DUMBARTON OAKS GARDEN AND LANDSCAPE STUDIES

AMERICAN FORESTRY : BEAUTY IN UTILITY
MARCH 14, 2011

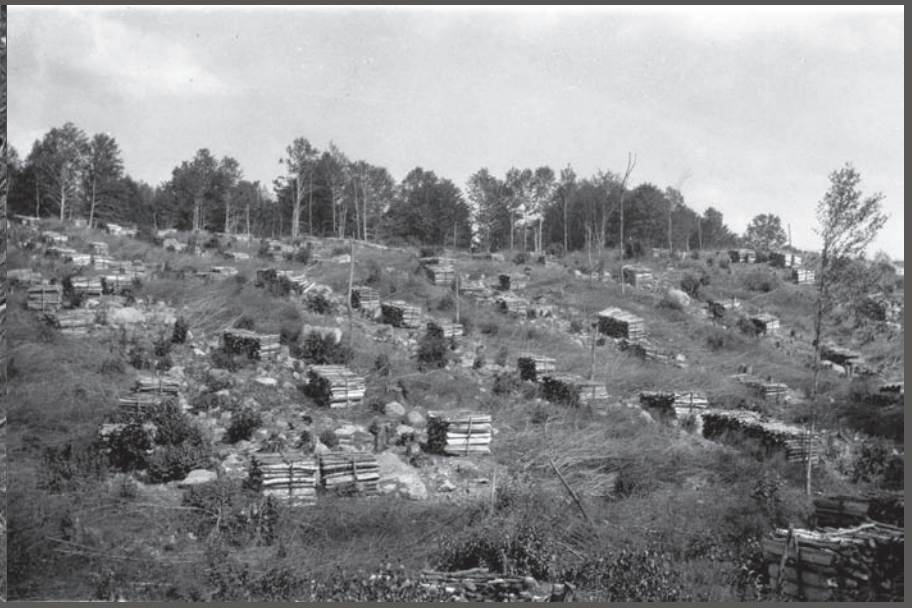
NANCY SEATON
CANDIDATE FOR MASTERS IN LANDSCAPE ARCHITECTURE, 2011
HARVARD UNIVERSITY GRADUATE SCHOOL OF DESIGN

Hamish Fulton
Southern England, 1977

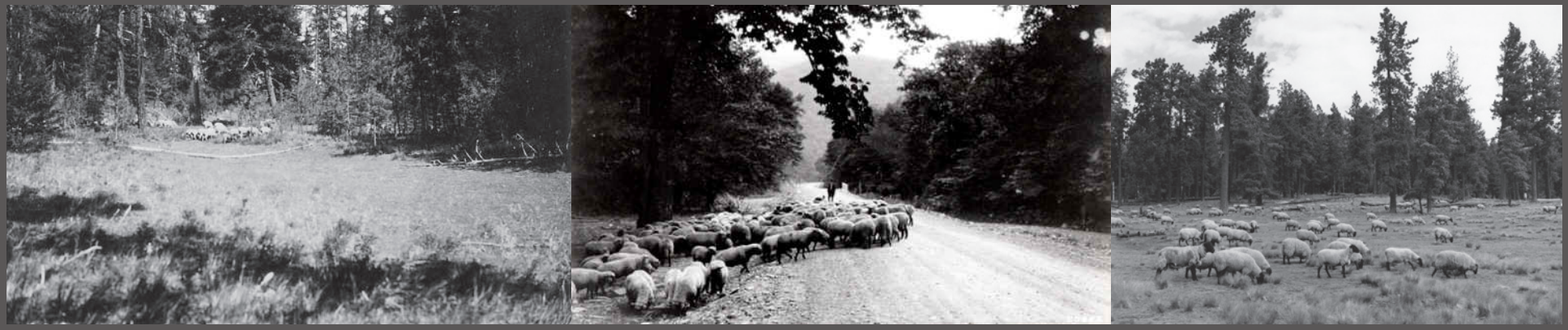
Hamish Fulton
Hollow Lane on the North Downs,, 1971

Hamish Fulton
Northern France, 1977

Slash Cutting, New Hampshire



Vermont Forest Cut and Production

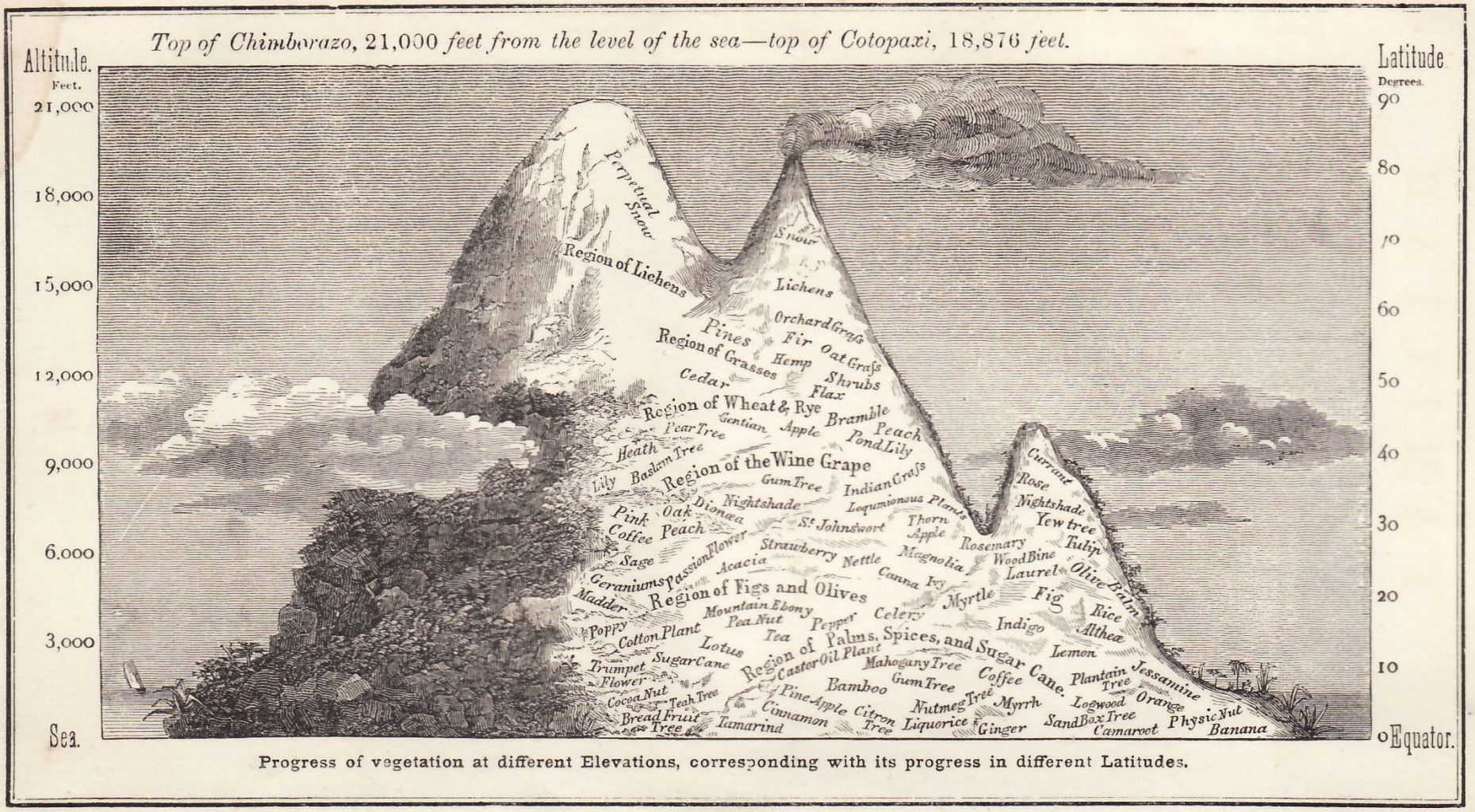


Grazing on Public Lands - Damage to Forest
Sheep in the Shenandoah

The Wooden Library in Alnarp is a unique collection of "books", each part describing a certain species or variety of tree or shrub. The collection consists of 217 volumes and was made in Nürnberg in Germany ca. 1805-1810.

Agriculture Science Center in Tsukuba, Japan

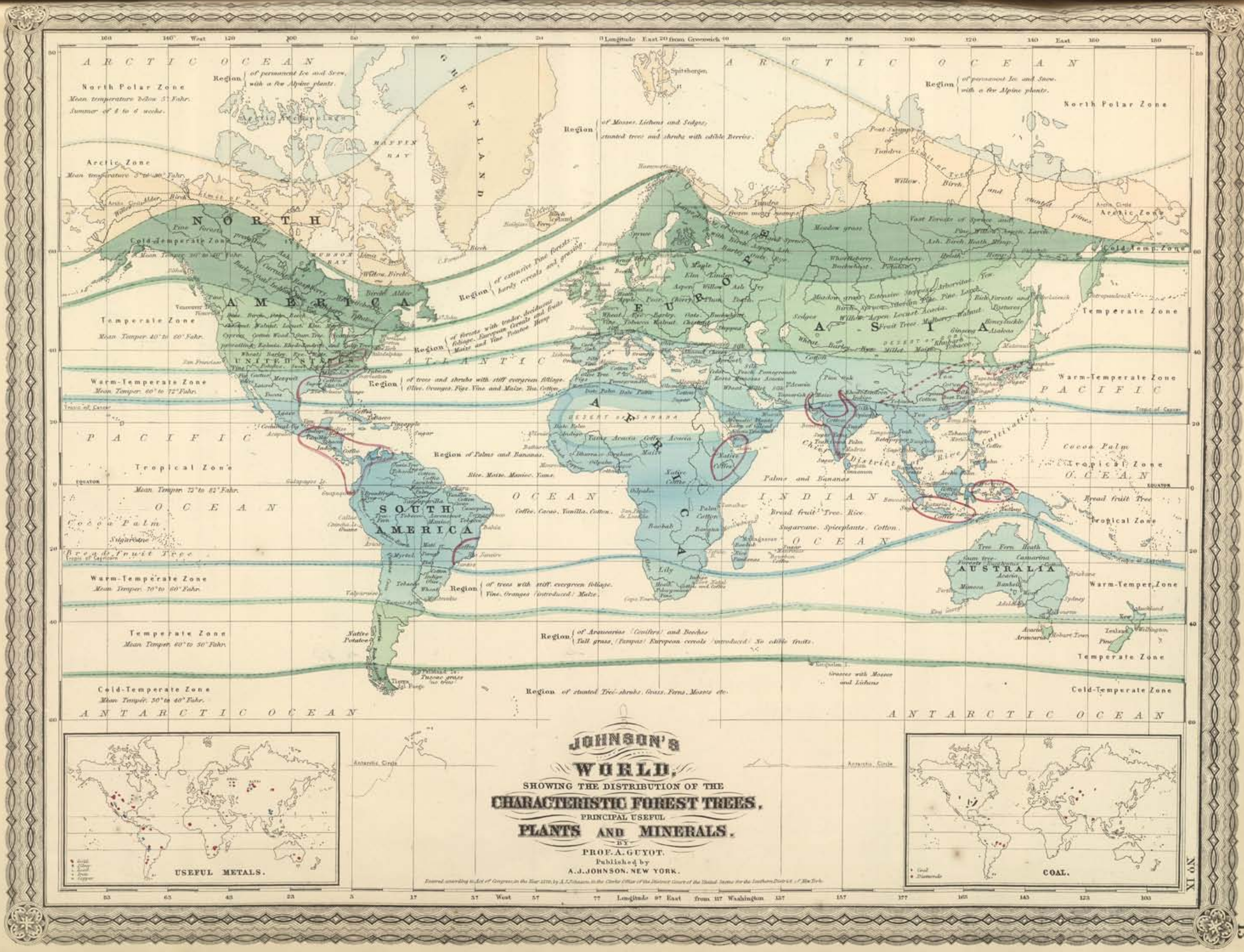
Polish Forestry Museum



Progress of vegetation at different Elevations, corresponding with its progress in different Latitudes.

Phytogeography

Alexander von Humboldt Travels to America: 1799-1804



JOHNSON'S
WORLD,
SHOWING THE DISTRIBUTION OF THE
CHARACTERISTIC FOREST TREES,
PRINCIPAL USEFUL
PLANTS AND MINERALS.
BY
PROF. A. GUYOT.
Published by
A. J. JOHNSON, NEW YORK.
ARCTIC OCEAN
North Polar Zone
Mean temperature below 5° Fahr.
Summer of 2 to 6 weeks.
Region of permanent Ice and Snow, with a few Alpine plants.
Region of Mosses, Lichens and Sedges, stunted trees and shrubs with edible Berries.
Arctic Zone
Cold-Temperate Zone
Temperate Zone
Mean Temper. 40° to 60° Fahr.
Warm-Temperate Zone
Mean Temper. 60° to 72° Fahr.
Tropical Zone
Mean Temper. 72° to 82° Fahr.
Region of extensive Pine forests, hardy cereals and grazing.
Region of trees and shrubs with stiff evergreen foliage. Olive, Oranges, Figs, Vine and Maize, Tea, Cotton.
Region of Palms and Bananas.
Rice, Maize, Manioc, Yams.
Coffee, Cacao, Vanilla, Cotton.
Bread fruit Tree, Rice
Sugarcane, Spiceplants, Cotton.
Region of trees with stiff evergreen foliage. Vine, Oranges (introduced) Maize.
Region of stunted Tree-shrubs, Grass, Ferns, Mosses etc.
NORTH AMERICA
SOUTH AMERICA
EUROPE
ASIA
AFRICA
AUSTRALIA
GREENLAND
PACIFIC
ATLANTIC
INDIAN OCEAN
ANTARCTIC OCEAN
USEFUL METALS.
COAL.
Longitude East from Greenwich
Longitude East from Washington

Royal Saxon Forest Academy at Tharandt

Measuring "primeval" oak

Homer House, Certain Features of German Forestry.
Albany: University of the State of New York, 1915

Black Forest spruce: 60,000 board feet/acre

Black Forest spruce: thinning to allow understory

Homer House, Certain Features of German Forestry.
Albany: University of the State of New York, 1915

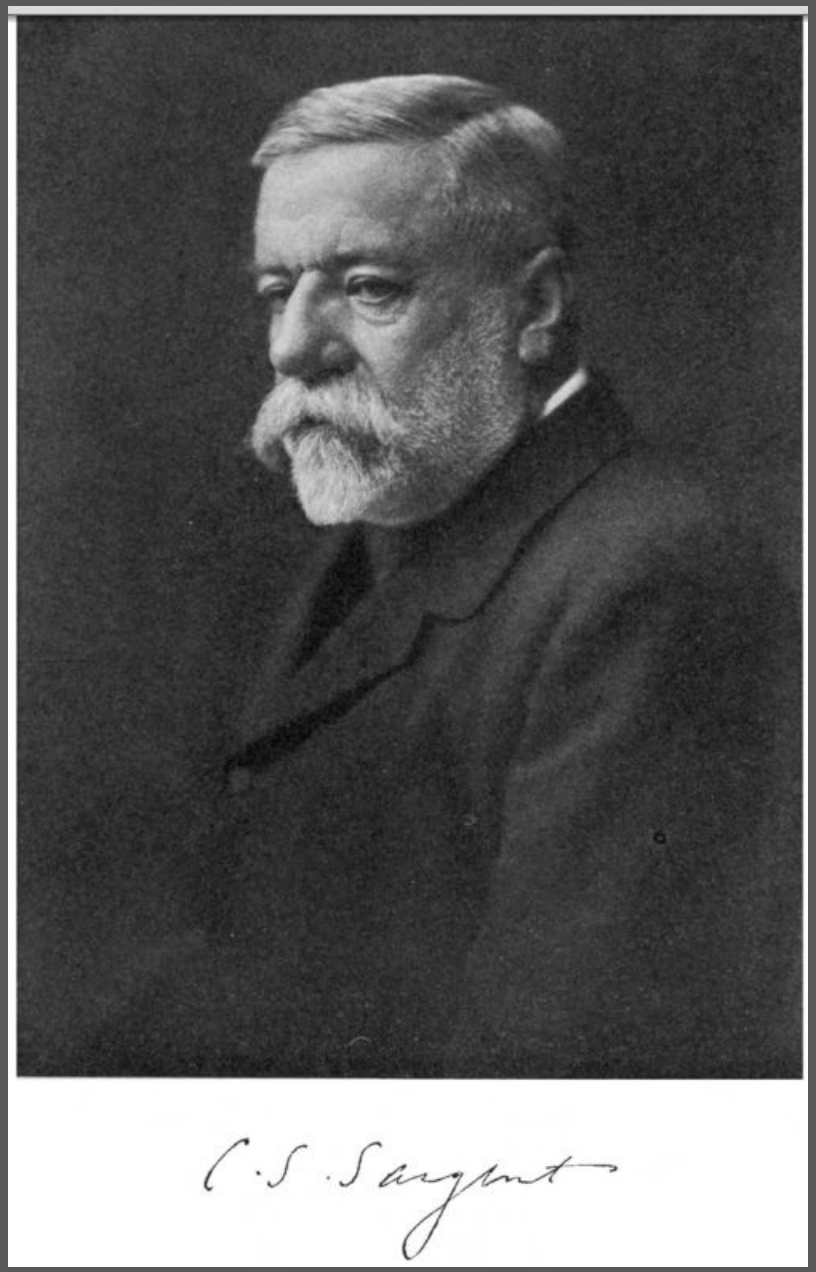
Forest products, deposited at railroad Frankenwaldof, northern Bavaria

Forest products, from thinning operations in Rhine valley

Homer House, Certain Features of German Forestry.
Albany: University of the State of New York, 1915

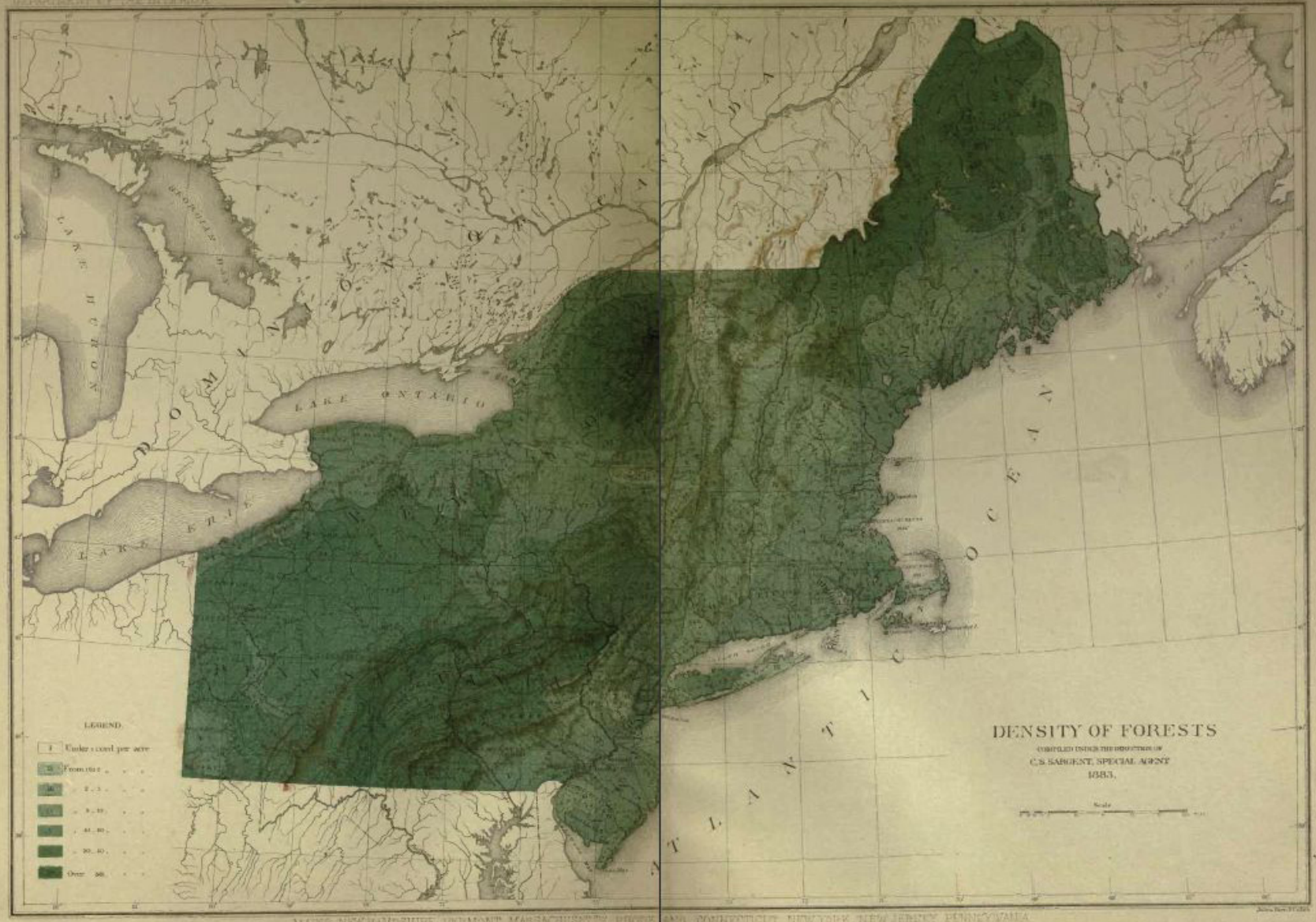
Spruce Forest, Bavaria

Gifford Pinchot
A Primer of Forestry. Wahington D.C.: Government Printing Office, 1905.

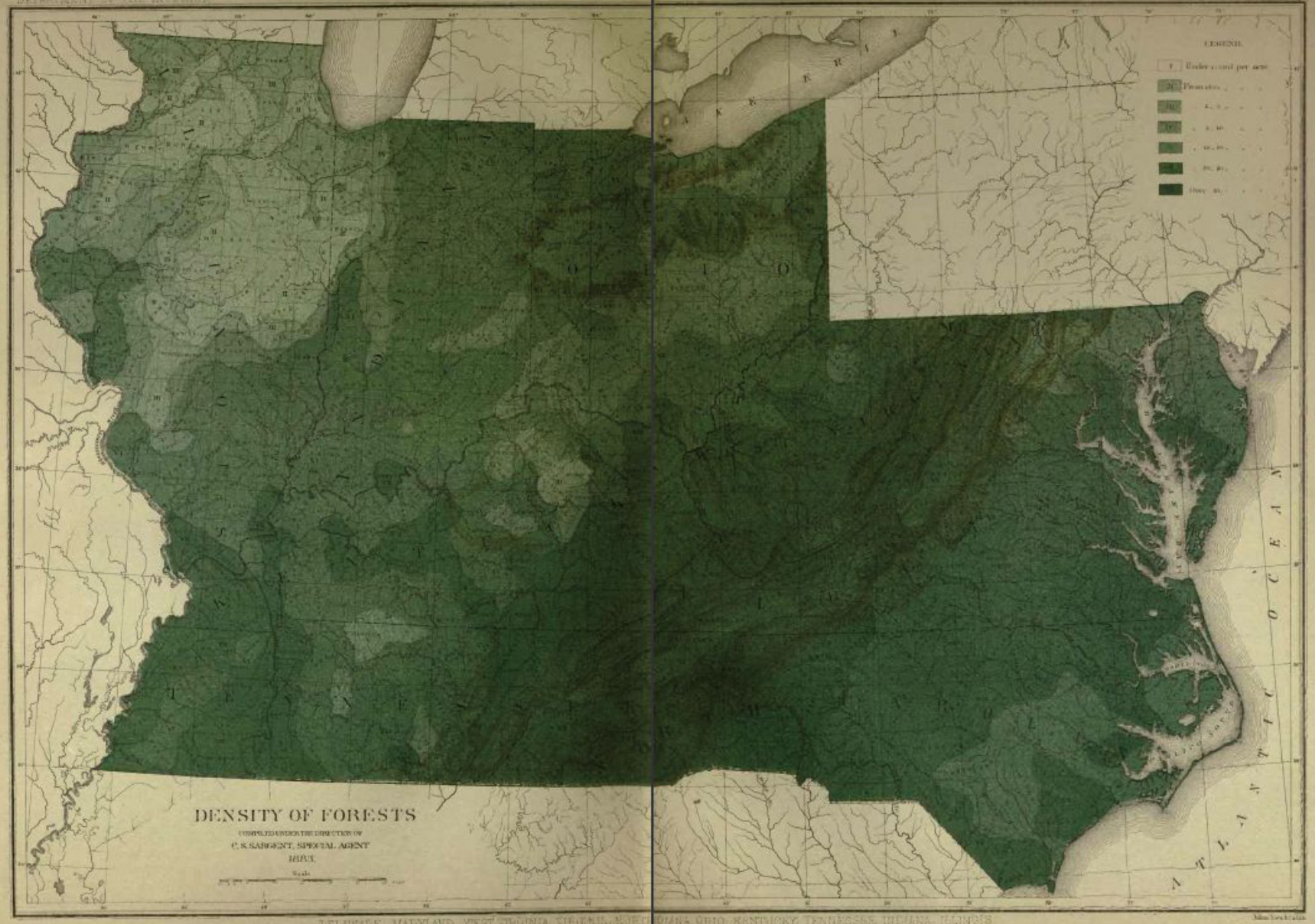


Forest Survey for the Nation's Tenth Census, 1884
Charles Sprague Sargent

MAP
SHOWING IN FIVE DEGREES OF DENSITY
THE DISTRIBUTION OF
WOODLAND
WITHIN THE TERRITORY OF THE
UNITED STATES.
1873.
Compiled by
Wm H. BREWER.



MAINE, NEW HAMPSHIRE, VERMONT, MASSACHUSETTS, RHODE ISLAND, CONNECTICUT, NEW YORK, NEW JERSEY, PENNSYLVANIA.


LEGEND
DENSITY OF FORESTS
COMPILED UNDER THE DIRECTION OF
C. S. SARGENT, SPECIAL AGENT
1880.
Scale
ATLANTIC OCEAN

VOL. I. NO. 1.

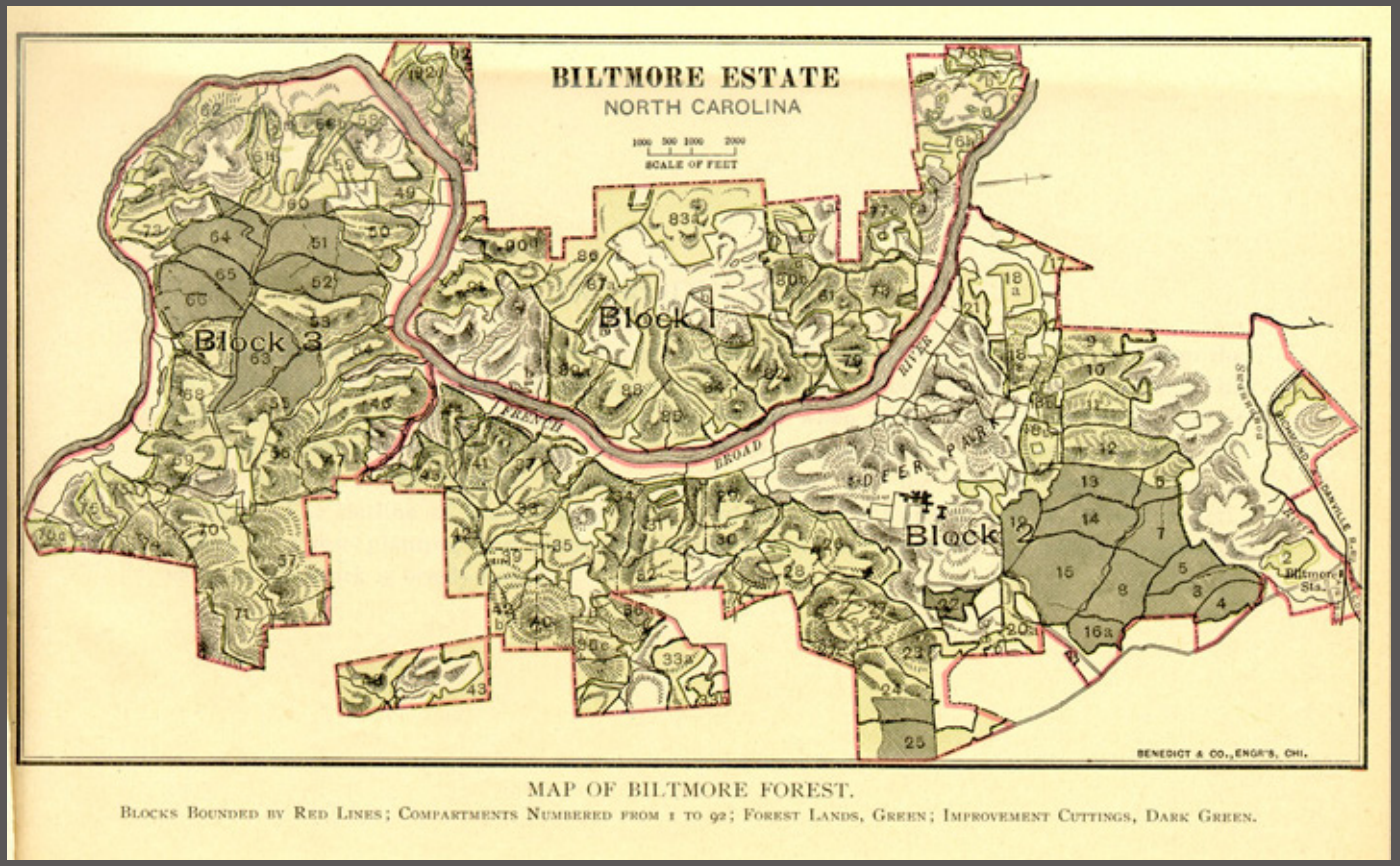
GARDEN AND FOREST

A JOURNAL OF HORTICULTURE LANDSCAPE ART AND FORESTRY

FEBRUARY 29, 1888.

PRICE TEN CENTS.]

[$4.00 A YEAR, IN ADVANCE.



MAP OF BILTMORE FOREST.

Blocks Bounded by Red Lines; Compartments Numbered from 1 to 92; Forest Lands, Green; Improvement Cuttings, Dark Green.

Biltmore Forest

Gifford Pinchot
Biltmore Forest: An Account of its Treatment and the First Year's Work.
Chicago: Lakeside Press, 1893.
Printed for the World's Columbian Exposition

Forestry Pavilion

Seattle (?)

Forestry Pavilion

1893 World's Columbian Exposition

English Forestry (?)

1893 World's Columbian Exposition

Michigan Pine

1893 World's Columbian Exposition

California, Sequoia

1893 World's Columbian Exposition


25
Copyright 1852
By C.C.Curtis

Chilean Fitzroyia cuppressoides, the South American Sequoia

Trophy Hunting

Trophy Hunting

Misc. F—6. Issued August 4, 1915.

U. S. DEPARTMENT OF AGRICULTURE,
FOREST SERVICE.
HENRY S. GRAVES, FORESTER.

THE USE BOOK

A MANUAL FOR USERS OF THE NATIONAL FORESTS.

1915.

ISSUED BY THE
SECRETARY OF AGRICULTURE.

WASHINGTON:
GOVERNMENT PRINTING OFFICE.
1915.

FIG. 23.—Logging of great mechanical perfection among the Big Trees of California.

Gifford Pinchot
A Primer of Forestry. Wahington D.C.: Government Printing Office, 1905.

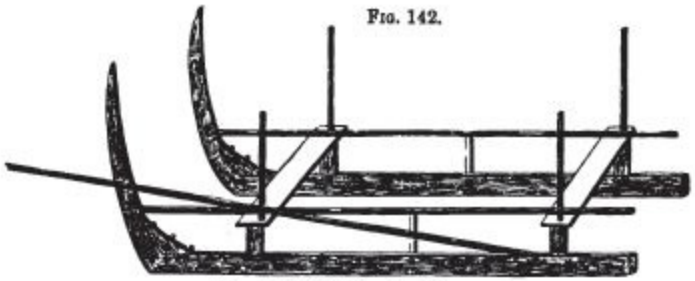
PLATE XII.

Bul. 24, Bureau of Forestry, U. S. Dept. of Agr.

DESTRUCTIVE LUMBERING IN THE SOUTHERN SIERRA NEVADA MOUNTAINS, CALIFORNIA.

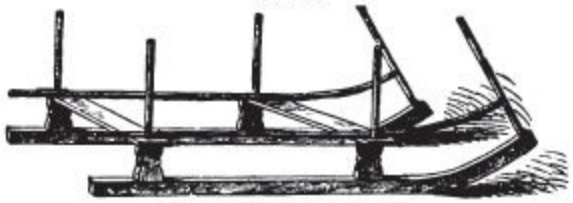
Gifford Pinchot
A Primer of Forestry. Wahington D.C.: Government Printing Office, 1905.

Fig. 142.



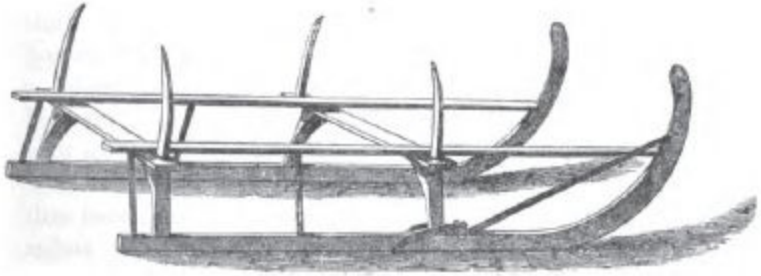
Murgthal Black Forest Sledge.

Fig. 143.



Middle Rhine-Valley Sledge.

Fig. 144.



Bavarian and South-Bohemian Sledge for butts 10–15 feet long.

Fig. 145.*

Southern Black Forest Sledge.

* Hess recommends the sledge shewn in fig. 145 on account of its lightness an simplicity, and because by pressing on its runners in front, it can be easily checked in speed.

Fig. 188.

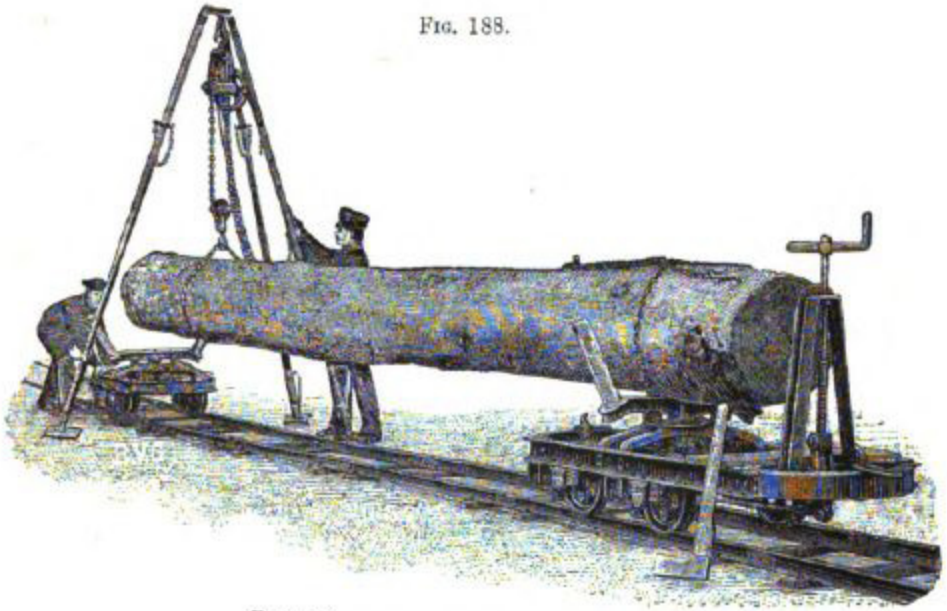


Fig. 189.

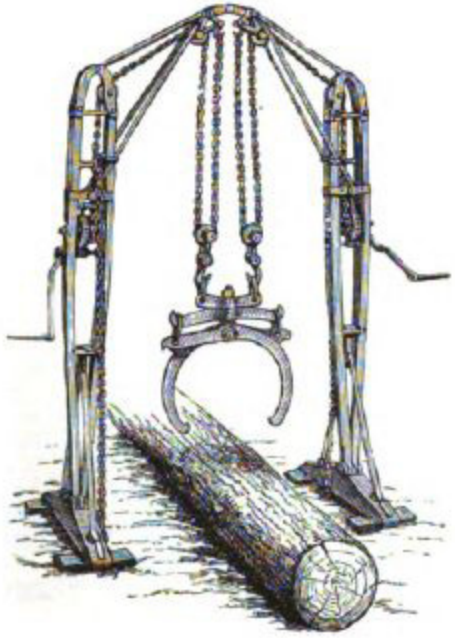


Fig. 190.

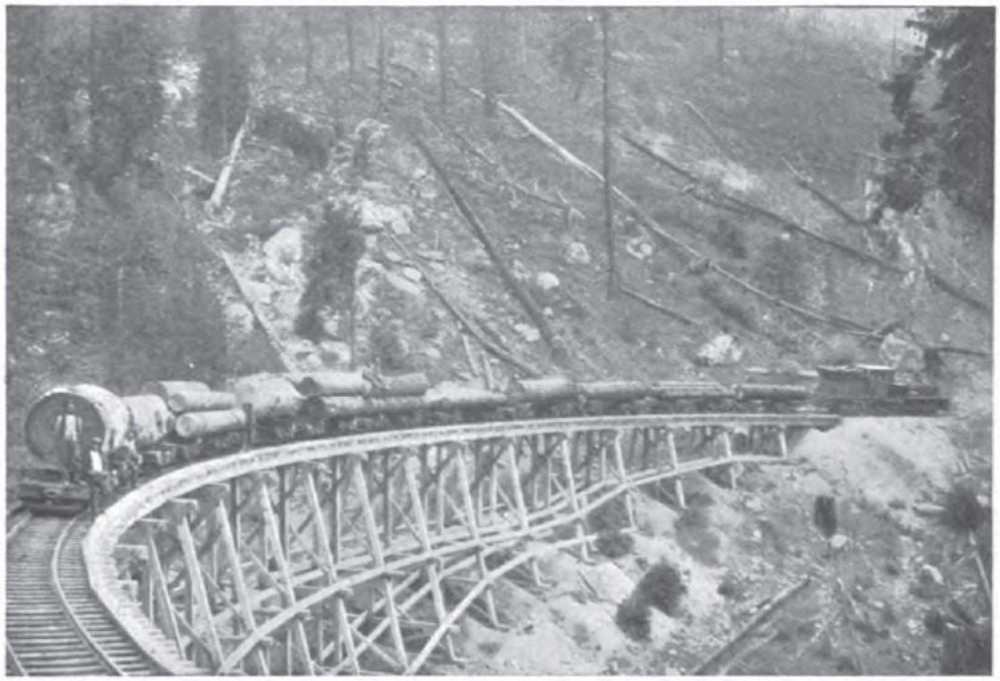


FIG. 33.—Logging by rail. Sierra Nevada Mountains, California.

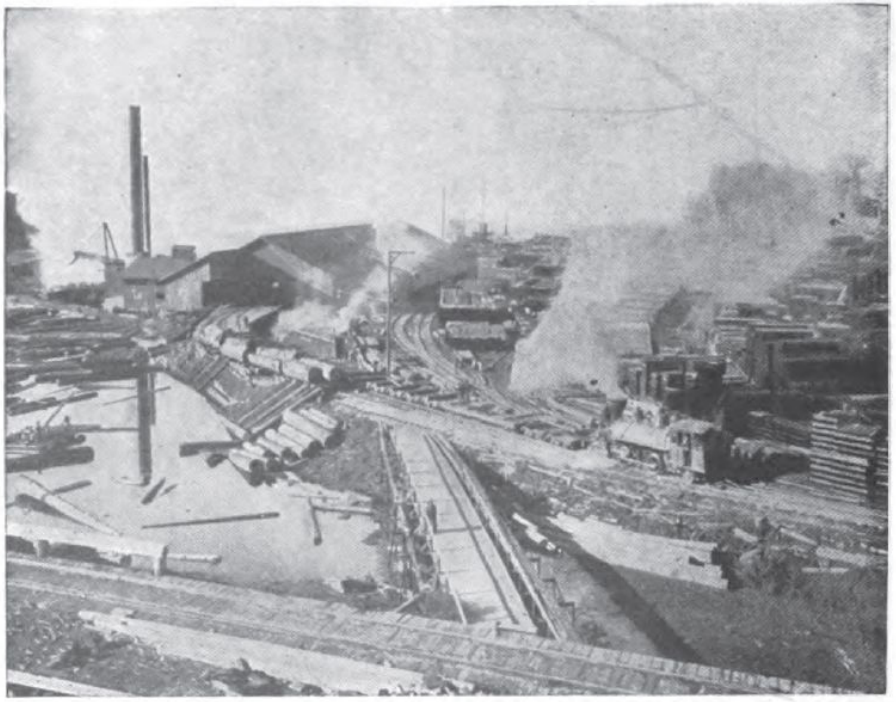


FIG. 34.—A sawmill, log pond, and lumber yard. Northern California.

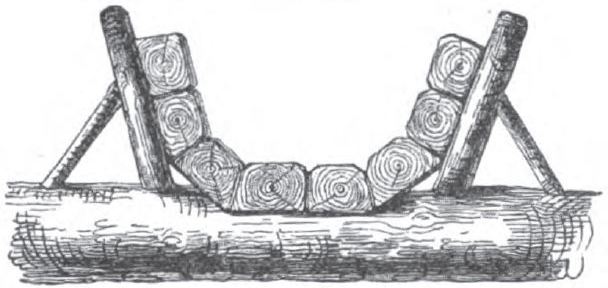
Gifford Pinchot
A Primer of Forestry. *Wahington D.C.: Government Printing Office, 1905.*

FIG. 1.—THE HEAD OF A LUMBER FLUME. CALIFORNIA.

FIG. 2.—THE FLUME IN THE MOUNTAINS. CALIFORNIA.

Gifford Pinchot
A Primer of Forestry. Wahington D.C.: Government Printing Office, 1905.

TIMBER SLIDE IN THE CHAMBA FORESTS.



SCENE IN THE SIHLWALD, THE TOWN FOREST OF ZURICH, SWITZERLAND, FROM WHICH ITS OWNER DESIRES THE GREATEST NET MONEY RETURN.

Gifford Pinchot
A Primer of Forestry. Wahington D.C.: Government Printing Office, 1905.

FIG. 29.—Spruce rollway. Adirondack Mountains, New York.

FIG. 30.—Skidding with oxen. Washington.

Gifford Pinchot
A Primer of Forestry. Wahington D.C.: Government Printing Office, 1905.

Fig. 119.

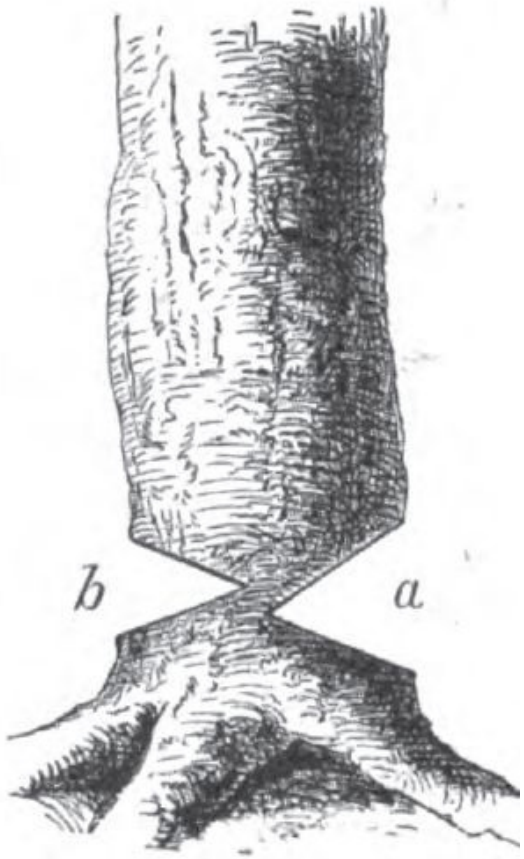


Fig. 51.

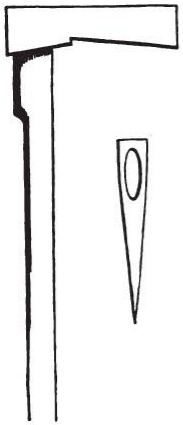


Fig. 52.

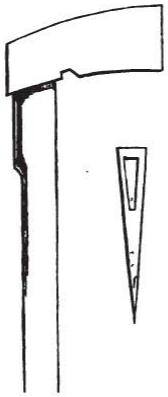


Fig. 53.

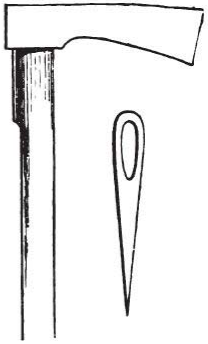


Fig. 54.

Fig. 55.

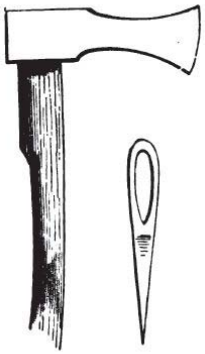


Fig. 56.

Fig. 61.

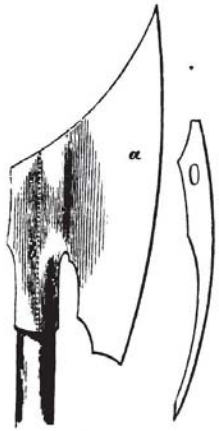


Fig. 62.

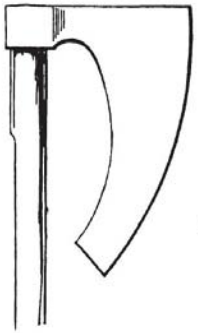


Fig. 57.

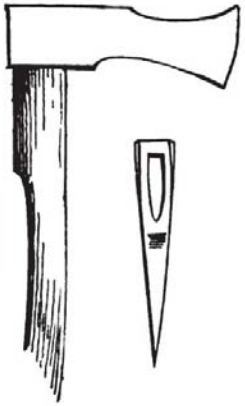


Fig. 58.

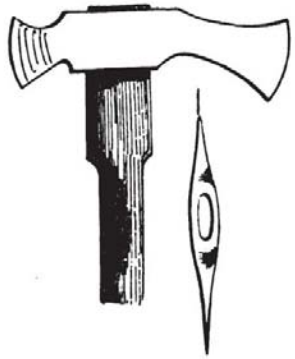


Fig. 85.

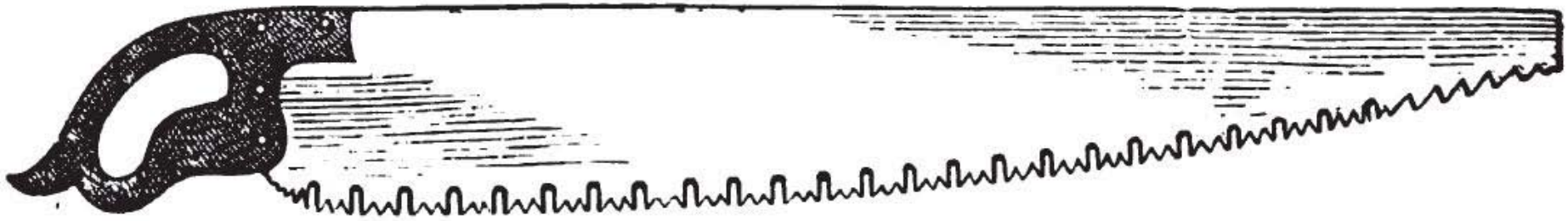


Fig. 16.

Fig. 12.

Fig. 13.

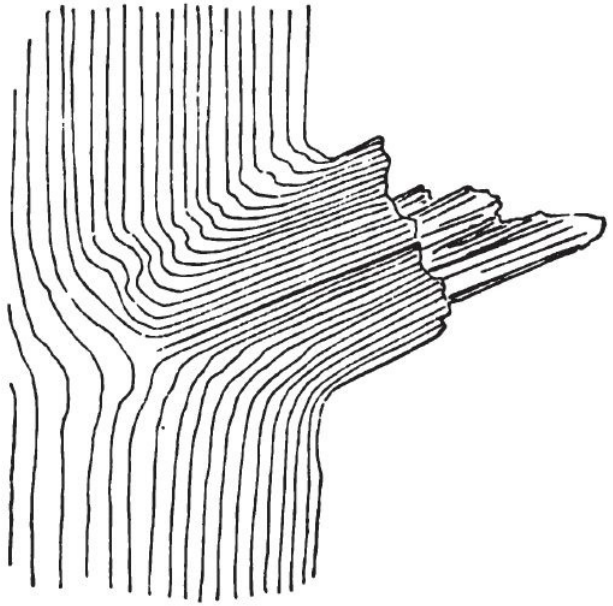


Fig. 69.

Fig. 70.

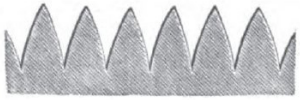
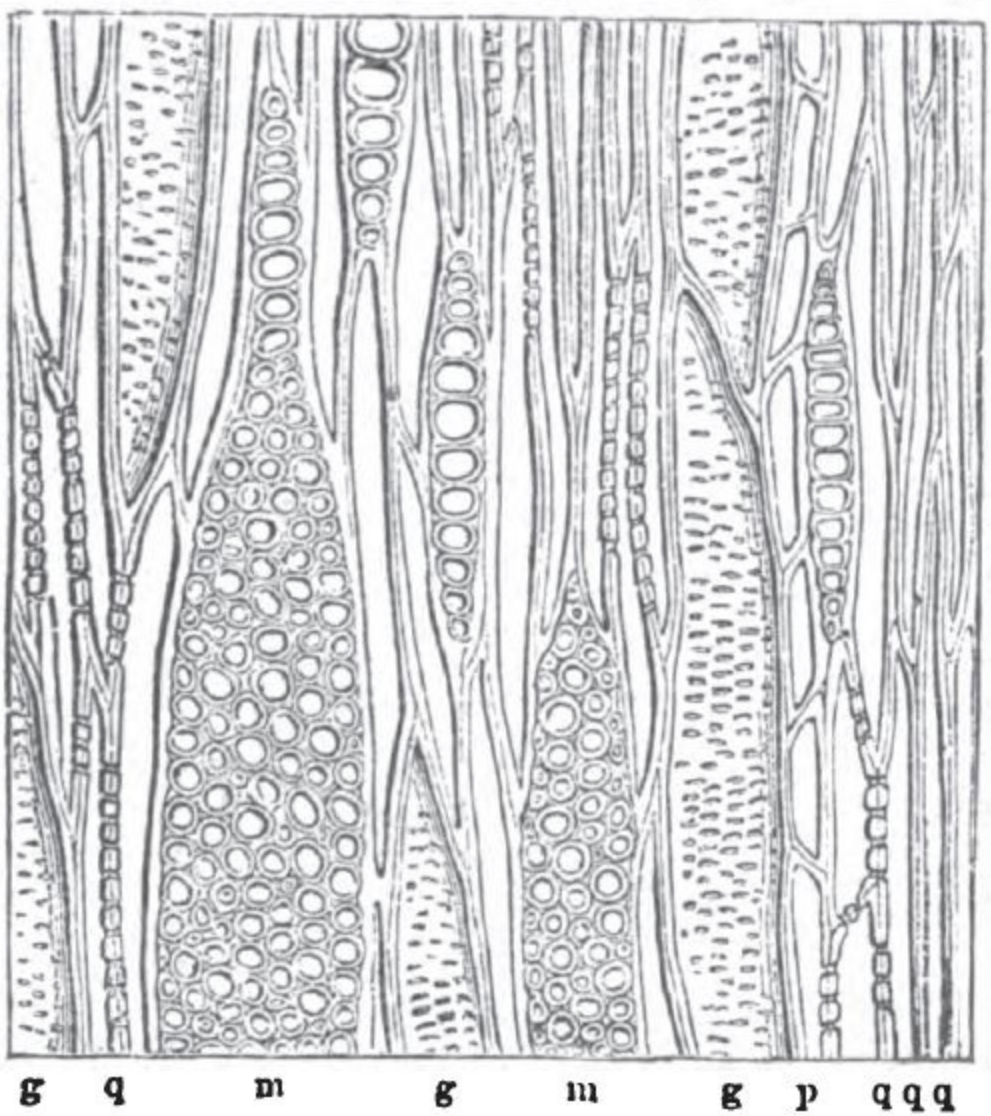


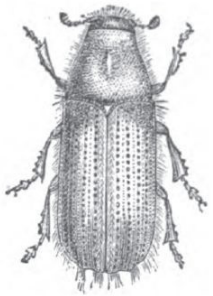
Fig. 71.

Fig. 72.

Fig. 74.

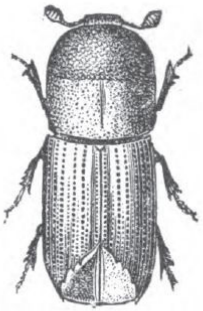


52. Vertical Section of Beech Wood, in a Plane tangent to Rings of Annual Growth.



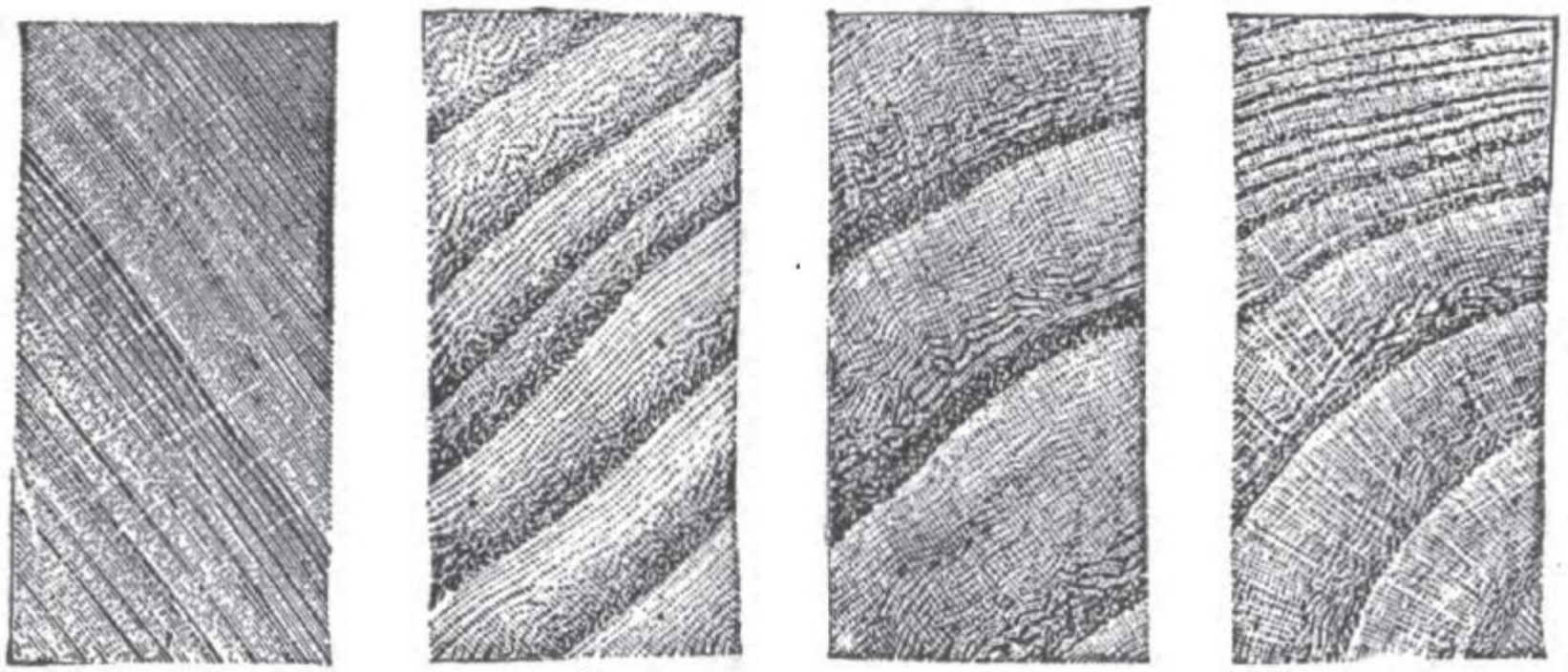
84. *Hylesinus pinperda* (greatly enlarged).

85. Burrows of the *Hylesinus piniperda* under the Bark of the Scotch Pine, with the Insects of natural size.



94 *Bostrichus typographicus* (greatly enlarged).

95. Burrows of the *Bostrichus typographicus* under the Bark of the Spruce, with the Insects of the Natural Size.



(*a.*) (*b.*) (*c.*) (*d.*)

132. ***Differences in the Growth of Elms.***—Sections of the Elm: (*a.*) From Canada—The layers of growth so thin that they can scarcely be distinguished. (*b.*) From Dunkirk, France—Wood very strong, and grown in deep humid soil. (*c.*) From the battle-field of Toulon—Grown on a sub-soil that is very damp, but owing to the heat of the climate the wood is strong. (*d.*) From Provence, France—Grown on soil that is less humid.

A. Section from a tree 200 years old (sp. gr. 0·627). Slow regular growth in a dense forest. Wood of best quality for cleaving: used for violins, &c. Forest of Chamounix (Haute Savoie). Altitude 4,550 feet.

B. Section from a tree 150 years old (sp. gr. 0·458). Regular structure, even and moderately fast growth. Excellent wood for carpentry and joinery. Forest of Grande Chartreuse (Isère). Altitude 4,420 feet.

C. Section from a tree 35 years old (sp. gr. 0·447). Very rapidly grown wood produced at a low altitude. Soft wood of inferior quality. Forest of Saint Laurent du Pont (Isère). Altitude 1,545 feet.

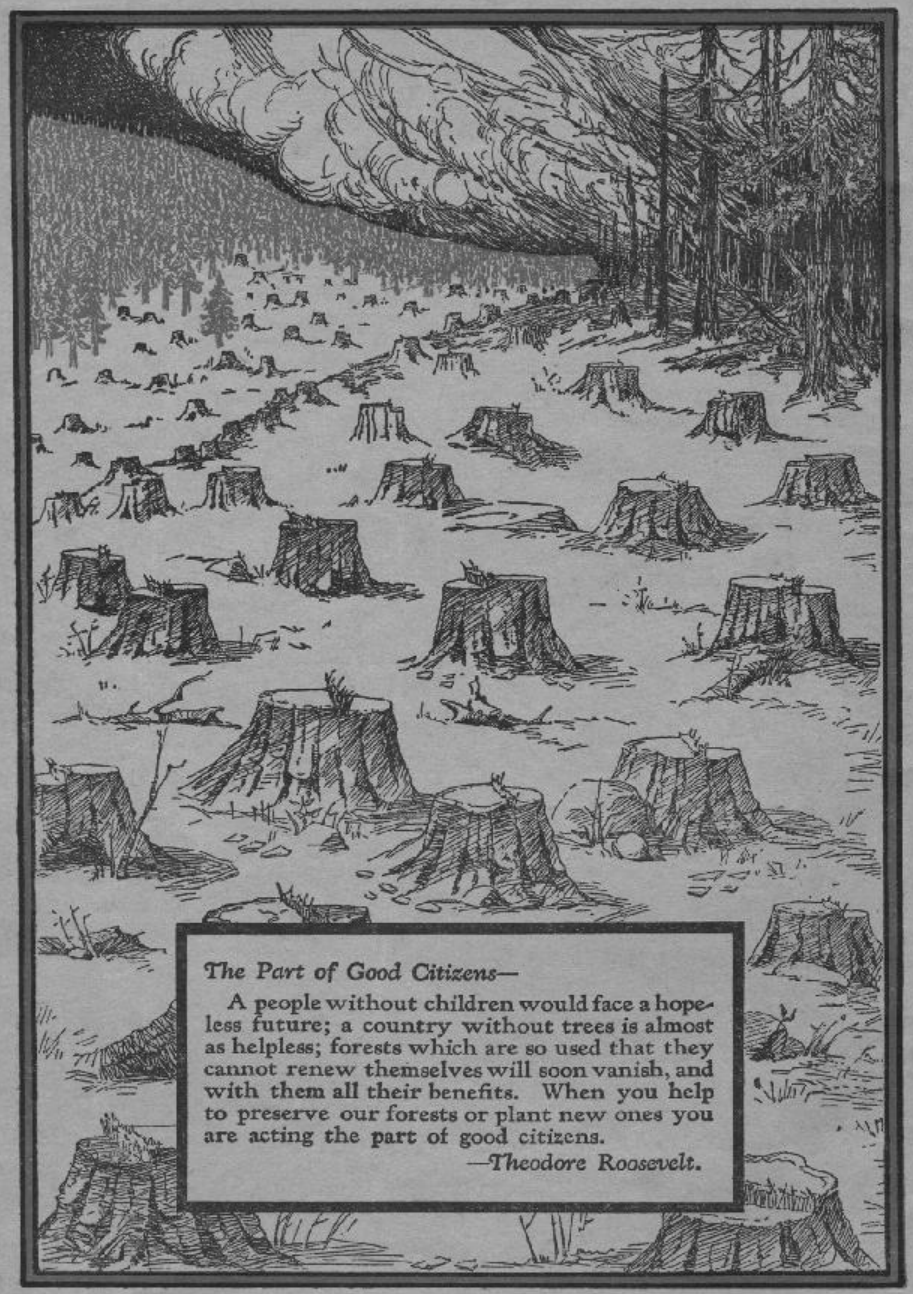
DIFFERENT TYPES OF SPRUCE WOOD

Romeyn Beck Hough, The American Woods
Radial, tangential, and cross-sections of 350 North American woods (14 volumes) published between 1888 and 1910

Agricultural "Improvement"

Agricultural “Improvement”

Horticultural “Improvement”



The Part of Good Citizens—

A people without children would face a hopeless future; a country without trees is almost as helpless; forests which are so used that they cannot renew themselves will soon vanish, and with them all their benefits. When you help to preserve our forests or plant new ones you are acting the part of good citizens.

—Theodore Roosevelt.

THE FORESTRY PRIMER

Civilian Conservation Corps Edition

1934

The 42nd Hundred Thousand

DEDICATED TO
PRESIDENT ROOSEVELT'S
FOREST CAMP WORKERS

American Tree Association
1214 Sixteenth Street N.W. Washington, D. C.

CCC Planting Crew, 1936

BILTMORE FOREST.
IMPROVEMENT CUTTING URGENTLY NEEDED.

BILTMORE FOREST.
BEFORE AN IMPROVEMENT CUTTING.

BILTMORE FOREST.
AFTER AN IMPROVEMENT CUTTING.

"Improvements" to the Forest

Gifford Pinchot
Biltmore Forest: An Account of its Treatment and the First Year's Work.
Chicago: Lakeside Press, 1893.

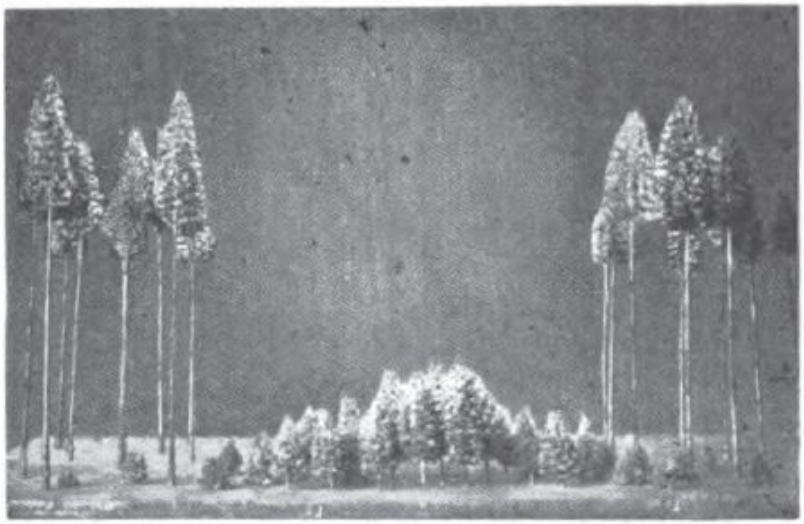


FIG. 20.—Mimic forest, showing distribution of young growth under the Group System.

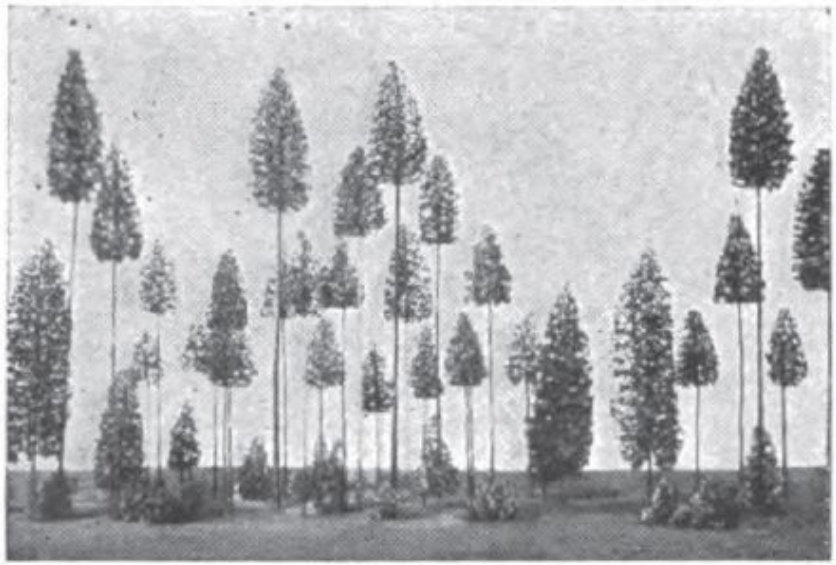


FIG. 17.—Mimic pure selection forest, showing the mixture of ages.

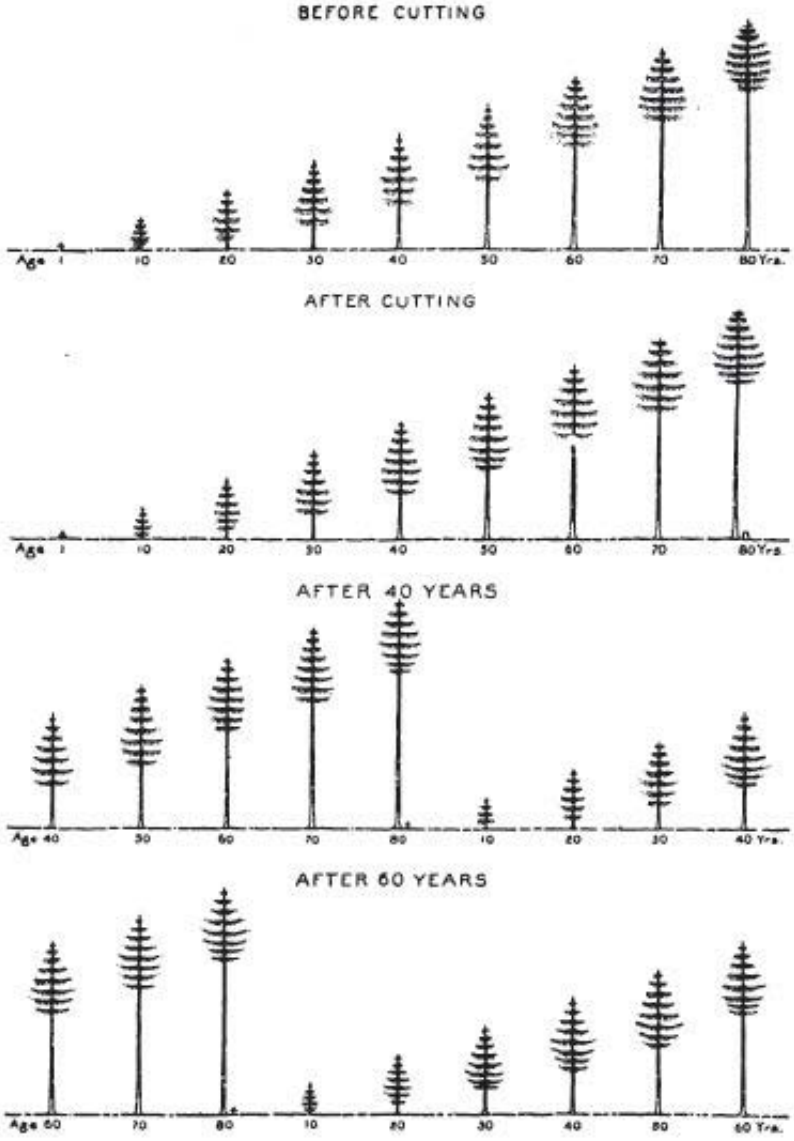


DIAGRAM TO REPRESENT THE PROGRESS OF CUTTING IN REGULAR SEED FOREST.

Each tree represents one even-aged division. Only one division in ten is represented.

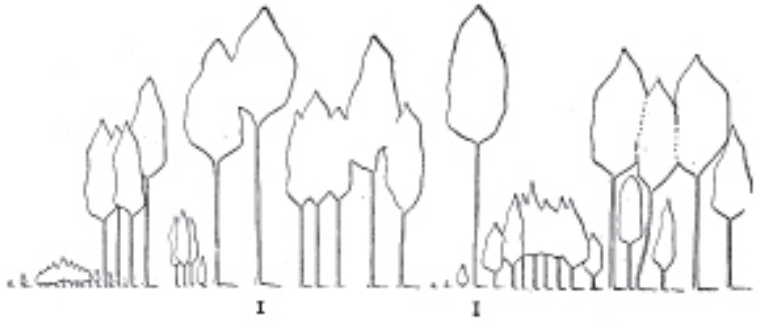


FIG. 10.

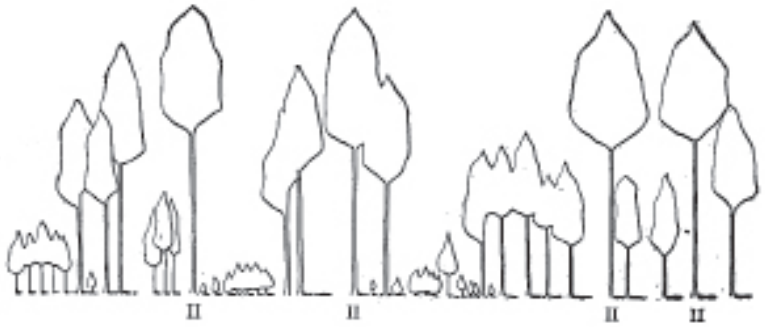
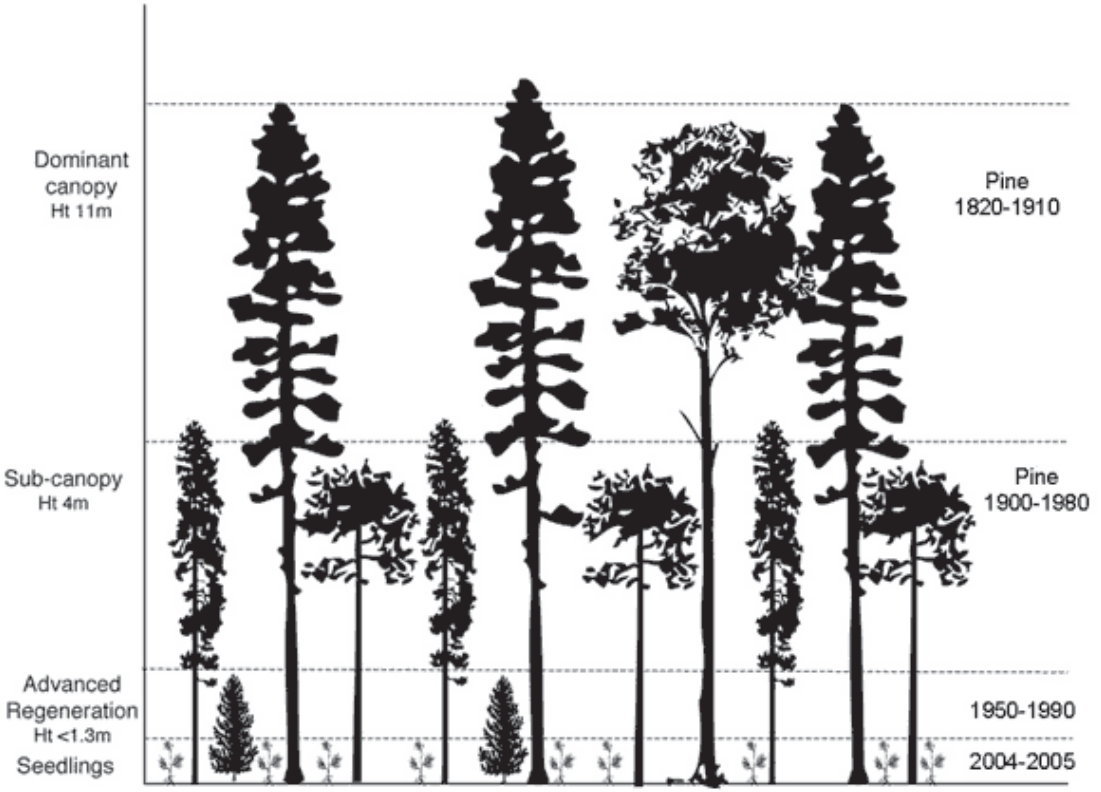
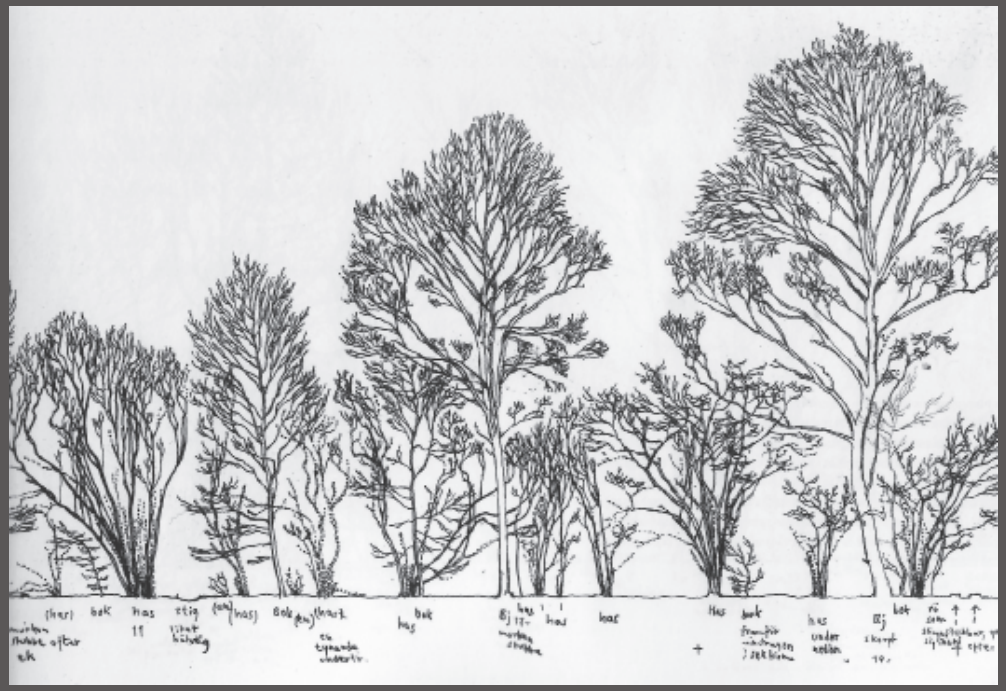
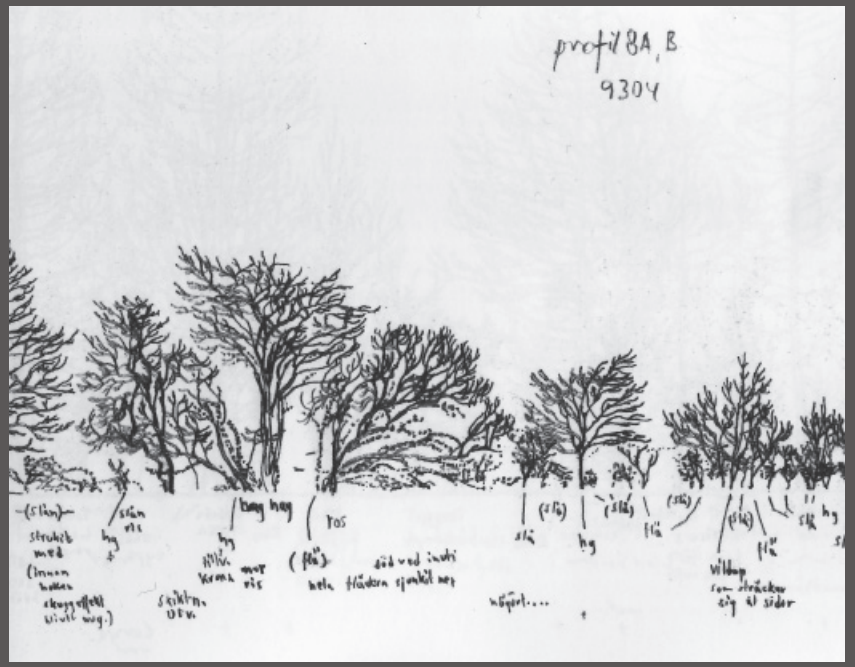


FIG. 11.



Projections of Forest Development





Measuring Forest Development Over Time

Afforestation & “Restoration”
United States Forest Service, 1954

Iceland