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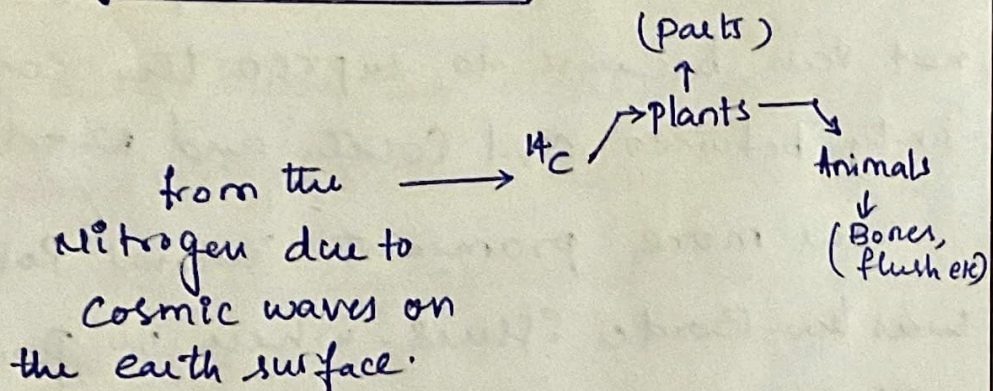
UPSC

Answer Questions in NOT MORE THAN the Word Limit specified for each in the Parenthesis.
(Specimen Answer Booklet - For Practice Purpose Only)

- ③ what do you know about radio carbon dating? discuss its applications in various fields (150w)

Radio Carbon dating is a process used to find the age of organisms in the environment.

working of carbon Dating



Dated back, when cosmic waves disturbed the nitrogen, it formed isotope of carbon i.e., " $^{14}\text{C}_6$ " which was taken by plants and animals. once they die, the organisms start to decompose. "As decomposition increases, ^{14}C in the organism decreases"

with the help of ^{14}C presence in the organism the age can be identified

RadioCarbon dating in used fields

- Archeological survey is the major beneficiary of this invention
- fastening of criminal procedure helps courts & policemen to find any case.
- Medical field can be benefited for virus variants, their timeline etc.
- geological studies like tectonic activities, strength of Rock etc can be calculated by civil engineers.

As the time getting passed, world is coming with innovations that teaches about the past and there can help in knowing about the earth past.