

Weekly Update

1. Are non-living things... evolving? Yes, says leading mineralogist

A set of integrated and evolving tools that do not just pertain to life. Everything is evolving and we are still part of that incredible and inspiring evolution of our universe. According to this definition, evolution applies not only to living systems such as plants and animals, but also to non-living systems.

Source: **BIG THINK**

<https://bigthink.com/the-well/how-rocks-minerals-survive-and-evolve/>

2. Cytomegalovirus Shown to Cause Glioblastoma

Cytomegalovirus belongs to the family of herpes viruses, which has a very high prevalence. For example, in France, it is known that about half of the people are infected with this virus. The virus is transmitted through body fluids, including blood, urine, saliva, breast milk, tears, semen and vaginal fluid.

Source: **MedScape**

<https://www.medscape.com/viewarticle/cytomegalovirus-shown-cause-glioblastoma-2024a1000cvr?form=fpf>

3. Elon Musk says he is going to put brain chip into second person – despite major issues with the first

The first Neuralink experiment, called "Telepathy", uses 1,24 electrodes on 64 flexible wires; each of these threads is thinner than a human hair and can be placed independently in the brain. Neuralink will place some fibers even deeper into the brain and watch how they move.

Source: **The Independent**

<https://www.independent.co.uk/tech/elon-musk-neuralink-brain-chip-b2578318.html>

4. HIV prevention drug found 100% effective in clinical trial

The pharmaceutical company Gilead Sciences plans to present a complete file containing the results of the tests to scientists and regulatory authorities in Uganda and South Africa. It is hoped that the drug will be approved and accepted by more countries and the World Health Organization, and in the future, more tests will be conducted to better identify how to use it in real conditions.

Source: **Live Science**

https://www.livescience.com/health/hiv/hiv-prevention-drug-found-100-effective-in-clinical-trial?utm_medium=social&utm_campaign=socialflow&utm_source=twitter.com&utm_content=livescience

5. Is the universe still making new galaxies?

Whether or not the universe is still forming galaxies may seem like a funny question; but it allows us to explore the chaotic, complex and beautiful process of galaxy formation, and of course it is interesting to know that there are two answers to this question: yes and no! New galaxies continue to be born on the cosmic landscape as the process continues with new rounds of star formation.

Source: Space.com

<https://www.space.com/are-new-galaxies-still-forming>

6. Scientists have confirmed a cave on the moon that could be used to shelter future explorer

According to Italian scientists, this cave is at least 40 meters wide and dozens of meters long. This cave is just 400 kilometers away from the place where Apollo 11 landed on the surface of the moon. Neil Armstrong and Buzz Aldrin landed on its surface 55 years ago, and they believe that there are hundreds of other caves on the moon that can be used as shelter for astronauts.

Source: The Hindu

<https://www.thehindu.com/sci-tech/science/scientists-have-confirmed-a-cave-on-the-moon-that-could-be-used-to-shelter-future-explorers/article68407526.ece>

7. Did The Romans Really Use Gladiator Sweat As An Aphrodisiac?

Although "Gladiator 2" may be based on history, it is quite obvious that gladiators spent most of their lives in blood and sweat. Given the many inaccuracies found in Pliny's Natural History, it is difficult to know how accurate Pliny's descriptions of Greek health and medicine were.

Source: IFL Science

<https://www.iflscience.com/did-the-romans-really-use-gladiator-sweat-as-an-aphrodisiac-75136#:~:text=Exactly%20what%20the%20ancient%20Romans,aphrodisiac%20and%20a%20medical%20panacea.>

8. The psychology of political violence: Insights from recent studies

Researchers say that before the research, they suspected that ambivalent people would find a place for themselves in the middle of the spectrum. But contrary to this idea, these people showed extreme behavior. Political psychologists say that excessive polarization of society paves the way for civil war. Traditionally, such questions are answered from political, social and cultural perspectives.

Source: psypost

<https://www.psypost.org/the-psychology-of-political-violence-insights-from-recent-studies/>

9. B-2 Bombers Land on Guam for First Time in 5 Years

The contract included B-2 enhancements, maintenance, sustainment engineering, software maintenance and logistics elements including support equipment. "This modernization program is the largest major change ever made to the aircraft." Guam is a strategic US territory in the Pacific Ocean and is expected to become a launch pad for US bombers in the event of a conflict with China.

Source: RealClear Defense

https://www.realcleardefense.com/2024/06/19/b-2_bombers_land_on_guam_for_first_time_in_5_years_1039003.html#:~:text=Multiple%20B%2D2%20bombers%20flew,the%20first%20time%20in%20years.

10. Association between body mass index and semen quality: a systematic review and meta-analysis

The problem with examining sperm is that many variables can affect it: environmental pollution, smoking, age, illness, diet and other factors. Epidemiologist Yingxin Li of Sun Yat-sen University and his colleagues wrote in an article: "The continuous decline in human sperm quality over the past decades has raised many concerns globally."

Source: nature

<https://www.nature.com/articles/s41366-024-01580-w>