



29th December 2022

LGS Newsletter 164.6

Best wishes for the New Year!

Note: This newsletter is being sent out early because of the disruption to postal services.

Down to Earth Magazine (DTE)

Electronic copies of this publication are available, which we have permission to email to LGS members. If you would like pdf copies of DTE Extra issue number 120, December 2022 and DTE Extra issue number 121, January 2023, please email Maggie Williams (Secretary) at lgssecretary19@gmail.com and they will be sent to you.

Liverpool Geological Society events



Tuesday 10th January 2023

At 7.30 p.m. in Lecture Theatre D, Central Teaching Hub.

LGS Members' Evening

There will be four talks by Society members:

"Almost one off the bucket list"

Chris Hunt

"The Hidden History of Earth Expansion"

Stephen Hurrell

Plate Tectonics has been recognised as one of the major scientific revolutions of the 20th century. Yet many geologists proposed an even more radical theory in the decade or so before Plate Tectonics was widely accepted. They thought there was evidence that the Earth was expanding. I'll discuss some of the geologists who proposed this theory, what evidence they saw, and try to discover why most of them abandoned this concept in favour of Plate Tectonics.

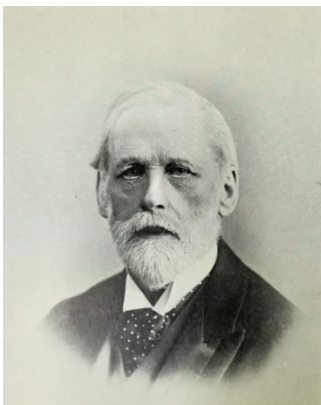
"From Fairy Hill to Weighing Worlds"

Peter Williams

"G.H. Morton's geological collection"

Maggie Williams

Find out what happened to the Geological collection of the founding member of the Liverpool Geological Society.



Tuesday 24th January 2023

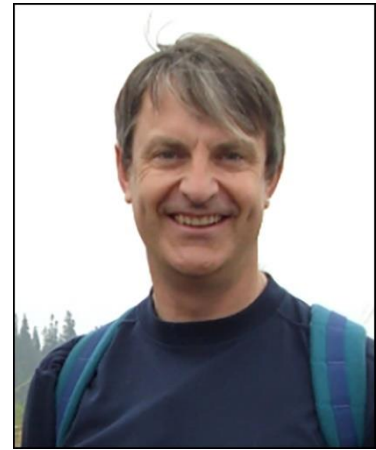
At 7.30 p.m. in Lecture Theatre D, Central Teaching Hub.

Lecture by Professor Andy Plater (University of Liverpool)

Title: “Modelling the cost of sea level rise and coastal flooding”

Biography:

Andy is a coastal geomorphologist with a keen interest in reconstructing system response to changes in sea-level, sediment supply and extreme events (storms and high rainfall). Most of his work focuses on sedimentary archives of environmental change, and what can be determined from these archives in terms of environmental forcing, response and recovery, human impact, and sediment provenance. His work also links to the application of modelling and monitoring to detect, characterize and predict coastal change for climate change adaptation.



Herdman Symposium 2023



Saturday 11 February 2023 09:00 – 17:00

2023 will be the 50th anniversary of the Herdman Symposium and the Herdman Society plans for this to be held in-person in the Central Teaching Hub at the University of Liverpool. In recent years, this symposium has become a significant event in Northwest England attracting over 250 participants each year. In celebration of its 50th anniversary, the Herdman Symposium will explore how far the field of Geological Sciences has come over the last 50 years, and where research is projected to take us in the future.

Further details will be sent out in 2023.

New palaeontology online short course from the Natural History Museum

Deepen your understanding of our world with Museum experts and scientists.

Would you like to understand more about the origin of our solar system, the scientific principles behind the planetary emergency, or how researchers are tackling the threat of the next pandemic? The six-week Masterclass courses will cover the breadth of cutting-edge science undertaken by researchers at the Museum.

Dr Nick Crumpton (Short Course Programme Coordinator) reports that we have recently developed a new programme of public, six-week short courses which are taught online, on-demand by Museum scientists about some of the cutting-edge research being undertaken behind the scenes in the Museum. You can find out more about the new Masterclass programme here:

https://www.nhm.ac.uk/our-science/courses-and-students/NHM_Masterclass.html

Manchester Geological Association (MGA)

Wednesday 11th January 2023 at 7.00 p.m. (Zoom only)

Virtual lecture by Prof Ian Fairchild, University of Birmingham

Title: Turning up the heat on Snowball Earth -

Details: <http://www.mangeolassoc.org.uk/indoormeetings.php>

Yorkshire Geological Society (YGS)

Thursday 19th January 2023 7.00 – 8.00 p.m.

Webinar by Dr Nick Riley

Title: The Carboniferous: A Very Special Time on Earth

Abstract:

The late Devonian comprised a series of extinction events. Some were probably driven by climate change, perhaps in response to the first appearance of trees in the mid-Devonian, which would have changed the biogeochemistry of the land-atmosphere-ocean system. There is also evidence that a supernova may have irradiated the Earth thus enhancing the final end-Devonian extinction event. The early Carboniferous, particularly in the marine realm, displays a period of gradual recovery from the Devonian extinctions, with renewed evolutionary radiation in the marine realm of calcareous benthic foraminifera, corals, echinoderms, ammonoids, and trilobites. In the terrestrial realm, plants diversified, particularly trees, leading to the first widespread equatorial rainforests on Earth. There is evidence, both from marine and terrestrial organism palaeobiology, that by at least Viséan times oxygen levels were higher than today. This probably resulted from the CO₂ drawdown by the rainforests, thus enhancing a global cooling trend that was not significantly reversed until the catastrophic end Permian extinction event. Winged insects appeared for the first time and remained the only creatures with powered flight until the pterosaurs appeared in the late Triassic, who likely preyed on insects. Indeed if the Devonian can be claimed “the age of fishes” the Carboniferous can be claimed as “the age of insects” Tetrapod evolution accelerated, so that by late Carboniferous times the amphibians, true reptiles and the clade of tetrapods leading eventually to the appearance of the first mammals in the late Triassic (Norian), had become distinct from each other. It is likely that the ability to clot blood using platelets appeared during the Carboniferous thus paving

Details: <https://www.yorksgeolsoc.org.uk/events-list/the-carboniferous-what-a-special-time>