



Archaeologists use two kinds of dating methods: relative dating and absolute dating.



DIVING INTO PAST: EXPLORING TIME

Relative dating and absolute dating are two important techniques used in geology and archaeology to determine the age of rocks, fossils, and artifacts.

RELATIVE DATING

involves determining the age of a geological feature or artifact by comparing it to other objects or layers nearby

ABSOLUTE DATING

measure the physical properties of an object itself and use these measurements to calculate its age

RELATIVE AND ABSOLUTE DATING

DATING

it is how we organize our discoveries in time, like dates on a calendar

REFERENCES:

<https://archaeology.ncdcr.gov/blog/2021-04-14/relative-absolute-dating>

<https://australian.museum/learn/minerals/shaping-earth/radioactive-dating/#:~:text=the Earth works-,What is radioactive dating%3F,naturally-occurring isotopes are known.>





WHAT IS RELATIVE DATING?

In relative dating, we determine how old or how young an object is based on its relationship on other objects.

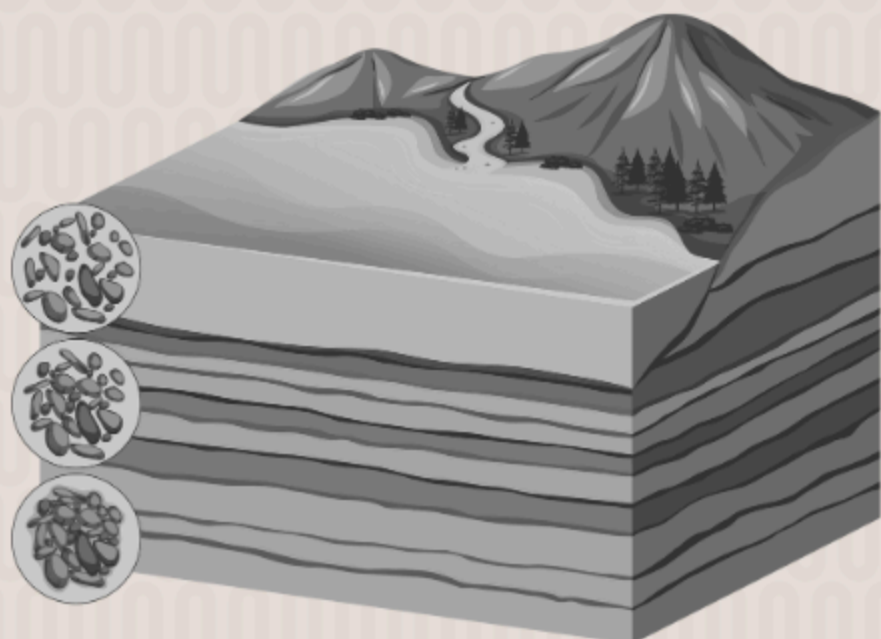
For example, we know from geology that soil layers near the surface of the ground where we stand are usually younger than those deeper down. This relationship helps archaeologists know that objects we find deep in the ground are older than things we find closer to the surface.



IT RELIES ON PRINCIPLES LIKE SUPERPOSITION AND ORIGINAL HORIZONTALITY

Superposition states that the oldest layers are at the bottom and the youngest are at the top

Original horizontality states that sedimentary layers are initially deposited horizontally.



WHAT IS ABSOLUTE DATING?

Absolute dating methods measure the physical properties of an object itself and use these measurements to calculate its age.

This type of dating is a quantitative dating, because it determines the exact age of an object.



MEASURES THE AGE OF REMAINS USING RADIOMETRIC DATING

Radioactive dating is a method of dating rocks and minerals using radioactive isotopes. This method is useful for igneous and metamorphic rocks, which cannot be dated by the stratigraphic correlation method used for sedimentary rocks.

IMPORTANCE OF RELATIVE AND ABSOLUTE DATING

Studying relative and absolute dating methods are important in various fields such as archeology, geology, and anthropology.



UNDERSTAND THE CHRONOLOGY OF EVENTS

Using these methods help us understand the chronology of events that have happened in the past throughout the existence of Earth.



UNRAVELING HISTORICAL MYSTERIES

these methods play a vital role in unraveling historical mysteries by providing insights into timelines, connections between events, and the evolution of societies.



TRACKING ENVIRONMENTAL CHANGES

By analyzing geological layers, tree rings, ice cores, and other natural records, scientists can reconstruct past climates, study long-term environmental trends, and assess the impact of human activities on ecosystems.