How to Measure a Tree

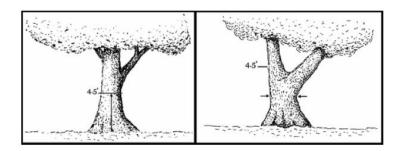


Instructions for proper measurement techniques. Please use this guide for filling out the Big Tree Nomination Form.

For a more in-depth guide to tree measurement, please visit: http://www.americanforests.org/wp-content/uploads/2014/12/AF-Tree-Measuring-Guidelines_LR.pdf

Circumference:

Measure around the trunk of the tree at four and a half feet (4.5') above the ground on the tree's uphill side (if not on even ground). If the tree forks below or bulges at 4.5', measure the circumference where the tree reaches normal size or tapers below the 4.5' foot point. For accurate measurement, use a diameter tape or regular tape measure.

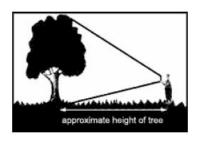


Height:

Measure the height from the ground level to the highest point. There are three common methods:

<u>Tools:</u> You can measure height with such instruments as a clinometer, hypsometer or abney level, or by comparing the tree to something of known height, such as a twenty-five-foot (25') building.

The American Forests method:



- Hold a straight stick by its base vertically at arm's length.
- The stick's length above your hand should equal the distance from your hand to your eye.
- Walk back from the tree, staying level to the tree's base.
- Stop when the stick above your hand is the same length as the tree.
- Sight over your hand to the base of the tree, and sight over the stick to the top of the tree.
- Measure how far you have moved from the tree. The measurement, in feet, is the tree's height.

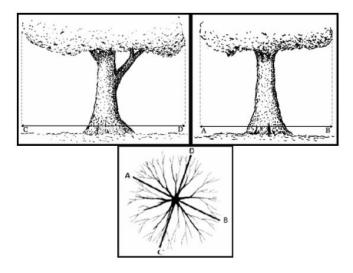
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The Indiana Division of Forestry method:

- Temporarily mark a spot four feet (4') from the base of the tree to serve as a sighting point.
- Back away from the tree, holding a yardstick vertically in front of you. It must be straight for an accurate measurement.
- Stop when the four-foot section of the tree occupies exactly one inch (1") of the yard stick.
- Sight to the base and top of the tree, noting the number of inches the entire tree height occupies.
- Multiply that number by four feet (4') to determine the total tree height.

Crown Spread:

To find the tree's average crown spread, measure the widest point (C to D) and the narrowest point (A-B) of the crown. Add them together and divide by two to calculate the average crown spread.



Finding Coordinates:

- Locate the tree on Google Maps.
- If using a desktop computer, right click on the location and select the "What's here" option. The coordinates and other information will be provided. Copy and paste the coordinates onto the nomination form.
- If using a mobile device, hold down on the area where the tree is located on the map until a marker appears. Copy and paste the coordinates that appear at the top of the map onto the nomination form.

Determination:

The Oakland Register of Big Trees uses American Forests' formula to determine whether a tree is a champion:

Trunk circumference (inches) + Height (feet) + ¼ of the crown spread (feet) = Total Points

When two trees are within 10 points of each other, they are co-champions.

Nominate your big trees by submitting the nomination form at www.oaklandtrees.info

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