Paraphrase

1. **Read** the text.
2. **Remove** the text.
3. **Explain** the idea out loud.
4. **Write/Type** the explanation.
5. **Return** to the original text to check names and numbers.

What Can Trees Tell Us About Climate Change?
Quite a lot, actually!

But to understand what the trees tell us, we first have to understand the difference between weather and climate.

Weather is a specific event—like a rain storm or hot day—that happens over a short period of time. Weather can be tracked within hours or days. Climate is the average weather conditions in a place over a long period of time (30 years or more).

Scientists at the National Weather Service have been keeping track of weather in the United States since 1891. But trees can keep a much longer record of Earth's climate. In fact, trees can live for hundreds—and sometimes even thousands—of years!

One way that scientists use trees to learn about past climate is by studying a tree's rings, which look a bit like a bullseye.

These rings can tell us how old the tree is and what the weather was like during each year of the tree's life. One light ring plus one dark ring equals one year of the tree's life.

The light-colored rings represent wood that grew in the spring and early summer, while the dark rings represent wood that grew in the late summer and fall.

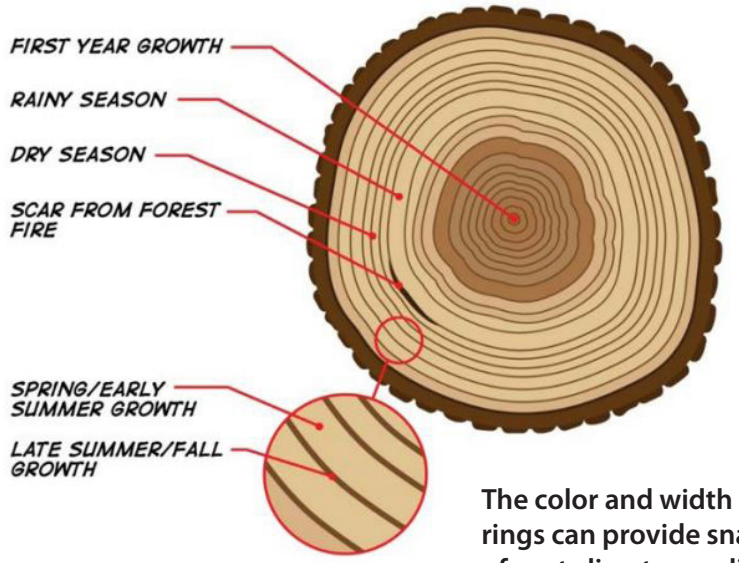
Because trees are sensitive to local climate conditions, such as rain and temperature, they give scientists some information about that area's local climate in the past.

For example, tree rings usually grow wider in warm, wet years and they are thinner in years when it is cold and dry.

If the tree has experienced stressful conditions, such as a drought, the tree might hardly grow at all in those years.

Scientists can compare modern trees with local measurements of temperature and precipitation from the nearest weather station. However, very old trees can offer clues about what the climate was like long before measurements were recorded.

In most places, daily weather records have only been kept for the past 100 to 150 years. So, to learn about the climate hundreds to thousands of years ago, scientists need to use other sources, such as trees, corals, and ice cores (layers of ice drilled out of a glacier).



The color and width of tree rings can provide snapshots of past climate conditions.

What Can Trees Tell Us About Climate Change?
Quite a lot, actually!

These rings can tell us how old the tree is. One light ring plus one dark ring equals one year of the tree's life.

Paraphrase

1. **Read** the text.
2. **Remove** the text.
3. **Explain** the idea out loud.

Repeat Steps 1-3, if necessary.

What Can Trees Tell Us About Climate Change?
Quite a lot, actually!

These rings can tell us how old the tree is. One light ring plus one dark ring equals one year of the tree's life.

Paraphrase

1. **Read** the text.
2. **Remove** the text.
3. **Explain** the idea out loud.

   Repeat Steps 1-3, if necessary.

4. **Write/Type** the explanation.
5. **Return** to the original text to check names and numbers.

What Can Trees Tell Us About Climate Change?
Quite a lot, actually!

These rings can tell us how old the tree is. One light ring plus one dark ring equals one year of the tree's life.

What Can Trees Tell Us About Climate Change?
Quite a lot, actually!

The light-colored rings represent wood that grew in the spring and early summer, while the dark rings represent wood that grew in the late summer and fall.

https://climatekids.nasa.gov/tree-rings/

Paraphrase

1. **Read** the text.
2. **Remove** the text.
3. **Explain** the idea out loud.

   Repeat Steps 1-3, if necessary.

4. **Write/Type** the explanation.
5. **Return** to the original text to check names and numbers.

What Can Trees Tell Us About Climate Change?
Quite a lot, actually!

¶1 But to understand what the trees tell us, we first have to understand the difference between weather and climate.

Weather is a specific event—like a rain storm or hot day—that happens over a short period of time. Weather can be tracked within hours or days. Climate is the average weather conditions in a place over a long period of time (30 years or more).

¶2 Scientists at the National Weather Service have been keeping track of weather in the United States since 1891. But trees can keep a much longer record of Earth's climate. In fact, trees can live for hundreds—and sometimes even thousands—of years!

¶3 One way that scientists use trees to learn about past climate is by studying a tree's rings, which look a bit like a bullseye.

¶4 These rings can tell us how old the tree is and what the weather was like during each year of the tree's life. One light ring plus one dark ring equals one year of the tree's life.

¶5 The light-colored rings represent wood that grew in the spring and early summer, while the dark rings represent wood that grew in the late summer and fall.

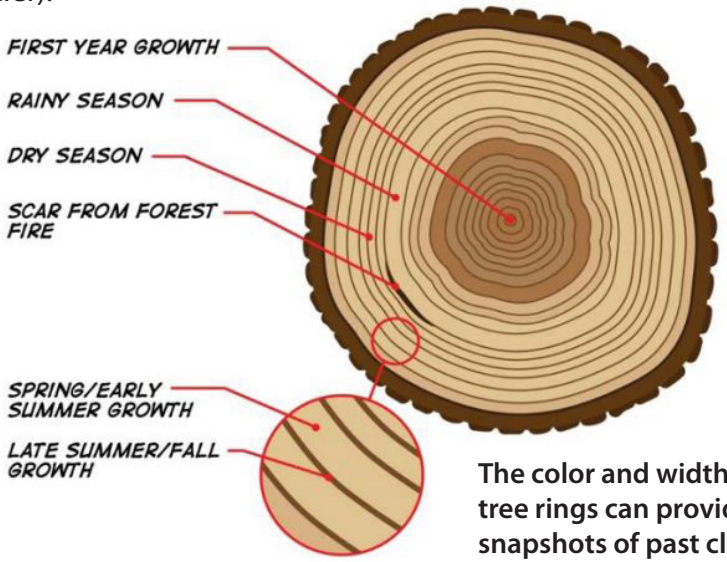
¶6 Because trees are sensitive to local climate conditions, such as rain and temperature, they give scientists some information about that area's local climate in the past.

¶7 For example, tree rings usually grow wider in warm, wet years and they are thinner in years when it is cold and dry.

¶8 If the tree has experienced stressful conditions, such as a drought, the tree might hardly grow at all in those years.

¶9 Scientists can compare modern trees with local measurements of temperature and precipitation from the nearest weather station. However, very old trees can offer clues about what the climate was like long before measurements were recorded.

¶10 In most places, daily weather records have only been kept for the past 100 to 150 years. So, to learn about the climate hundreds to thousands of years ago, scientists need to use other sources, such as trees, corals, and ice cores (layers of ice drilled out of a glacier).



The color and width of tree rings can provide snapshots of past climate conditions.

Excerpt from ***Because of Winn-Dixie***

¶1 I spent a lot of time that summer at the Herman W. Block Memorial Library. The Herman W. Block Memorial Library sounds like it would be a big fancy place, but it's not. It's just a little old house full of books, and Miss Franny Block is in charge of them all. She is a very small, very old woman with short gray hair, and she was the first friend I made.

¶2 It all started with Winn-Dixie not liking it when I went into the library, because he couldn't go inside,too. But I showed him how he could stand up on his hind legs and look in the window and see me in there, selecting my books; and he was okay, as long as he could see me.

¶3 But the thing was, the first time Miss Franny Block saw Winn-Dixie standing up on his hind legs like that, looking in the window, she didn't think he was a dog. She thought he was a bear.

¶4 This is what happened: I was picking out my books and kind of humming to myself, and all of a sudden, there was a loud and scary scream. I went running up to the front of the library, and there was Miss Franny Block, sitting on the floor behind her desk. Miss Franny sat there trembling and shaking.

Excerpt from *Because of Winn-Dixie* by Kate DiCamillo
https://achievethecore.org/content/upload/Because_of_Winn_Dixie_3MA.pdf

PARAPHRASED INFORMATION **#1**

Text _____

Paragraph # _____

PARAPHRASED INFORMATION **#2**

Text _____

Paragraph # _____

PARAPHRASED INFORMATION #3

Text _____

Paragraph # _____

PARAPHRASED INFORMATION #4

Text _____

Paragraph # _____