

much better understanding of the interaction of environment, climate and humans in the past. Nevertheless, all of the methods mentioned here still have potential for improvement with regard to precision, accuracy, age range and materials suitable for dating and these are presently being explored.

Relative dating	Absolute dating
Stratigraphy	Radiocarbon dating
Geological calendar	Potassium- argon dating
Glacial calendar	Thermoluminescence dating
Fossil fauna calendar	Archaeomagnetic dating
River terraces	Dendrochronology
Fluorine test dating	Varve analysis
Nitrogen dating	Oxygen 16/ 18 Ratio method
Palynology (pollen dating)	Obsidian hydration dating
Patination	

#### Absolute Dating versus Relative Dating

Absolute dating	Relative dating
A technique used to determine the exact age of the artefact or a site using methods such as carbon dating	A technique used to determine which object or item is older in comparison to the other one
Determines the numerical age	Arranges fossils in an order
Four methods are radiometric dating, amino acid dating, dendrochronology, and thermoluminescence	Involves biostratigraphy, stratigraphy, and cross dating
Precision is high	Precision is low
Quantitative measurement	Qualitative measurement
Works better for igneous and metamorphic rocks	Works better for sedimentary rocks having layered arrangement of sediments
Expensive and takes time	Less- expensive and efficient

**\*\*You may take up points from stratigraphy and c-14 dating as explanation of methods**

#### Q.6 Write short notes on the following topics:

(a) Olduvai Gorge 10

(b) Salient features of Mesolithic culture 10

(c) Bhimbetaka 10

(d) Sohan culture 10

#### (a) Olduvai Gorge 10

**Approach:**