

Core blimey! Scientist calls for geological 'time machine'

February 4 2008

A geologist from the University of Leicester has proposed an immense (1.5km) exhibition to illustrate the vastness of geological time and to give a vivid perspective of how quickly human activity is changing the climate.

Sediments accumulate on deep ocean floors at a rate of a few centimetres every thousand years. The study of this – called stratigraphy – involves drilling vertically down into the sea bed to extract a sample core which gives a picture of continually changing life, environment and climate.

Dr. Jan Zalasiewicz, of the University of Leicester's Department of Geology, together with Professor Paul Pearson of Cardiff University and colleagues at the Stratigraphy Commission of the Geological Society of London, propose that exhibiting a core will dramatically illustrate how brief human history has been. A continuous core going back 64 million years – to the time of the dinosaurs - would be 1.5km long.

Writing in the journal *Geoscientist*, he said: "On this scale, the last 10,000 years in which civilization developed is about 30cm thick... and the time since the Industrial Revolution is represented by just a few millimetres of sediment."

Key events could be marked, such as the evolution of humans and also, more importantly, the huge lengths of time over which the Earth has endured, and recovered from previous climactic upheavals such as ice



ages.

He continues: "At the base of the core a signpost would point to the formation of the Earth, 100km away, and the origin of the universe at 300km."

The exhibition, if ever realised, would be comparable in scale to the UK's National Space Centre, the brainchild of the University of Leicester, or the Eden Project.

Source: University of Leicester

Citation: Core blimey! Scientist calls for geological 'time machine' (2008, February 4) retrieved 8 April 2024 from https://phys.org/news/2008-02-core-blimey-scientist-geological-machine.html

This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.