

What does a "radiometric age" mean?

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In recent years, technical developments in dating methods are remarkable and precision in obtained ages and applicable age range for each method has been much improved.

However, it is not always guaranteed that obtained ages directly correspond to some geological events. To guarantee it, it is necessary to check whether the requirements for each method are satisfied or not. Furthermore, each dating method is based on different principles, which often correspond to different geologic event. However, nowadays many researchers are concerned with the developments in analytical techniques and they do not always pay much attention to check the obtained age values by comparing their required conditions. In this presentation, I will argue for the significance to check the meaning of obtained ages based on their required conditions to represent some geological events by showing some examples(eg.,closure temperature, zircon chronology, isochron).

As a conclusion, I stress the significance to check an obtained age by multiple dating methods and to examine the achievements of conditions required for each dating method.

Keywords: dating, radiometric age, age value, geologic event, required condition, closure temperature