



## Tree - How can you tell how old a tree is?

### Fact

- You can tell how old a tree is by counting the number of rings it has inside the tree trunk.
- Each year a tree grows new wood cells underneath the bark, making a new ring. So, each ring stands for one year. The width of the ring can change depending on the weather conditions for growing each year.
- The oldest tree in New Zealand is the kauri tree Tane Mahuta and it is over 1000 years old.
- As a tree gets older the cells near the middle of it fill up with something called lignin, which acts as a binder or support for the cellulose parts of the trunk.

### Do you know

- To find out how old a tree is without cutting it down, a Botanist (tree scientist) takes a core sample from a living tree. They push a sharp tool into the tree and take out a sample of the wood all the way from one side to the other.
- Some trees grow faster than others, so their rings are bigger and more easy to see
- If you have lots of the same type of tree growing in one place, you'd only need to take a core sample of one and then you could measure the others with a tape measure to get an idea of how old they are.

### Experiments you can do

Next time you and your family are out collecting firewood or going for a walk in the bush, see if you can find any tree stumps and count the rings to find out how old the tree is.

### Other Investigations

Your school has probably planted trees on the school property over the years (unless your school is a new one!). See if you can find out when the trees were planted and compare them to others planted at the same time. Is each tree growing at the same rate? Which ones are faster? Which ones have more foliage (leaves) on them? Maybe you could get involved in tree planting at your school.

### Jokes

Why did the tree stink? Because all the leaves blew off.  
From Chloe

What makes a tree noisy? Its bark.  
From Laura Clifford