

BIOLOGY 2 PLANT PROJECT 2015

Your project this year will involve putting together a presentation and a binder that includes a variety of plant categories. Included with each plant will be a variety of pictures and information that demonstrates your knowledge and understanding of plant classification, anatomy and physiology. Your presentation will be a combination of electronic (PowerPoint presentation, google docs, slide show, etc) and a physical binder containing samples of certain plants. Your project will not be presented to the class. Your project will consist of 4 plants from each of the following categories:

- **(4) Poisonous plants** that can be naturally found in the US:

Information to include:

3 pictures of the plant

- Close up of the leaf
- Close up of a branch/stem with a fruit or flower
- Entire plant in its natural environment

Scientific name (Family, Genus and Species)

Toxic parts

Animals affected

Symptoms

Range

Special notes

- **(4) Medicinal plants** that can be naturally found in the US:

Information to include:

3 pictures of the plant

- Close up of the leaf
- Close up of a branch/stem with a fruit or flower
- Entire plant in its natural environment

Scientific name (Family, Genus and Species)

Medicinal parts

Effects of the plant (what does it do)

Range

Special notes

- **(4) Edible plants** that can be naturally found in the US:

Information to include:

3 pictures of the plant

- Close up of the leaf
- Close up of a branch/stem
- Entire plant in its natural environment

Scientific name (Family, Genus and Species)

edible parts

Other uses

Range

Your presentation should also include any 10 of the following Michigan **Trees**: These are some of the more common trees found in Michigan forests or planted as ornamentals on suburban streets.

1. American Basswood
2. American Beech
3. Black gum
4. Black Oak
5. Buckthorn
6. Catalpa
7. Common or Callery Pear
8. Eastern Cottonwood
9. Flowering dogwood
10. Ginkgo
11. Hackberry
12. Hawthorne
13. Hickory
14. Honey Locust
15. Hop hornbeam
16. Lilac
17. Northern Red Oak
18. Norway Maple
19. Paper birch
20. Quaking aspen
21. Red Maple
22. Sasafras
23. Silver Maple
24. Sugar Maple
25. Sycamore
26. White Oak
27. White pine
28. Northern White Cedar
29. Red/Norway Pine
30. Big tooth Aspen

Information to include:

3 pictures of the plant

- Close up of the leaf
- Close up of a branch/stem
- Entire plant in its natural environment

Scientific name (Family, Genus and Species)

Plant anatomy:

- Leaf type
 - Leaf arrangement
 - Leaf venation
 - Leaf margin
 - Fruit type
 - Uses
 - Habitat
 - Range
- In addition, 3 additional points will be scored for including a leaf from the above species of tree. The leaves should be pressed and mounted in a folder or binder with the common name of the tree labeled on the page. Also include the slide number the leaf corresponds to in your presentation.
 - Project will be worth 206 points (8 for each plant, plus 30 points for the binder of leaves from the Michigan list above).
 - 3 points for color pictures.
 - 1.5 points for correct Family, Genus and species names (0.5 each).
 - 3.5 points for the information.
 - Project will be due Friday, October 16, 2015