees intended to be planted. This practice I only recommend to skilled horticulturists; 2o. By taking young plants from the forest when are already grown up and in good shape—these would be last in the brushwood when they crowd one another, but transplanted, they form fine trees; 3o. By buying young plants from the nurserymen.

If we proceed by means of seed, the plants may be set out at from one foot to four feet in height, *but no more*. When the plants are got from the forest, the common error is to select them from 8 feet to 20 feet in height! 80 o/o of these trees die. From the nurseryman, these plants can be sent by post, for 2 or 3 dollars a hundred, one foot high; and by express, from four to six feet, plants for 7 to 8 dollars a hundred. Four feet should never be exceeded.

**How to treat the plants before planting?**—All the success
of the plantations depends upon this. I saw, last year, trees fifteen feet in height, with a mass of earth only two feet in diameter attached, torn up; utterly deprived of their rootlets; with only two or three large naked roots growing from the trunk. Broomsticks would grow just as soon as these! To transplant trees of this size successfully, the attached mass of earth should be at least 7 or 8 feet in diameter. Hence the planting of trees of not more than 3 or 4 feet is to be preferred, and with them, a mass of 2 feet will secure the removal of all the rootlets with the plant, and their success is secured.

Great care must be taken to prevent the roots, especially the roots of the conifers, from drying before planting, and the following is a good mode of treatment: if they come by mail or by express, prepare beforehand a thick mess of cow dung, clay, and water. As soon as the plants arrive, dip the roots in this, and a layer of mud, impervious to the air, will be deposited on them. The same process should be followed out if the plants, taken from the forest or from the nursery, are not to be set out immediately.

**How to prepare the land intended to be planted?**—If a large number of trees are to be planted on moderate-sized piece of land, it should be ploughed and harrowed carefully. But if only a few ornamental trees are to be set out at wide distances apart, the spot where each is to be set may be treated with spade and hoe. In dry soils, or those only moderately damp, a trench may be formed, just deep enough to receive the plant to the same depth at which it stood in the forest or the nursery, and just wide enough to allow the
roots to be spread out easily. By the side of the trench, a quantity of fine, rich earth should be placed to fill it up when the plant is in place.

In a rocky soil, a trench, sufficiently wide to receive the roots of the youngling with ease, should be prepared, and good earth should be brought to fill up the trench.

As to low, damp soils, no trenches should be made; the plants set in them in such land would infallibly die; but, in the contrary, they should be set on the surface, the roots covered with mould (terrean) and with pieces of turf taken from the place where the butte or mounds is made. In this case, the earth must be brought to the place of plantation, and the turves required must be lifted from the immediate neighbourhood.

How to plant?—Two planters are better than one. While one selects the plants and trims the roots and branches, the other make a little mound at the bottom of the trench with fine mould taken from its side. He who holds the plant spreads its roots on the mound, and the assistant covers them with earth, carefully filling up all the interstices between the rootlets. When the roots are well covered, the trench is filled, and the whole well trodden down. If the soil is dry, the earth should be watered before the trench is completely filled, and then carefully trodden after the job is finished. A stake to tie the plant to with a straw or other band completes the operation.

How to treat the trees after transplantation?—First, the ties must not be allowed to be detached from the stake by
wind, etc. All weeds must be cleared away. If the season is dry, the trees should be mulched—a layer of straw, sawdust, tanbark, spread round it—thus preserving the moisture. If the tree seems lusk to take, it should be boldly pruned, though this remedy is not always efficacious.

By following out the precepts I have just enunciated, anyone can become a successful planter. And now let us all go to work! Let Arbor Day find us all, spade in hand, ready to plant, with all our preparations made beforehand, so that nothing may take us unaware. Let us consider where we are going to plant, provide ourselves with plants, and on the appointed day, not only individuals, but teachers, schools, convents, colleges, agricultural clubs and societies, should act in unison, and so behave, that on the day after the fête it may be said that all have contributed to the work of rewooding the country, and have shown that they understand the important part which the forest plays in rural economy.

J. C. CHAPAIS.