

Tree Fractals

Why Admire one of nature's most common multiplication models.

How Draw, mark points, draw, mark points, draw...

What Create a tree fractal: a series of repetitions of the base at special points.



1



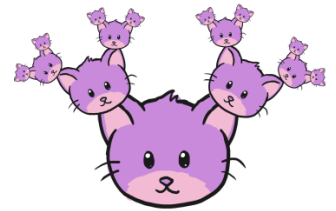
Sketch an object or a shape that you or your children like. Let's call it the base.

2



Mark some points that stick out, such as the tips of cats' ears. Draw smaller versions of the base at each of the marked points.

3



Keep repeating. You are making several layers of fractals.

Explorations

Do you think it counts as a tree fractal if there is only one shape at each level (like a radio antenna)?

Take this activity outside where you can draw truly big fractals with chalk.

Which tree is easier to draw, with two or with three branchings?
What makes tree fractals easier or harder, other than numbers?

What numbers can be found on a given tree? What's the math term for them and what would you call them?

Can you find examples of tree fractals in nature (trees of course... what else?), architecture, technology, crafts, and arts?

Math is what you make of it!

Make Up Your Own Tree Fractal Model

Email your ideas and pictures to reach.out@naturalmath.com

An activity from the upcoming "Multiplication Explorers" book by NaturalMath.com

