

COURSE OBJECTIVES:

1. To enable the student to identify indigenous tree, shrubs, and forbs species of eastern Washington and northern Idaho.
2. To learn to identify commercially important logs from bark, wood, and knot characteristics.
3. To learn silvics (life history, characteristics and ecology of forest trees, especially in stands) of major local commercial trees.
4. To learn to identify key vegetative indicators of habitat types in eastern Washington and northern Idaho as developed by Daubenmire.

For the purpose of this class, Dendrology means the classification and study of characteristics, habits, and ranges of woody plants, including trees, shrubs and vines. In addition to the above, habitat plant interrelationships and major uses of the common trees and shrubs will be covered.

There will be a combination of lectures, field trips and some inside laboratory identification exercises. It is the student's responsibility to receive the lecture and lab materials during the scheduled class periods. If a class has to be missed, that student should have another person collect the notes and instructions for you. If there are any questions concerning notes, plant characteristics, field trips or plant collections, please feel free to discuss them with me.

This course requires a great deal of personal input; study, attention to detail, memorization and collection work. The student should take careful notes, become thoroughly familiar with texts, handouts, study collections and live specimens in the field.

The key to success in this course is to "keep up" on a day-to-day basis.

QUIZ, TEST AND COLLECTION GRADING

Each week we will have a quiz covering the plants emphasized that week plus some species from previous weeks. Each quiz and test will be comprehensive and may cover the following information on plants and notes.

1. Correct spelling of scientific and common names.
2. Field and laboratory identification.
3. Identifying features of: leaves, fruit, twigs, bark, wood, habitat and ecology.
4. Value to man and/or animals.
5. Descriptive botanical terminology, including combinations of characteristics which best describe a species.
6. Any material covered in class.

Quizzes and tests may be given in the field or classroom, or in combination.

Plant collections will be graded on the following points:

1. Correct identification
 2. Following specific directions
 3. Proper labeling
 4. Proper spelling and correct form
 5. Neatness of mount
 6. Required flower, fruit or seed as applicable. If not available, use picture, drawing or description.
 7. Collections handed in on or before due date
- (Points will be deducted(10%/day) for each day late)**

DENDROLOGY & HABITAT PLANT COLLECTIONS

Each student is required to make two mounted collections as indicated below.

- (1) 20 Habitat indicator plants
- (2) 20 Trees-deciduous and conifers

Collection instructions

- (1) The collections should be bound together or confined in a suitable container.
- (2) Confine your collections to plants that are on your Dendrology Plant I.D. List.
- (3) The plants should be mounted on thin cardboard or very stiff paper. Suitable photo albums may be used.
- (4) Identification cards (provided) should be typed if possible or printed and located on the bottom left side of the mount.
- (5) All cardboard or paper mounts will be covered with clear contact paper.
- (6) The plant should be a good representative sample of the species.
- (7) Hand in only the required number of specimens for each collection. No extras will be graded.
- (8) Do not take branches from the campus, parks, or arboretums.
Always ask permission if collecting on private property.
- (9) leaves--Include enough to show structural details such as compound, simple, alternate, opposite, whorled, etc. Mount one leaf so underside is visible.
- (10) Twigs--Include if it has distinctive features such as buds, thorns, or bark. (Ex. ninebark)
- (11) Flower or Fruit--You must include if applicable. If it is too large, use a cross section slice or cone scale; include samara of maples and ash, acorns, etc. If not available, use a picture.
- (12) Tree collection **must include**: Douglas-fir, western hemlock, Engelmann spruce, western larch, grand fir, ponderosa pine, lodgepole pine, western white pine, and western redcedar.

On the back of each conifer mount include the following:

- a. Xerox pictures, drawings, or descriptions (including dimensions) of the cones.
- b. Written description of the bark of mature and immature trees.

Plant Identification Key

1. The Identification key will be typed. Hand written or photo copied keys will not be graded.
2. Plants will be named by their scientific names.
3. Use plants from quizzes 2 – 7. **DO NOT** use the ferns, weeds or grasses.
4. Keys can be diagrams, dichotomous, or a combination of both.
5. Keys will be on 8 x 11 inch paper, bound together, font size no smaller than 10 & no larger than 12.
6. Title page will consist of: Course number, Title, Instructors Name, Students Name, and Date.
7. Neatness counts.

Key will be graded on the above criteria and how well the key functions. I will pick 6 – 10 plants at random and use your key to identify the plant. If I cannot identify a plant or have difficulty using your key your grade will decrease accordingly. 10% deduction from final grade for every day it is late!