

The Week That Was: 2024 11-02 (November 2, 2024)

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The Science and Environmental Policy Project

Quote of the Week: *“Collective fear stimulates herd instinct and tends to produce ferocity toward those who are not regarded as members of the herd.”* — Bertrand Russell, **Unpopular Essays**

Number of the Week: 95%

THIS WEEK:

By Ken Haapala, President, Science and Environmental Policy Project (SEPP)

Scope: This Week discusses the complexity of the sun and part of what we do not know. It presents the abstract of a paper by Donald Rapp who is concerned about rising atmospheric CO₂ concentrations. Also discussed are the false notion of settled science, questionable classification of subsidies, rising electricity rates in the US, the use of the term unprecedented, and the questionable optimism of a recent report by the IEA,

The Mysterious Sun: The Sun and the relationship between Earth and Sun are the dominant characteristics of climate change. According to the mathematical model developed by Serbian mathematician Milutin Milankovitch three types of cyclical patterns describe how the Earth revolves around the Sun:

- The shape of Earth’s orbit, known as eccentricity;
- The angle Earth’s axis is tilted with respect to Earth’s orbital plane, known as obliquity;
- The direction Earth’s axis of rotation is pointed, known as precession.

According to a NASA website, each cycle has a different duration. Changes in eccentricity vary between 0.0034 (almost a perfect circle) to 0.058 (slightly elliptical) and the duration is 100,000 years. The eccentricity explains why seasons are different lengths. In the Northern Hemisphere summers are longer than winters.

Changes in obliquity, tilt, are described as 41,000-year cycles. The tilt varies between 22.1 and 24.5 degrees from a North Pole – South Pole axis. And changes in the direction Earth’s axis is pointed (a wobble) is described as a 26,000-year cycle. According to the NASA Science Editorial Team.

“Milankovitch’s work was supported by other researchers of his time, and he authored numerous publications on his hypothesis. But it wasn’t until about 10 years after his death in 1958 that the global science community began to take serious notice of his theory. In 1976, a study in the journal Science by Hays et al. using deep-sea sediment cores found that Milankovitch cycles

correspond with periods of major climate change over the past 450,000 years, with Ice Ages occurring when Earth was undergoing different stages of orbital variation.

Several other projects and studies have also upheld the validity of Milankovitch's work, including research using data from ice cores in Greenland and Antarctica that has provided strong evidence of Milankovitch cycles going back many hundreds of thousands of years. In addition, his work has been embraced by the National Research Council of the U.S. National Academy of Sciences.

Scientific research to better understand the mechanisms that cause changes in Earth's rotation and how specifically Milankovitch cycles combine to affect climate is ongoing. But the theory that they drive the timing of glacial-interglacial cycles is well accepted."

Many researchers have proposed that not well understood changes in the Sun influence Earth's climate in terms of years and decades. The UN Intergovernmental Panel on Climate Change (IPCC) and its collaborators dismiss changes in the Sun as insignificant. The private CERES-Science team proposes that Sun's energy has changed over the last 45 years in a paper published by the Astrophysical Journal: "Multiple New or Updated Satellite Total Solar Irradiance (TSI) Composites (1978–2023)." The CERES-Science team has posted the entire dataset. The entire dataset is often missing in some of the critical work that the IPCC uses such as the Mann, *et al.* hockey-stick. The abstract of the CERES-Science paper reads:

Several total solar irradiance (TSI) satellite missions have been carried out since 1978. None of these missions have lasted more than one to two solar cycles (SCs), and each mission implies a slightly different absolute TSI baseline. Nonetheless, several satellite composites have been developed by compositing satellite data from different missions to form an almost continuous daily record for the satellite era. However, disconcertingly, each mission has implied slightly different changes in TSI between consecutive solar minima and solar maxima. Some groups have developed adjustments to individual missions that have substantially reduced these differences. Others prefer to use the original data published by the satellite science teams. Some TSI composites average together conflicting records, while others prioritize specific records over others. Here, we compare four existing composites to 17 new alternative series based on the available satellite data. These 21 TSI series are statistically sorted into six groups of three to four series each. We found that the six groups suggest different intercycle trends between solar minima. We compare the groups to eight daily resolved solar proxy-based TSI reconstructions and to daily sunspot numbers. Excellent agreement is obtained over one to two SCs, but significant differences are observed over longer timescales for each group. Therefore, we have assembled all these time series (old and new) into a large and new TSI data set for use by the scientific community. Versions scaled to 1 au (for studying solar variability) or in situ values at Earth (for studying solar/terrestrial interactions) are provided at daily, monthly, and yearly resolutions.

The principal author, Ronan Connolly, has posted a video explaining this work. He explains that there are three hypotheses regarding sunspots and Total Solar Irradiance (TSI):

1. Sunspots cool Earth, less solar radiation – sunspots are dark features, less TSI.

2. Sunspots warm Earth, sunspot activity up, more TSI, Earth warms
3. TSI may be independent of sunspot activity.

Connolly concludes that based on satellite measurements all three are partly right and partly wrong. Generally, for one year data, the higher the sunspot number the lower the TSI. For ten-year data, the higher the sunspot number the higher the TSI. This paradox illustrates the complexity of the issue, and the need to examine all the solid data available and not limit the examination to specific time periods.

Adding to the complexity is that occurrence of large bright areas on the sun accompanying small dark sunspots. These cannot be observed with ordinary method because the sun is too bright and can only be observed when dark lenses are used. The bright regions are called solar plages or bright floccule or chromospheric faculae. The chromosphere (sphere of color) is the second layer of the sun's atmosphere above photosphere (the outer shell from which light is radiated) and below the solar transition region and the corona (the outmost layer).

Connolly asserts bright floccule (solar plages) accompanying sunspots increase TSI more than the sunspots decrease TSI. Does the bright floccule, sunspot activity and TSI relationship remain the same over most solar cycles? We don't know. This has been an ongoing debate since the late 1990s. There appear to be two different solar cycles and the TSI is different in each solar minimum. However, relying on the sunspot record is not good enough, and an increase in TSI may contribute to global warming. Further, the shortage of data from the satellite record is a problem prior to 1996. The question is which record since 1996 is most reliable because each satellite record shows slightly different behavior.

There have been different types of adjustments to the satellite data with the adjusted data known as the PMOD adjustments showing almost an exact linear relationship between sunspots and TSI from 1978 to 2013. This adjustment requires a correction to the Nimbus 7 data for the instruments to become more sensitive. Douglas Hoyt, head of the Nimbus 7 team, stated that the Nimbus team was unable to find any physical change to justify the adjustment or any change in the method of calculating the results. (The abstract of one of his papers can be found at: <https://agupubs.onlinelibrary.wiley.com/doi/abs/10.1029/91JA02488>)

Connolly discusses that the CERES-Science team provides a new way to look at satellite data – updating past composites and providing additional ones to bring the total to 21. They brought them into six separate groups and calculated the average of these six groups. Five groups are significantly different than one group close to the PMOD calculations which the IPCC uses. The principle researcher of PMOD is now dead and Connolly is reluctant to directly address the methods of calculation because the principle researcher cannot reply.

From the work of the CERES-Science team, one can appreciate how complex it is to understand the changing complexity of the principle driver of Earth's climate. To say the science of Earth's climate is settled is absurd. See links under Challenging the Orthodoxy.

Concern about CO₂: Donald Rapp is an accomplished physicist. According to his biography on Amazon, Rapp has:

“over 60 years of technical research experience. He was a full professor at the University of Texas and spent over 30 years at Caltech's Jet Propulsion Laboratory. In his early career he worked in chemical physics, producing a dozen citation classics with up to a thousand citations, and textbooks on quantum mechanics and statistical mechanics. Later, he worked on spacecraft technology leading to his book "Human Missions to Mars". Since about 2006 he has worked mainly on climate change, ice ages and human missions to Mars. His positions on many key issues are contrary to mainstream trends. In particular, he is highly doubtful that life ever existed on Mars and thinks the NASA Mars Program is a boondoggle. He is also skeptical of alarmist claims regarding the dangers of global warming, but he is concerned about rising CO₂. At age 88, he is still going strong with a new book coming out in February 2023.”

<https://www.amazon.com/stores/author/B001HPZPCU/about>

The fourth edition of his book **Assessing Climate Change: Temperatures, Solar Radiation and Heat Balance** was published in November 2016.

Donald Rapp informed Ken Haapala that his new paper addresses current climate change: “Estimate of Temperature Rise in the 21st Century for Various Scenarios.” The abstract reads:

“The International Panel on Climate Change (IPCC) published a lengthy report on climate change in early 2023. This report hypothesizes five potential scenarios of greenhouse gas emissions from 2015 to the end of the century (2100) and estimates the global average temperature gain in the year 2100 from the mid-1800s for each scenario. The method of calculation in the IPCC report is obscure. The results are merely stated.

The present paper provides a clear method for estimating the temperature gain each year from 2015 until 2100, along with yearly estimates of ppm of CO₂. To facilitate the calculations, a set of scenarios of future emissions was chosen that is analogous to the scenarios used by the IPCC but is more amenable to computation.

The basic assumption in this paper is that most of the temperature gain from the mid-1800s to 2015 (1.15 C – as reported by the IPCC) was due to rising CO₂ concentration in the atmosphere and a relationship is thereby derived between warming and gigatons of CO₂ emitted for the period: 1800s to 2015. If it is assumed that the amount of warming per gigaton CO₂ from the past persists into the 21st century, then future warming in the 21st century can be estimated for any assumed future scenario of CO₂ emissions.

This paper provides a simple and clear estimate of yearly CO₂ ppm and temperature rise from 2015 to 2100 since the 1800s for a set of scenarios that cover the likely range of future emissions.”

An honest scientist, Rapp states the key assumption: ***“The basic assumption in this paper is that most of the temperature gain from the mid-1800s to 2015 (1.15 C – as reported by the IPCC) was due to rising CO₂ concentration in the atmosphere and a relationship is thereby derived between warming and gigatons of CO₂ emitted for the period: 1800s to 2015.”***

To TWTW the lack of comprehensive data and the tremendous uncertainties involved make it impossible to test this key assumption. The uncertainties and the inability to test key assumptions in the many assertions involved in climate change are the principle reasons why TWTW focuses so heavily on understanding the greenhouse effect, even though it evolves a field of physics that is distant from classical physics. As discussed in last week's TWTW, the scale and dimensions involved are far different. The issue is important because fossil fuels which increase atmospheric CO₂ are needed for reliable, affordable electricity. Perhaps one day they may be replaced by nuclear energy, even fusion. But that day is not today. For Rapp's accomplished paper, see link under Defending the Orthodoxy; for last week's discussion of importance of scale see <https://www.sepp.org/twtwfiles/2024/TWTW%2010-26-2024.pdf>

Settled Science? One of the exaggerations made by climate alarmist is that the science is "settled." Charles Rotter of WUWT points out a new paper that terrestrial plants absorb 31% more CO₂ than previously calculated. Rotter writes:

"The discovery that plants absorb 31% more CO₂ than we thought reveals just how far off the mark climate models—and the policies based on them—can be. It's not just a matter of revising a few numbers; it's about rethinking the entire narrative of 'settled science.'"

If verified, this will require a recalculation for the "settled science." See links under Challenging the Orthodoxy.

What Are Subsidies? Proponents of wind and solar have long claimed massive subsidies to fossil fuels and often included dubious arguments that the depletion allowance is one such subsidy. The depletion allowance is similar to depreciation of an asset, they both lessen the value of the asset. Writing for the UK Daily Sceptic David Turver provides a solid economic analysis of what is a subsidy and what is not. He states:

"In simple terms, a subsidy is when the Government pays (or mandates consumers to pay) for an activity to occur that otherwise would not happen if the market were left to its own devices. Examples might include grants to theatre companies or awarding CfD [Contract for Difference] contracts to offshore wind.

When it comes to oil and gas, the definition of a subsidy becomes a little controversial. The International Energy Agency (IEA) defines fossil fuel subsidies as 'measures that reduce the effective price of fossil fuels below world market prices.' It is certainly true that some countries, such as Russia and Iran, do subsidize hydrocarbons according to the IEA's definition."

Turver provides a graph by IEA showing the Value of fossil-fuel subsidies by fuel in the top 25 countries, 2022. The US, UK, and Germany do not appear. Leading the list are Russia, Iran, China, Saudi Arabia, and Egypt.

Turver provides an analysis comparing UK Fossil Fuel "Subsidies" and Taxes [paid] 2022. This shows the subsidies amount to about 24.8 billion pounds while the taxes amount to about 49.8 billion pounds. In 2024 the expected subsidies are about 0.2 billion pounds while the taxes are expected to be about the same.

It would be interesting to see such an analysis for the US, particularly the subsidies to solar and wind power compared to the taxes paid. For California, the results would be ridiculous, especially if the value of electricity, delivered or not delivered, is also calculated. On summer sunny days solar power in California often generates more power than needed and nothing in the evening when needed the most. See link under Challenging the Orthodoxy.

Rising Electricity Costs: Writing for Master Resource, Bill Peacock gives a grim analysis of rising electricity costs in the US, by grid sectors. He writes:

“During the first three years under Biden vs. last three under Trump, average wholesale electric prices in the seven U.S. independent or regional service areas have increased by 72%. Retail prices are also higher. The average 2024 U.S. residential rate to date is 24% higher than in 2020. For all end users—residential, commercial, industrial, and transportation sectors—prices are up 23%.

This rate surge reflects the massive renewable energy subsidies authorized in the Inflation Reduction Act of 2022, signed by President Biden, which tripled the outlay of such federal largesse. Another factor is the administration’s natural gas policies, which banned imports of Russian oil, liquefied natural gas, and coal; joined with the European Commission to reduce Europe’s dependence on Russian oil; and put a pause on LNG permits. Natural gas combined cycle, the technology of choice in a free market, is as cheap as ever, representing the path not taken.

Whether it is the unprecedented subsidies for renewable energy or the unprecedented war on American energy, the Biden administration’s policies are behind the increase in America’s electricity prices.

Wholesale Prices Up 72%

Wholesale electricity prices are the best indicator of the direction of electricity prices. State regulations on retail prices often shield consumers from immediate exposure to rising energy prices. Eventually, though, consumers will bear the full brunt of higher wholesale electricity costs either through higher retail electric prices, lower income, or higher prices for other goods and services.”

“ERCOT, which covers most of Texas, had the highest average wholesale price over the last three years at \$117. It also had the highest three-year increase at 208%. ISO New England had the second highest average price at \$81, followed by California ISO at \$80. CAISO also had the second highest three-year price increase at 81%. New York ISO was next averaging \$68, although prices in New York City were considerably higher at \$80.”

Peacock gives a table showing *estimates* of U.S. Federal Energy Subsidies, 2020-2029: Renewables \$244,874,000,000; Fossil Fuels, 22,474,000,000; Nuclear \$19,116,000,000. He then states that:

“From 2010 through 2019, solar received \$82 per megawatt hour of electricity generated. That is 42 times the amount of subsidies per megawatt hour nuclear received, 112 times coal, and 211 times oil and gas. For wind, its multiples were 10 times nuclear, 26 times coal, and 48 times oil and gas. The ‘free’ wind and solar generation actually cost taxpayers \$74 billion last decade in federal subsidies, without including the cost of the electricity or state and local subsidies.”

This analysis shows the government subsidies to wind and solar are not the path to reliable, affordable electricity. See link under Challenging the Orthodoxy.

Unprecedented: A characteristic of yellow journalism and climate propaganda is the use of the term “unprecedented.” Heavy rains fell in the Valencia region of Spain, and immediately mainstream media shrieked “unprecedented.” The volume of water involved was not unprecedented, but due to human settlement in flood plains and increasing prosperity, the loss of human life and property may have been. According to an article in Reuters, the phenomenon known locally as DANA may have been the cause. DANA is a Spanish acronym for high-altitude isolated depression, and unlike common storms or squalls it can form independently of polar or subtropical jet streams. See links under Changing Weather.

Optimism v. Reality: The International Energy Agency (IEA) came out with the World Energy Outlook 2024 that TWTW finds unrealistic in assessing the replacement of fossil fuels with alternatives such as wind and solar. Among other issues, the problems of the unreliability of wind and solar have not been addressed. Storage of electricity is a vexing problem, and the only proven large scale storage is pumped hydro replenished by reliable fossil fuel or nuclear generation. Batteries for storage of electricity is tiny compared with the enormity of the scale needed, and replenishment of the stored electricity is seldom mentioned. Paul Homewood mentions a good critique by Art Berman “IEA Optimism vs. Reality: The Contradictions in the Energy Transition.” After presenting a number of factual issues and graphs Berman concludes:

*“The IEA’s **World Energy Outlook 2024** offers an optimistic view of a smooth transition to renewables. This is at odds, however, with the realities of energy consumption, economic growth, and the hard limits of ecosystem capacity. Despite decades of investment, fossil fuel consumption remains stubbornly high, and expectations for renewables to sustain comparable economic growth are idealistic.*

The IEA and many renewable energy advocates ignore the fundamental problem of ‘overshoot’—the reality that human consumption has already surpassed the planet’s ecological limits. The optimistic projection for a renewable energy future reflects an inadequate understanding of the past and present. The idea that renewables can sustain continued economic growth without addressing the underlying issue of excessive resource use is dangerously naive.

Economic expansion requires more than just cleaner energy—it demands vast material inputs and energy yields that renewables, in their current form, struggle to provide. By focusing only on decarbonization, these projections overlook the deeper challenge: a growth-based system incompatible with planetary boundaries. Until the obsession with endless growth and consumption is confronted, energy forecasts, no matter how green they appear, will remain built on wishful thinking.”

See links under Questioning the Orthodoxy

Number of the Week: 95% In “#CheerfulCharts #13: US sulfur dioxide trends” links to and EPA chart: US Sulfur Dioxide Trends: National Trends.

All regions of the US are below the minimum National Standard. This actual pollutant used to be a big problem in urban air in North America and Europe, but improved technology scrubbed from smokestacks and automobile exhaust, getting it out of the exhaust before it even got into the air we breathe. This is a success story for the EPA.

Unfortunately, the EPA has gone on to disgrace its reputation by embracing the linear no-threshold model by regulating most amounts of particles in the air that are 2.5 micrometers or less in diameter PM2.5. But more egregiously. EPA has declared carbon dioxide, which is essential for photosynthesis, the source of food for all complex life, a pollutant. All without physical evidence of harm to humans.

Further, EPA has declared all greenhouse gases are pollutants, but largely ignores the primary greenhouse gas, water vapor. Regulating water vapor is as far beyond the control of the EPA as regulating carbon dioxide emissions from China. See links under Questioning the Orthodoxy.

NEWS YOU CAN USE:

Science: Is the Sun Rising?

How has the Sun’s energy changed over the last 45 years?

By CERES-Science team, Accessed Oct 29, 2024

<https://www.ceres-science.com/post/how-has-the-suns-energy-changed-over-the-last-45-years>

Link to paper: **Multiple New or Updated Satellite Total Solar Irradiance (TSI) Composites (1978–2023)**

By Ronan Connolly, et al., The Astrophysical Journal, Oct 29, 2024

<https://iopscience.iop.org/article/10.3847/1538-4357/ad7794>

Link to dataset: **Total Solar Irradiance in the satellite era (1978-present)**

By Ronan Connolly, et al., The Astrophysical Journal, Oct 29, 2024

<https://www.ceres-science.com/portfolio-collections/solar-activity/total-solar-irradiance-in-the-satellite-era>

Video, Watching the Sun: 45 years of satellite data [Bottom of post]

<https://www.ceres-science.com/post/watching-the-sun-45-years-of-satellite-data>

[SEPP Comment: Video has a good description of sunspot observations and the discovery the rough cycle and solar radiation received by Earth.]

Milankovitch (Orbital) Cycles and Their Role in Earth’s Climate

NASA Science Editorial Team, Updated Oct 22, 2024

<https://science.nasa.gov/science-research/earth-science/milankovitch-orbital-cycles-and-their-role-in-earths-climate/>

Challenging the Orthodoxy -- NIPCC

Climate Change Reconsidered II: Physical Science

Idso, Carter, and Singer, Lead Authors/Editors, Nongovernmental International Panel on Climate Change (NIPCC), 2013

<https://www.heartland.org/media-library/pdfs/CCR-II/CCR-II-Full.pdf>

Summary: <https://www.heartland.org/template-assets/documents/CCR/CCR-II/Summary-for-Policymakers.pdf>

Climate Change Reconsidered II: Biological Impacts

Idso, Idso, Carter, and Singer, Lead Authors/Editors, Nongovernmental International Panel on Climate Change (NIPCC), 2014

<http://climatechangereconsidered.org/climate-change-reconsidered-ii-biological-impacts/>

Climate Change Reconsidered II: Fossil Fuels

By Multiple Authors, Bezdek, Idso, Legates, and Singer eds., Nongovernmental International Panel on Climate Change, April 2019

<http://climatechangereconsidered.org/climate-change-reconsidered-ii-fossil-fuels/>

Why Scientists Disagree About Global Warming

The NIPCC Report on the Scientific Consensus

By Craig D. Idso, Robert M. Carter, and S. Fred Singer, Nongovernmental International Panel on Climate Change (NIPCC), Nov 23, 2015

<http://climatechangereconsidered.org/why-scientists-disagree-about-global-warming/>

Nature, Not Human Activity, Rules the Climate

S. Fred Singer, Editor, NIPCC, 2008

http://www.sepp.org/publications/nipcc_final.pdf

Challenging the Orthodoxy – Radiation Transfer

The Role of Greenhouse Gases in Energy Transfer in the Earth's Atmosphere

By W.A. van Wijngaarden and W. Happer, Preprint, Mar 3, 2023

<https://co2coalition.org/wp-content/uploads/2023/11/The-Role-of-Greenhouse-Gases-in-Energy-Transfer-in-the-Earths-Atmosphere.pdf>

Dependence of Earth's Thermal Radiation on Five Most Abundant Greenhouse Gases

By W.A. van Wijngaarden and W. Happer, Preprint, December 22, 2020

<https://wvanwijngaarden.info.yorku.ca/files/2020/12/WThermal-Radiationf.pdf?x45936>

Challenging the Orthodoxy

Oops, Science Was “Settled”—Until It Wasn't: Plants Absorb 31% More CO₂ Than We Thought

By Charles Rotter, WUWT, Oct 29, 2024

<https://wattsupwiththat.com/2024/10/29/oops-science-was-settled-until-it-wasnt-plants-absorb-31-more-co2-more-than-we-thought/>

Scientists Were Wrong: Plants Absorb 31% More CO₂ Than Previously Thought

Press Release, Oak Ridge Natural Laboratory, Oct 26, 2024

<https://scitechdaily.com/scientists-were-wrong-plants-absorb-31-more-co2-than-previously-thought/>

Link to paper: **Terrestrial photosynthesis inferred from plant carbonyl sulfide uptake**

By Jiameng Lai, Nature, Oct 16, 2024

<https://www.nature.com/articles/s41586-024-08050-3>

No, Fossil Fuels Are Not Being “Subsidised”

By David Turver, The Daily Sceptic, Oct 28, 2024

<https://dailysceptic.org/2024/10/28/no-fossil-fuels-are-not-being-subsidised/>

Rising Electricity Rates under Biden (Texas wholesale up 200%)

By Bill Peacock, Master Resource, Oct 30, 2024

<https://www.masterresource.org/texas/electricity-rates-under-biden/>

Climate News - November 2024

By Alan Moran, His Blog, Nov 1, 2024

<https://regulationeconomics.com/so/8aPBVo3zP?languageTag=en&cid=8760f05f-93da-4631-a061-9acbe88a819c>

Defending the Orthodoxy

Estimate of Temperature Rise in the 21st Century for Various Scenarios

By Donald Rapp, IgMin ID: igmin218, July 11, 2024

<https://www.igminresearch.com/articles/html/igmin218>

World already 'paying terrible price' for climate inaction: Guterres

By Nick Perry and Delphine Paysant, Terra Daily, Paris (AFP) Oct 24, 2024

https://www.terradaily.com/reports/World_already_paying_terrible_price_for_climate_inaction_Guterres_999.html

Link to report press release: **Nations must close huge emissions gap in new climate pledges and deliver immediate action, or 1.5°C lost**

Press Release: UN Environmental Program, Oct 24, 2024

<https://www.unep.org/news-and-stories/press-release/nations-must-close-huge-emissions-gap-new-climate-pledges-and>

Link to report: **Emissions Gap Report 2024**

By UN Environmental Program Oct 24, 2024

<https://www.unep.org/resources/emissions-gap-report-2024>

Defending the Orthodoxy – Bandwagon Science

Earth is becoming ‘increasingly uninhabitable,’ scientists warn

By Julia Musto, The Independent, Oct 29, 2024

https://www.newsbreak.com/share/3653886069171-earth-is-becoming-increasingly-uninhabitable-scientists-warn?_f=app_share&pd=06pnS6ul&lang=en_US&send_time=1730312090&trans_data=%7B%22platform%22%3A0%2C%22cv%22%3A%224.43.0.23%22%2C%22languages%22%3A%22en%22%7D&sep=ns_foryou_rank_exp_24q4-v3%2Cns_foryou_blend_exp_24q4-

[v8%2Cns_foryou_recall_exp_24q4-v2%2Cns_pushv1-v9%2Cns_foryou_model_exp_24q4-v8%2Cns_local_strategy_24q4_exp-v3%2Cns_summary_v1-v3&s=i3](#)

Link to: **Emissions Gap Report 2024**

By UNEP, Oct 24, 2024

<https://www.unep.org/resources/emissions-gap-report-2024>

From article: “We’re being tested. The planet is testing us to see if we can explain things that we didn’t anticipate,” NASA’s chief climate scientist Gavin Schmidt told The Independent on Tuesday. “And, we have not yet passed that test.”

The 2024 report of the Lancet Countdown on health and climate change: facing record-breaking threats from delayed action

By Marina Romanello, et al. Lancet, Oct 29, 2024

[https://www.thelancet.com/journals/lancet/article/PIIS0140-6736\(24\)01822-1/abstract?dgcid=raven_jbs_etoc_feature_lancetcountdown24](https://www.thelancet.com/journals/lancet/article/PIIS0140-6736(24)01822-1/abstract?dgcid=raven_jbs_etoc_feature_lancetcountdown24)

Despite the initial hope inspired by the 2015 Paris Agreement, the world is now dangerously close to breaching its target of limiting global multiyear mean heating to 1.5°C. Annual mean surface temperature reached a record high of 1.45°C above the pre-industrial baseline in 2023, and new temperature highs were recorded throughout 2024. The resulting climatic extremes are increasingly claiming lives and livelihoods worldwide.

Climate change kills the unborn: The UN wants us to save babies with solar panels and wind plants

By Jo Nova, Her Blog, Oct 30, 2024

<https://joannenova.com.au/2024/10/climate-change-kills-the-unborn-the-un-wants-us-to-save-babies-with-solar-panels-and-wind-plants/>

[SEPP Comment: The chart of child mortality and CO2 emissions per capita is revealing.]

UN: CO2 Killing Babies

By Tony Heller, His Blog, Oct 30, 2024

<https://realclimatescience.com/2024/10/un-co2-killing-babies/#gsc.tab=0>

Infant mortality is rapidly declining, but The Guardian and UN say CO2 is killing babies.

Asia-Pacific Climate Report 2024: Catalyzing Finance and Policy Solutions

By Staff, Asian Development Bank, October 2024

<https://www.adb.org/publications/asia-pacific-climate-report-2024>

[SEPP Comment: The estimated GDP of China was 47 billion in 1962 (60 years ago); it was \$17,795 in 2023. About 380 times that of 1962. Doubt a calculated reduction of future growth of 17% 50 years from now is very meaningful to the leaders of Asian countries.]

Nearly 40 percent of world’s trees face extinction, new assessment finds

By Ashleigh Fields, The Hill, Oct 29, 2024

<https://thehill.com/policy/energy-environment/4960430-worlds-trees-face-extinction/>

Link to: **More than one in three tree species worldwide faces extinction - IUCN Red List**
Cali, Colombia, 28 October 2024 (IUCN) – Thirty-eight per cent of the world’s trees are at risk of extinction according to the first Global Tree Assessment, published in today’s update of the

IUCN Red List of Threatened Species™. Also in today's update, the conservation status of the Western European hedgehog has deteriorated and is now listed as Near Threaten
By Staff, International Union for Conservation of Nature IUCN, Oct 28, 2024

[https://iucn.org/press-release/202410/more-one-three-tree-species-worldwide-faces-extinction-](https://iucn.org/press-release/202410/more-one-three-tree-species-worldwide-faces-extinction-iucn-red-)

[iucn-red-
list#:~:text=The%20IUCN%20Red%20List%20now,species%20are%20threatened%20with%20
extinction.](https://iucn.org/press-release/202410/more-one-three-tree-species-worldwide-faces-extinction-iucn-red-)

The highest proportion of threatened trees is found on islands. Island trees are at particularly high risk due to deforestation for urban development and agriculture at all scales, as well as invasive species, pests and diseases. Climate change is increasingly threatening trees, especially in the tropics, through sea-level rise and stronger, more frequent storms.

[SEPP Comment: Warming in the polar regions of the Northern Hemisphere is causing stronger, more frequent storms?]

UN COP16 nature talks gridlocked as conservation funding trickles in

By Jake Spring and Oliver Griffin, Reuters, Oct 29, 2024 [H/t Clare Goldsberry]

[https://www.reuters.com/business/environment/un-cop16-nature-talks-are-gridlocked-scientists-](https://www.reuters.com/business/environment/un-cop16-nature-talks-are-gridlocked-scientists-warn-extinction-risks-2024-10-)

[28/?utm_source=Sailthru&utm_medium=Newsletter&utm_campaign=Sustainable-Switch&utm_term=102924&user_email=1a362f11ab4ba92b1b37984db67d10b1163ee8de0975ff93cfd652c9964e1932<g=639493ce0ce3ce7ec80a0486](https://www.reuters.com/business/environment/un-cop16-nature-talks-are-gridlocked-scientists-warn-extinction-risks-2024-10-28/?utm_source=Sailthru&utm_medium=Newsletter&utm_campaign=Sustainable-Switch&utm_term=102924&user_email=1a362f11ab4ba92b1b37984db67d10b1163ee8de0975ff93cfd652c9964e1932<g=639493ce0ce3ce7ec80a0486)

The summit, which marks the 16th meeting of parties to the U.N. Convention on Biological Diversity (CBD), is debating how to implement 23 goals outlined in the 2022 Kunming-Montreal agreement.

Chief among those goals is having each country set aside 30% of its land and sea territory for conservation by 2030 - a target known as the 30-by-30 goal.

Questioning the Orthodoxy

#CheerfulCharts #13: US sulfur dioxide trends

By John Robson, Climate Discussion Nexus, Oct 30, 2024

<https://climatediscussionnexus.com/2024/10/30/cheerfulcharts-13-us-sulfur-dioxide-trends/>

Link to graph: **Sulfur Dioxide Trends: National Trends**

By Staff, EPA, Accessed Oct 30, 2024

<https://www.epa.gov/air-trends/sulfur-dioxide-trends>

Wrong, Earth.com, Climate Change is Actually Enhancing Life on Earth

By Anthon Watts, Climate Realism, Oct 30, 2024

<https://climaterealism.com/2024/10/wrong-earth-com-climate-change-is-actually-enhancing-life-on-earth/>

Link to: **The foundation of life is at risk from climate change**

By Andrei Ionescu, Earth.com, No Date

<https://www.earth.com/news/the-foundation-of-life-is-at-risk-from-climate-change/>

[SEPP Comment: Does high temperature affect photosynthesis? The underlying article, citing research at Uppsala University, claims hot temperatures shut down photosynthesis. Temperature affects plant growth differently with different species of plants. Assuming higher global

temperatures will shut down photosynthesis prompts the question: why did life flourish during hothouse Earth? Plants adapt to changing climate and flourish with increasing CO2.]

Seven years to go! Extremely bad science is the new normal for the climate

By Jo Nova, Her Blog, Nov 1, 2024

<https://joannenova.com.au/2024/11/seven-years-to-go-extremely-bad-science-is-the-new-normal-for-the-climate/>

Brave scientists at the CSIRO and BoM have dug hard through the sacred Arc of the Climate Covenant, CMIP-6, to discover the horrible truth that we only have seven years (just seven!) until we pass through the sanctified Target-of-Paris on Halloween of 2031.

IEA Optimism v Reality

By Paul Homewood, Not a Lot of People Know That, Oct 28, 2024

<https://notalotofpeopleknowthat.wordpress.com/2024/10/28/iea-optimism-v-reality/>

Link to critique: **IEA Optimism vs. Reality: The Contradictions in the Energy Transition**

By Art Berman, His Blog, Oct 23, 2024

<https://www.artberman.com/blog/iea-optimism-vs-reality-the-contradictions-in-the-energy-transition/>

Global Warming Failure

By Cliff Mass, Weather Blog, Oct 31, 2024

<https://cliffmass.blogspot.com/2024/10/global-warming-failure.html>

Consider the trends of the two main greenhouse gases, CO₂ and methane. (Remember, that a greenhouse gas warms the planet by absorbing and emitting infrared radiation.)

[SEPP Comment: Mass omits the most important greenhouse gas, water vapor, which the UN and its collaborators largely ignore. It is added to model calculations after the effects of other greenhouse gases are calculated. This procedure is wrong. Water vapor reduces the effectiveness of CO₂, methane, and nitrous oxide.]

Lack of carbon, lack of carbon, get yours today

By John Robson, Climate Discussion Nexus, Oct 30, 2024

<https://climatediscussionnexus.com/2024/10/30/lack-of-carbon-lack-of-carbon-get-yours-today/>

Among the many frail reeds bundled together into the authoritative solution to climate change, one is to put a price on carbon so you can buy someone else's proclaimed lack of it to offset your continuing to spew the stuff. Which seems a bit like getting clean by not doing laundry while someone somewhere does so much of it that the whole planet is robbed in shimmering green at least rhetorically. Or paying someone else to forgo demon rum so you can keep sozzling.

Claim: Australia has ALREADY Experienced 1.5C of Warming

By Eric Worrall, WUWT, Oct 31, 2024

<https://wattsupwiththat.com/2024/10/31/claim-australia-has-already-experienced-1-5c-global-warming/>

Still waiting for the promised climate disaster.

Energy & Environmental Review: October 28, 2024

By John Droz, Jr., Master Resource, Oct 28, 2024

<https://www.masterresource.org/alliance-for-wise-energy-decisions/energy-environmental-review-10-28-2024/>

After Paris!

Advance Briefing for COP29 Baku 2024

By Ron Clutz, His Blog, Oct 31, 2024

<https://rclutz.com/2024/10/31/advance-briefing-for-cop29-baku-2024/>

Link to: COP29 Summit in Baku: What to Expect

By Alice C. Hill and Priyanka Mahat, Council on Foreign Relations, Oct 31, 2024

<https://www.cfr.org/expert-brief/cop29-summit-baku-what-expect>

In today's news, nothing happened

By John Robson, Climate Discussion Nexus, Oct 30, 2024

<https://climatediscussionnexus.com/2024/10/30/in-todays-news-nothing-happened/>

Hey, wait a minute. What happened to COP29? Isn't it the big show, the place to walk the walk, stop bloviating and save Earth, penguins, snowpersons and all? Mind you, while COP28 attracted a widely ridiculed 85,000 participants (some 97,000 people registered so evidently there were a few thousand no-shows), with barely two weeks to go COP29 had only 32,000 registrants (including us).

Social Benefits of Carbon Dioxide

Oh nuts, more CO2

By John Robson, Climate Discussion Nexus, Oct 30, 2024

<https://climatediscussionnexus.com/2024/10/30/oh-nuts-more-co2/>

CO2 Science archive

Problems in the Orthodoxy

This game is easy

By John Robson, Climate Discussion Nexus, Oct 30, 2024

<https://climatediscussionnexus.com/2024/10/30/this-game-is-easy/>

But then you read a column by the *New York Times*' marquee climate writer David Gelles that starts with a baffled "Cleaning up the technology industry was supposed to be easy" and you realize that the fate of humankind is, to a disquieting degree, in the hands of people who think practical difficulties are invented by the malicious to sabotage an outbreak of peace, plenty and harmony. How was cleaning up anything, let alone an industry that requires a lot of weird mineral inputs, going to be "easy"?

And here you thought everyone was as absolutist as you are on the subject. **But** of course, a major part of the problem was the overall promise that getting to Net Zero wouldn't just be easy, it would take less than no work because the greener we got the richer as well as cleaner we'd get.

All because we trusted our future to people who had inexplicably reached adulthood without discovering the existence of practical difficulties. [Boldface added]

Observed carbon decoupling of subnational production insufficient for net-zero goal by 2050

By Maria Zioga, et al., PNAS, Oct 28, 2024 [H/t Bernie Kepshire]

<https://www.pnas.org/doi/10.1073/pnas.2411419121>

Seeking a Common Ground

As Retirement Approaches...

By Roy Spencer, His Blog, Oct 26, 2024

<https://www.drroyspencer.com/2024/10/as-retirement-approaches/>

Since I've been getting questions about my retirement plans, I decided it's time to address what I know so far.

John Christy will be retiring from UAH July 2026. Because my funding has been tied to his projects (including the Alabama Office of the State Climatologist, which he heads), there is a good chance I will also be retiring on or before that date.

The main issue with my continuing employment past his retirement date is the lack of funding from the federal government. We had a Department of Energy contract, but it is ending, and we have very few friends in Washington since we remain on the "wrong side" of the science.

Climate Journalism Done Right

The Washington Post: The Real Reason for Increasing Billion Dollar Disasters

By Roger Pielke Jr. His Blog, Oct 24, 2024

https://rogerpielkejr.substack.com/p/climate-journalism-done-right?utm_source=post-email-title&publication_id=119454&post_id=150664430&utm_campaign=email-post-title&isFreemail=true&r=f7h7&triedRedirect=true&utm_medium=email

The article is richly reported and includes much more than I've discussed here. Before I send you to read the whole thing, I want to highlight some remarkable statements and admissions from NOAA, the Biden Administration, and U.S. National Climate Assessment (NCA) contributors:

Resolving the Dissonance Regarding Fossil Fuels

By Vijay Jayaraj, CO2 Coalition, Oct 28, 2024

<https://co2coalition.org/2024/10/28/resolving-the-dissonance-regarding-fossil-fuels/>

Science, Policy, and Evidence

Cut Meat and Dairy Consumption By 50%, Orders CCC

By Paul Homewood, Not a Lot of People Know That, Oct 27, 2024

<https://notalotofpeopleknowthat.wordpress.com/2024/10/27/cut-meat-and-dairy-consumption-by-50-orders-ccc/>

"The Climate Change Committee said in an ideal scenario, meat and dairy consumption should halve by 2050 and products be substituted with plant-based options."

[SEPP Comment: More authoritarian regulations built on flimsy evidence.]

Put Policy Pragmatism Over Climate Obsession

By Kristen Walker, Real Clear Energy, Oct 29, 2024

https://www.realclearenergy.org/articles/2024/10/29/put_policy_pragmatism_over_climate_obsession_1068490.html

Measurement Issues -- Surface

Thin cool ocean surface enhances carbon absorption

By Erica Marchand, Paris, France (SPX) Oct 28, 2024

https://www.terraily.com/reports/Thin_cool_ocean_surface_enhances_carbon_absorption_999.html

Link to probable paper: **Enhanced ocean CO₂ uptake due to near-surface temperature gradients**

By Daniel J. Ford, et al., Nature Geoscience, Oct 25, 2024

<https://www.nature.com/articles/s41561-024-01570-7>

From abstract: Accounting for this increased ocean uptake will probably require some revision to how global carbon budgets are quantified.

Changing Weather

What caused deadly floods in Spain? The impact of DANA explained

By Andrei Khalip, Reuters, Oct 31, 2024

<https://www.reuters.com/business/environment/spains-deadly-dana-weather-phenomenon-its-links-climate-change-2024-10-30/>

DANA causes flash floods, hail, and tornadoes in Spain

Experts **suspect** DANA's growing frequency linked to climate change [Boldface added]

Aemet: DANA is a high-altitude depression, distinct from common storms

From the article: The phenomenon is known locally as DANA, a Spanish acronym for high-altitude isolated depression, and unlike common storms or squalls it can form independently of polar or subtropical jet streams.

Flash Floods In Spain

By Paul Homewood, Not a Lot of People Know That, Oct 30, 2024

<https://notalotofpeopleknowthat.wordpress.com/2024/10/30/flash-floods-in-spain/>

KNMI daily rainfall data shows categorically that extreme rainfall is neither more common or extreme.

Valencia's Floods in 1957

By Paul Homewood, Not a Lot of People Know That, Oct 31, 2024

<https://notalotofpeopleknowthat.wordpress.com/2024/10/31/valencias-floods-in-1957/>

Video of aftermath

Valencia Floods Update

By Paul Homewood, Not a Lot of People Know That, Oct 31, 2024

<https://notalotofpeopleknowthat.wordpress.com/2024/10/31/valencia-floods-update/>

It serves as reminder that flood defenses more often than not simply transfer problems elsewhere.

A History Of Catastrophic Flooding In Spain

By Paul Homewood, Not a Lot of People Know That, Nov 1, 2024

<https://notalotofpeopleknowthat.wordpress.com/2024/11/01/a-history-of-catastrophic-flooding-in-spain/>

Historian Geoffrey Parker. in his book "Global Crisis" which researched the cataclysmic weather wrought during the Little Ice Age, notes that Catalonia suffered the "year of the flood" in 1617, after a month of continuous rain, followed by a four-day downpour which washed away bridges, mills, drainage works, houses and even town walls.

Historical floods in the southeastern Iberian Peninsula since the 16th century: Trends and regional analysis of extreme flood events

By C. Sánchez-García and L. Schulte, *Global and Planetary Change*, December 2023

<https://www.sciencedirect.com/science/article/pii/S0921818123002916>

Destructive floods in 1550, 1729, 1879, 1973. The last three are classified as magnitude 4.

Defacing Art Can Prevent Floods

By Tony Heller, His Blog, Oct 31, 2024

<https://realclimatescience.com/2024/10/defacing-art-can-prevent-floods/#gsc.tab=0>

Link to paper: **Study of historical flood events on Spanish rivers using documentary data**

By Mariano Barriendos & Fernando Rodrigo, *Hydrological Sciences Journal*, October 2006

<https://www.tandfonline.com/doi/pdf/10.1623/hysj.51.5.765>

The Worst Disaster Year In History

By Tony Heller, His Blog, Oct 31, 2024

<https://realclimatescience.com/2024/10/the-worst-disaster-year-in-history/#gsc.tab=0>

Year 2024 Global Northern Hemisphere Hurricane Season is Clearly Below “Normal” Despite all the Alarmist Hype focused on the North Atlantic

By Larry Hamlin, WUWT, Nov 1, 2024

<https://wattsupwiththat.com/2024/11/01/year-2024-global-northern-hemisphere-hurricane-season-is-clearly-below-normal-despite-all-the-alarmist-hype-focused-on-the-north-atlantic/>

[SEPP Comment: *Premature, the season ends November 30.*]

Changing Climate – Cultures & Civilizations

Lost Silk Road Cities

By Paul Homewood, Not a Lot of People Know That, Oct 30, 2024

<https://notalotofpeopleknowthat.wordpress.com/2024/10/30/lost-silk-road-cities/>

From report: High-altitude urban sites are "extraordinarily rare" in the archaeological record because communities face unique challenges in settling there, said Zachary Silvia, an archaeologist at Brown University.

From Homewood: No mention of the Medieval Warm Period then!!!

Laser archeology finds lost Maya cities hidden under forests

By Saul Elbein, The Hill, Oct 29, 2024

<https://thehill.com/policy/energy-environment/4958042-maya-city-revealed-laser-imaging-archaeology/>

Link to paper: **Running out of empty space: environmental lidar and the crowded ancient landscape of Campeche, Mexico**

By Luke Auld-Thomas, et al., *Antiquity*, Oct 29, 2024

<https://www.cambridge.org/core/journals/antiquity/article/running-out-of-empty-space-environmental-lidar-and-the-crowded-ancient-landscape-of-campeche-mexico/FFDB435047017853F26CFC5D8804B08D>

That combination of dense forest atop the long-vanished cities of what was once a dense urban region has meant a succession of surprising finds for archeologists.

Changing Seas

Strengthening of the Equatorial Pacific Upper-Ocean Circulation Over the Past Three Decades

By Franz Philip Tuchen, et al., JGR Oceans, Oct 31, 2024 [H/t Bernie Kepshire]

<https://agupubs.onlinelibrary.wiley.com/doi/10.1029/2024JC021343>

Robust Beach Ridge Evidence Indicates Mid Holocene Sea Levels Were 1-5 Meters Higher Than Today

By Kenneth Richard, No Tricks Zone, Oct 31, 2024

<https://notrickszone.com/2024/10/31/robust-beach-ridge-evidence-indicates-mid-holocene-sea-levels-were-1-5-meters-higher-than-today/>

Link to most dramatic paper: **Elevation and age of a raised beach in the upper Gulf of Thailand, as evidence for regional sea level during the Late Holocene**

By James P. Terry, et al., Journal of Asian Earth Sciences, September 2024

<https://www.sciencedirect.com/science/article/abs/pii/S1367912024002542>

[SEPP Comment: The 'higher' seas in the upper, restricting, Gulf of Thailand may be from changes in prevailing wind direction, not from increases in volume of ocean water.]

Lowering Standards

The Unnecessary Decline of U.S. Numerical Weather Prediction

By Cliff Mass, Weather Blog, Oct 27, 2024

<https://cliffmass.blogspot.com/2024/10/the-unnecessary-decline-of-us-numerical.html>

The reporter only had half the story: **traditional U.S. global weather prediction models, which solve the complex equations that describe atmospheric physics, have declined into mediocrity.**

Specifically, NOAA's global model, the UFS, is now in third or fourth place behind the European Center, the UK Meteorology Office, and often the Canadians. The plot below shows a comparison for the middle troposphere (at a pressure of 500 hPa) [shown in text] between the European Center and the NOAA. We are behind and not catching up.

With the Chevron Doctrine Overturned, the New 'Judicial Veto' of Regulations Will be Detrimental to Science and Business

By Henry Miller, ACSH, Oct 29, 2024

<https://www.acsh.org/news/2024/10/29/chevron-doctrine-overturned-new-judicial-veto-regulations-will-be-detrimental>

[SEPP Comment: The Chevron Deference protected agencies such as the EPA when they made destructive decisions, such as banning DDT and declaring that greenhouse gases are pollutants. Millions in developing countries died of preventable malaria as a result of the EPA DDT pronouncement made without physical evidence that ordinary amounts of DDT were harmful to humans. Similarly, there is no physical evidence that ordinary amounts of water vapor and carbon dioxide are harmful to humans who exhale 100 times the concentration of CO2 than they inhale. Miller is speculating on possible future damage and ignoring the damage being done now by Chevron Deference. Government agencies must be held accountable for damaging regulations based on poor or no science.]

Governments subsidizing ‘unprecedented’ health threats from fossil fuels, leading medical journal finds

By Saul Elbein, The Hill, Oct 29, 2024

<https://thehill.com/policy/energy-environment/4958820-global-health-crisis-fossil-fuel-subsidies-research/>

Link did not work, probable report: **The 2024 Global Report of the Lancet Countdown**

The latest Lancet Countdown report reveals the health threats of climate change have reached record-breaking levels.

By Staff, Lancet, 2024

<https://lancetcountdown.org/2024-report/>

[SEPP Comment: According to a graph in data, South Asia is experiencing over 150 deaths per 100,000 from PM2.5. Are these death recorded? Of course not. They are modeled based on speculation.]

Reeves to make Bank of England put climate change and growth on equal footing

By Paul Homewood, Not a Lot of People Know That, Oct 30, 2024

<https://notalotofpeopleknowthat.wordpress.com/2024/10/30/reeves-to-make-bank-of-england-put-climate-change-and-growth-on-equal-footing/>

So much for the Bank’s much vaunted independence!

From quoted article: *“It comes despite stark criticism from high-profile economists, including Lord Mervyn King, the former Bank of England governor, who have warned that climate change is a distraction from fighting inflation.”*

Communicating Better to the Public – Use Yellow (Green) Journalism?

BBC Still In Denial About Sri Lanka’s Ban on Fertilizers

By Paul Homewood, Not a Lot of People Know That, Oct 29, 2024

<https://notalotofpeopleknowthat.wordpress.com/2024/10/29/bbc-still-in-denial-about-sri-lankas-ban-on-fertilisers/>

Extreme Drought Triples–BBC Lies

By Paul Homewood, Not a Lot of People Know That, Oct 31, 2024

<https://notalotofpeopleknowthat.wordpress.com/2024/10/31/extreme-drought-triples-bbc-lies/>

We are familiar with these junk studies from the Lancet, and this one at first sight looks just as bad.

Communicating Better to the Public – Exaggerate, or be Vague?

Dust from California’s lithium-rich Salton Sea worsening child respiratory issues: Study

By Sharon Udasin, The Hill, Oct 28, 2024

<https://thehill.com/policy/energy-environment/4957265-salton-sea-dust-children-respiratory-issues-study/>

Link to paper: **Air quality and wheeze symptoms in a rural children's cohort near a drying saline lake**

By Jill E. Johnston, et al., Environmental Research, Dec 15, 2024 (date as stated)

<https://www.sciencedirect.com/science/article/abs/pii/S0013935124019777>

From the study: Dust from saline lakebeds is associated with a high proportion of particles <10 µm that include adsorbed sulfate, chloride, pesticides, and toxic metals such as arsenic, lead, and chromium (Johnston et al., 2019).

[SEPP Comment: The paper does not mention lithium, apparently added by the reporter. Where is the physical evidence that dust causes wheeze symptoms in children and is harmful?]

October was one of the driest months in history

By Ashleigh Fields, The Hill, Oct 31, 2024

<https://thehill.com/policy/energy-environment/4964221-october-was-one-of-the-driest-months-in-history/>

The abnormality has been accompanied by flash drought in surrounding regions including New Jersey.

[SEPP Comment: How long is a flash drought – 5 minutes up?]

Toxic contamination of Southern California’s coast lives on decades later: Study

By Sharon Udasin, The Hill, Oct 28, 2024

<https://thehill.com/policy/energy-environment/4957616-toxic-pesticides-southern-california/>

Link to paper: **The persistent DDT footprint of ocean disposal, and ecological controls on bioaccumulation in fishes**

By Lillian McGill, et al. PNAS, Oct 28, 2024

<https://www.pnas.org/doi/10.1073/pnas.2401500121>

[SEPP Comment: There are no recognized studies showing the level at which DDT is toxic to humans.]

Communicating Better to the Public – Make things up.

Climate change worsened disasters that caused half a million deaths: Report

By Zack Budryk, The Hill, Oct 31, 2024

<https://thehill.com/policy/energy-environment/4964015-climate-change-extreme-weather-study/>

[SEPP Comment: More nonsense from the legislative lobbying group WWA]

Communicating Better to the Public – Do a Poll?

The Green New Scam Is Dying

By James Rickards, The Daily Reckoning, Oct 24, 2024 [H/t Bernie Kepshire]

<https://dailyreckoning.com/the-green-new-scam-is-dying/>

I Want My ICE Car Back

A fairly recent survey by consulting firm McKinsey and Co. shows that 29% of EV owners in nine major economies want to return to ICE vehicles. When the sample is narrowed to just the U.S., 46% of those surveyed want to return to ICEs.

Investigating the role of source and source trust in prebunks and debunks of misinformation in online experiments across four EU countries

By Hendrik Bruns, et al., Nature, Sep 5, 2024 [H/t Bernie Kepshire]

<https://www.nature.com/articles/s41598-024-71599-6>

Opening sentence of abstract: Misinformation surrounding crises poses a significant challenge for public institutions. Understanding the relative effectiveness of different types of interventions

to counter misinformation, and which segments of the population are most and least receptive to them, is crucial.

Communicating Better to the Public – Protest

Greens Detest ‘Little Guys’ Who Get in Their Way

Rural and coastal little guys delay and block massive ‘green’ energy projects

By Paul Driessen, WUWT, Oct 31, 2024

<https://wattsupwiththat.com/2024/10/31/greens-detest-little-guys-who-get-in-their-way/>

Questioning European Green

Ed Miliband’s Net Zero Department Given 22% More Cash to Waste on Green Energy

Unicorns – and Other Budget Horrors

By David Turver, The Daily Sceptic, Oct 31, 2024

<https://dailysceptic.org/2024/10/31/ed-milibands-net-zero-department-given-22-more-cash-to-waste-on-green-energy-unicorns-and-other-budget-horrors/>

Dortmund Germany Delays Transition To Electric Buses Due To High Costs, Will Purchase Diesel Buses

By P Gosselin, No Tricks Zone, Oct 26, 2024

<https://notrickszone.com/2024/10/26/dortmund-germany-delays-transition-to-electric-buses-due-to-high-costs-will-purchase-diesel-buses/>

Green Jobs

Don’t Feel Sorry For VW... Liberal Arts College Dropout, Anti-Auto-Activist On Supervisory Board!

By P Gosselin, No Tricks Zone, Oct 30, 2024

<https://notrickszone.com/2024/10/30/dont-feel-sorry-for-vw-liberal-arts-college-dropout-anti-auto-activist-on-supervisory-board/>

After its politically driven foray into electric vehicles, Volkswagen is facing significant financial challenges...plans to close at least three of its German factories...unprecedented move in the company’s history.... tens of thousands of jobs will be lost!

Historic moment for Volkswagen: Automaker plans to close ‘at least’ 3 German plants and cut thousands of jobs

By Hanna Ziady, CNN, Oct 28, 2024

<https://www.cnn.com/2024/10/28/business/volkswagen-factory-closures-layoffs/index.html>

Far From Gröven

The future of Germany's automotive industry is bleak.

By Doomberg, Nov 1, 2024

https://newsletter.doomberg.com/p/far-from-gruven?utm_source=post-email-title&publication_id=343139&post_id=150995005&utm_campaign=email-post-title&isFreemail=true&r=f7h7&triedRedirect=true&utm_medium=email

Litigation Issues

“Borders on bad faith”; “too clever by half”; “gamesmanship”

By Staff, Government Accountability & Oversight, Nov 1, 2024

<https://govoversight.org/borders-on-bad-faith-too-clever-by-half-gamesmanship/>

Brief filed slamming DoE stunt suddenly deciding there are no LNG pause studies after all

Los Angeles County sues PepsiCo, Coca-Cola over role in plastic pollution ‘crisis’

By Zack Budryk, The Hill, Nov 1, 2024

<https://thehill.com/policy/energy-environment/4966035-soda-giants-misled-recyclability/>

In the Wednesday complaint, the county alleged that the companies promoted their bottles as recyclable but knew most of them would end up in landfills and that they cannot be meaningfully recycled without environmental harms.

Subsidies and Mandates Forever

Environmental Levies To Cost £108 Billion By 2029/30

By Paul Homewood, Not a Lot of People Know That, Nov 1, 2024

<https://notalotofpeopleknowthat.wordpress.com/2024/11/01/environmental-levies-to-cost-108-billion-by-2029-30/>

The OBR [Office of Budget Responsibility] is very explicit about the new budget!!

Spending up by £70 billion (so much for “black holes”!), tax up by £36 billion and borrowing by £32 billion.

[SEPP Comment: Environmental Levies are really subsidies for “renewable” energy.]

EPA and other Regulators on the March

Climate Pollution Reduction Grant

By Staff, Virginia Department of Environmental Quality, Accessed Oct 31, 2024

<https://www.deq.virginia.gov/our-programs/air/greenhouse-gases/climate-pollution-reduction-grant>

On Monday, July 22nd, the Environmental Protection Agency (EPA) announced that the Virginia Department of Environmental Quality (DEQ) has been selected to receive two Climate Pollution Reduction Grants (CPRG). These grants will provide \$149,999,999 to DEQ and \$197,237,676 total for greenhouse gas reduction initiatives to be implemented in the Commonwealth of Virginia.

Energy Issues – Non-US

Affordable electricity can resolve worldwide poverty

By Ronald Stein, Oliver Hemmers, and Steve Curtis, America Outloud, Oct 29, 2024

<https://www.americaoutloud.news/affordable-electricity-can-resolve-worldwide-poverty/>

[SEPP Comment: There is no low energy, prosperous country.]

CCC Call For Steeper Emission Cuts

By Paul Homewood, Not a Lot of People Know That, Oct 26, 2024

<https://notalotofpeopleknowthat.wordpress.com/2024/10/26/ccc-call-for-steeper-emission-cuts/>

Have not the CCC [Committee on Climate Change] done enough damage to this country already?

Grid Companies Bracing For Power Cuts

By Paul Homewood, Not a Lot of People Know That, Oct 31, 2024

<https://notalotofpeopleknowthat.wordpress.com/2024/10/31/grid-companies-bracing-for-power-cuts/>

But clearly these minor events are not what Northern Powergrid have in mind. Instead it appears they are worried about major outages when we simply don't have enough power to go round. I wonder why?

Prepare For Blackouts, Say Energy Networks

By Paul Homewood, Not a Lot of People Know That, Oct 26, 2024

<https://notalotofpeopleknowthat.wordpress.com/2024/10/26/prepare-for-blackouts-say-energy-networks/>

They're starting to get worried now:

Failed State: Since 2021, 10% of the population left Cuba, and now the country has fuel shortages and blackouts

By Jo Nova, Her Blog, Oct 29, 2024

<https://joannenova.com.au/2024/10/failed-state-since-2021-10-of-the-population-left-cuba-and-now-the-country-has-fuel-shortages-and-blackouts/>

The eight power plants are largely crude fuel oil plants of about 400MW. In total, theoretically, they could generate 2,500MW. In actuality, they are badly built, badly maintained, and 30 to 40 years old. Power generation has declined by 25% in the last five years.

Cuba: The Collapse Accelerates

By Francis Menton, Manhattan Contrarian, Oct 29, 2024

<https://www.manhattancontrarian.com/blog/2024-10-29-cuba-the-collapse-accelerates>

Link to article: **From a population of 11 million to little more than 8.5 million: The real toll of Cuba's migratory crisis**

According to numbers compiled by Cuban economist and demographer Juan Carlos Albizu-Campos, the island's population fell by 18% between 2022 and 2023

By Carla Gloria Colome, El Pais, July 23, 2024

<https://english.elpais.com/international/2024-07-23/from-a-population-of-11-million-to-little-more-than-85-million-the-real-toll-of-cubas-migratory-crisis.html>

Article in Reuters: **Cuba power grid: How it collapsed and what comes next**

By Dave Sherwood, Reuters, Oct 18, 2024

<https://www.reuters.com/world/americas/how-cubas-electrical-grid-collapsed-what-comes-next-2024-10-18/>

Cuba's national grid collapsed on Friday, leaving the entire population of 10 million people without electricity and underscoring the precarious state of the Communist-run country's infrastructure and economy.

Long-time ally Venezuela slashed fuel shipments to Cuba by half this year as it struggles to assure supply at home. Allies Russia and Mexico have also cut exports to Cuba, forcing the cash-strapped government to seek far pricier fuel on the spot market.

Menton: From the Guardian: In a televised address, Cuba's prime minister, Manuel Marrero, said . . . the government looks to renewables to secure its future energy needs. The island is blessed by sunshine, but the multiple attempts to start solar projects have nearly all failed when the companies involved failed to get paid. . . .

Energy Issues – Australia

Astonishing cost, miserable return

It will take a long time to undo the damage done to our energy grid

By Alan Moran, Spectator, Australia, Oct 27, 2024

https://www.regulationeconomics.com/_files/ugd/b6987c_447af2a81cb44e878cd40735ddfb663c.pdf?utm_campaign=48cc028c-79f8-46c9-a3f5-e2cc8286438a&utm_source=so&utm_medium=mail_lp&cid=8760f05f-93da-4631-a061-9acbe88a819c

Aside from the obvious higher electricity bills, this dangerous experiment with the nation's power system is creating an industrial wasteland. Unwinding the damage politicians and their bureaucrats have imposed will be slow and painful all the more so because there are only a handful of politicians aware of it.

\$650m in renewable energy didn't save Broken Hill from days of blackouts after a storm islanded it

By Jo Nova, Her Blog, Oct 28, 2024

<https://joannenova.com.au/2024/10/650m-in-renewable-energy-didnt-save-broken-hill-from-days-of-blackouts-after-a-storm-islanded-it/>

Mayor of Broken Hill: "(Wind and solar) are worse than useless (in a crisis like this), because it's detrimental to having a consistent power supply," he said. "I'd hate to see what happens in the capital cities in a similar crisis."

Energy Issues -- US

An electrifying discrepancy

By John Robson, Climate Discussion Nexus, Oct 30, 2024

<https://climatediscussionnexus.com/2024/10/30/an-electrifying-discrepancy/>

Link to: **Energy Conservation Program for Consumer Products: Representative Average Unit Costs of Energy**

By Staff, Department of Energy, Federal Register, Oct 17, 2024

<https://www.govinfo.gov/content/pkg/FR-2024-10-17/pdf/2024-23893.pdf>

Robson: On a per-unit of heat basis the Department of Energy estimates that electricity is the most expensive way to stay warm, at \$47.36 per Btu. That's 3.5 times costlier than the cheapest option, natural gas, which comes in at \$13.38 per Btu. Heating oil, propane and kerosene are in between.

Bipartisan Confrontation of the Minerals Crisis

By Rich Nolan, Real Clear Energy, Oct 30, 2024

https://www.realclearenergy.org/articles/2024/10/30/bipartisan_confrontation_of_the_minerals_crisis_1068784.html

Each time the U.S. confronts China over trade practices – such as the stealing of intellectual property – or puts in place tariffs on Chinese products, Beijing now retaliates with export quotas on minerals we don't – but should – produce here.

Why Data Center Developers Should Think 'Power First'

By Aaron Larson, Power Mag, Oct 30, 2024

https://www.powermag.com/why-data-center-developers-should-think-power-first/?utm_source=omeda&utm_medium=email&utm_campaign=pwrnews+eletter&oly_enc_id=7809H6412578J0B

Group Files Plans for Massive Gas-Fired Plant, Data Center Complex in Virginia

By Darrell Proctor, Power Mag, Oct 28, 2024

https://www.powermag.com/group-files-plans-for-massive-gas-fired-plant-data-center-complex-in-virginia/?utm_source=omeda&utm_medium=email&utm_campaign=pwrnews+eletter&oly_enc_id=7809H6412578J0B

Reports say the power plant could have as much as 3,500 MW of generation capacity, which would make it the largest such facility in the state.

Balico LLC, a private company based in Herndon, Virginia, has asked for permission to rezone land in Pittsylvania County.

[SEPP Comment: Pittsylvania County has a population slightly over 60,000. It has a large uranium deposit for which the permits to mine were recently denied.]

Microsoft Announces \$1 Billion Investment in Ohio Data Centers as Officials Ponder Power Demands

By Darrell Proctor, Power Mag, Oct 28, 2024

https://www.powermag.com/microsoft-announces-1-billion-investment-in-ohio-data-centers-as-officials-ponder-power-demands/?utm_source=omeda&utm_medium=email&utm_campaign=pwrnews+eletter&oly_enc_id=7809H6412578J0B

Natural Gas and AI Data Centers Provide Unique PA Political Opportunity

By Tim Ryan, Real Clear Energy, Oct 30, 2024

https://www.realclearenergy.org/articles/2024/10/30/natural_gas_and_ai_data_centers_provide_unique_pa_political_opportunity_1068790.html

The U.S. Is Now More Dependent on Fossil Fuel Power Than China

By Tsvetana Paraskova, Oil Price.com, Oct 25, 2024 [H/t Bernie Kepshire]

<https://oilprice.com/Latest-Energy-News/World-News/The-US-Is-Now-More-Dependent-on-Fossil-Fuel-Power-Than-China.html>

[SEPP Comment: No link to data. Nothing new, this was true for the 20th century.]

Oil and Natural Gas – the Future or the Past?

The Generational Opportunity for U.S. LNG

By Tristan Abbey, WUWT, Oct 29, 2024

<https://wattsupwiththat.com/2024/10/29/the-generational-opportunity-for-u-s-lng/>

Regulatory uncertainty means higher costs, longer and delayed timelines, and potentially disrupted supply chains. “Turning off” LNG exports would cause a cascading series of dislocations throughout the economy, not only in the export sector. It has taken the better part of a generation already to achieve the nation’s dominant position in natural gas.

[SEPP Comment: In the 1970s Washington thought the US was running out of natural gas and the world out of oil, and President Carter thought coal was the fuel needed to avoid the oncoming crisis.]

Return of King Coal?

Standing Up to the Coal Killers

By Duggan Flanakin, Real Clear Energy, Oct 29, 2024

https://www.realclearenergy.org/articles/2024/10/29/standing_up_to_the_coal_killers_1068492.html

Back in April the Group of Seven (Canada, France, Germany, Italy, Japan, the United Kingdom, and the United States) agreed on a time frame for phasing out coal-fired power plants in the first half of the 2030s. There was just one problem: Only the U.S. and Germany are among the world's top ten coal consumers.

The UN counts as members both China and India, which together consume nearly 70% of the world's coal production. Neither is a member of the G7. Nor does the "bold" G7 commitment explain how their self-imposed coal ban – which they want to impose on poor African nations – even matters.

Nuclear Energy and Fears

Japan nuclear reactor near Fukushima to restart

By AFP Staff Writers, Tokyo (AFP) Oct 29, 2024

https://www.energy-daily.com/reports/Japan_nuclear_reactor_near_Fukushima_to_restart_999.html

Japan has been turning back to nuclear power in order to cut emissions, reduce expensive imports of fossil fuels and meet energy demand for data centres for artificial intelligence (AI). Safety and regulatory standards have been tightened since, and the Onagawa plant -- cleared in 2020 to re-start -- has increased the height of its anti-tsunami wall to 29 metres (95 feet) above sea level, one of the highest in Japan.

Bill Gates' Energy Group, Former Google CEO Investing in Pacific Fusion Startup

By Darrell Proctor, Power Mag,

https://www.powermag.com/bill-gates-energy-group-former-google-ceo-investing-in-pacific-fusion-startup/?utm_source=omeda&utm_medium=email&utm_campaign=pwrnews+eletter&oly_enc_id=7809H6412578JOB

The Series A funding is a phased approach. The entire \$900 million is committed, but "only unlocked as the company achieves pre-defined milestones," General Catalyst [the parent venture capital firm] said.

Pacific Fusion wrote that the company's immediate goal is "Net facility gain. We are using these resources to build a high gain pulsed magnetic fusion driver to achieve 'net facility gain'. [more fusion energy output than all stored energy input].

[SEPP Comment: Makes far more sense than schemes to block sunlight.]

Five Ways the Tech Sector's Embrace of Nuclear Power Benefits America

By Paul Steidler, Real Clear Energy, Oct 31, 2024

https://www.realclearenergy.org/articles/2024/10/31/five_ways_the_tech_sectors_embrace_of_nuclear_power_benefits_america_1068793.html

Major Microreactor Developer Enters Bankruptcy Amid Nuclear Industry Surge

By Sonal Patel, Power Mag, Oct 29, 2024

https://www.powermag.com/major-microreactor-developer-enters-bankruptcy-amid-nuclear-industry-surge/?utm_source=omeda&utm_medium=email&utm_campaign=pwrnews+eletter&oly_enc_id=7809H6412578JOB

Alternative, Green (“Clean”) Solar and Wind

Blade failure at Vineyard Wind project costs manufacturer \$700 million, more blade problems found

The company said it’s removing “some blades” from Vineyard Wind following an analysis of 8,300 ultrasound images per blade, as well as physical inspections with “crawler” drones.

By Kevin Killough, Just the News, Oct 27, 2024

<https://justthenews.com/politics-policy/energy/blade-failure-vineyard-wind-project-costs-manufacturer-700-million-more>

Solar Costs Jump, More Offshore (And Onshore) Wind Woes, SMR Update, More H2 Cancellations

Koshkonong project cost jumps 42% in 19 months, GE Vernova takes \$700M charge on its offshore wind business and will remove blades at Vineyard Wind, plus SMRs and H2!

By Robert Bryce, His Blog, Oct 26, 2024

https://robertbryce.substack.com/p/solar-costs-jump-more-offshore-and?utm_source=post-email-title&publication_id=630873&post_id=150715363&utm_campaign=email-post-title&isFreemail=false&r=pdzbh&triedRedirect=true&utm_medium=email

[PAYWALLED – Must pay for access.]

Alternative, Green (“Clean”) Energy -- Other

The Better Path In Energy

By David Archibald, WUWT, Nov 1, 2024

<https://wattsupwiththat.com/2024/11/01/the-better-path-in-energy/>

Alternative, Green (“Clean”) Energy -- Storage

Big Battery Fire Regulation Confusion in Washington State

By David Wojick, WUWT, Oct 29, 2024

<https://wattsupwiththat.com/2024/10/29/big-battery-fire-regulation-confusion-in-washington-state/>

Washington State’s environmental agency, the Department of Ecology, recently took comments on dual draft Programmatic Environmental Impact Analyses (PEIS) for wind and solar developments. Unfortunately, while each had a section on grid battery fires there was significant confusion as each cited a regulation that as I read it does not apply to grid scale battery complexes.

Alternative, Green (“Clean”) Vehicles

Electric Vehicles: A Tale of Woe in the Absence of the Market Process

By Timothy G. Nash & Jason Hayes, Tom Rastin, Real Clear Energy, Oct 31, 2024

https://www.realclearenergy.org/articles/2024/10/31/electric_vehicles_a_tale_of_woe_in_the_absence_of_the_market_process_1069139.html

Milton Friedman explained that “market processes” allow individuals to interact and exchange goods and services voluntarily. The prices they charge in these exchanges guide production and consumption decisions, ultimately leading to the most efficient resource allocations, maximized customer satisfaction, and increased purchasing power, and this all occurs with minimal need for government interference.

[SEPP Comment: Is voluntarily in Washington’s vocabulary?]

Ford Lost Another \$1.2 Billion in 3Q On EVs

FoMoCo lost \$58,391 for every EV it sold during the quarter.

By Robert Bryce, His Blog, Oct 28, 2024

https://robertbryce.substack.com/p/ford-lost-another-12-billion-in-3q?utm_source=post-email-title&publication_id=630873&post_id=150861920&utm_campaign=email-post-title&isFreemail=true&r=f7h7&triedRedirect=true&utm_medium=email

‘Why did our parked electric car burst into flames?’

By Paul Homewood, Not a Lot of People Know That, Oct 27, 2024

<https://notalotofpeopleknowthat.wordpress.com/2024/10/27/why-did-our-parked-electric-car-burst-into-flames/>

The one percenters

By John Robson, Climate Discussion Nexus, Oct 30, 2024

<https://climatediscussionnexus.com/2024/10/30/the-one-percenters/>

OK, to be fair, the city of Calgary, in progressive hands, launched an ambitious half-billion-of-other-people’s-dollars plan to the municipal vehicle fleet to electric and show those short-sighted private-sector fools what real efficiency looks like. And how did it go? Oh. Awkward. The suppliers of 14 “emissions-free, 28-foot shuttle buses” to be delivered in 2022 instead went... bankrupt. So they leaped into committee, preparing to draft a scheme for a plan to devise a call for bids by year-end for a handful of buses to arrive in 2026, or on the 14th of never.

Electric bin lorry bursts into flames in central London

By Paul Homewood, Not a Lot of People Know That, Oct 28, 2024

<https://notalotofpeopleknowthat.wordpress.com/2024/10/28/electric-bin-lorry-bursts-into-flames-in-central-london/>

From article: “Specialist crews were deployed to the fire after the £580,000 electric lorry caught alight in the morning.

The lithium battery-powered trucks were recently launched under Sadiq Khan, the Mayor of London, as part of a green initiative to reduce carbon emissions in the capital.”

[SEPP Comment: In the US, a new trash truck goes for \$200,000 to \$350,000 or less than £460,00.]

Carbon Schemes

A Bit Of Perspective Goes A Long Way

By Willis Eschenbach, WUWT, Oct 31, 2024

<https://wattsupwiththat.com/2024/10/31/a-bit-of-perspective-goes-a-long-way/>

California Dreaming

Newsom signs executive order to curb electricity costs for Californians

By Sharon Udasin, The Hill, Oct 31, 2024

<https://thehill.com/policy/energy-environment/4963773-newsom-signs-executive-order-electricity-bills-relief/>

[SEPP Comment: How, grow cucumbers for sunbeams to create solar power at night?]

Gas price fears drive pushback against California plan to overhaul climate program

By Sharon Udasin, The Hill, Oct 29, 2024

<https://thehill.com/policy/energy-environment/4959335-california-republicans-gas-prices-climate-program-overhaul/>

All 12 of the Golden State's U.S. House members sent a letter on Friday to the California Air Resources Board (CARB), urging the agency to delay a decision that they believe would cause undue pain at the pump. The vote is scheduled for Nov. 8, just three days after the national elections.

Ways California Can Have Abundant Water

By Edward Ring, What's Current, Accessed Oct 30, 2024

<https://us10.campaign-archive.com/?e=cd9fa89d1e&u=11ce7cad5fe43ca4d5e1c25a7&id=c16f71847b>

A few years ago, a group of volunteers, myself included, attempted to qualify a state ballot initiative called "The Water Infrastructure Funding Act." Those of us involved with this project remain convinced that had it qualified for the ballot and been approved by voters, it would have solved water scarcity in California forever.

Health, Energy, and Climate

Lead poisoning costs world's children 765 million IQ points a year: Study

By Zack Budryk, The Hill, Oct 30, 2024

<https://thehill.com/policy/energy-environment/4962349-low-level-lead-poisoning-pervasive-health-impacts-study/>

Link to article: **Lead Poisoning**

By Bruce Lanphear, et al., New England Journal of Medicine, Oct 30, 2024

<https://www.nejm.org/browse/nejm-article-type/review-article>

[SEPP Comment: The headline trivializes a serious issue. Childhood lead poisoning is a well-known problem but it becoming another Linear No-Threshold environmental issue?]

Other News that May Be of Interest

Some wildfire suppressants may be unleashing heavy metals into the environment: Study

By Sharon Udasin, The Hill, Oct 30, 2024

<https://thehill.com/policy/energy-environment/4961677-wildfire-suppressants-heavy-metals-study/>

Link to paper: **Metals in Wildfire Suppressants**

By Marella H. Schamme, Samantha J. Gold, and Daniel L. McCurry, Environmental Science & Technology Letters, Oct 30, 2024

<https://pubs.acs.org/doi/full/10.1021/acs.estlett.4c00727>

BELOW THE BOTTOM LINE

California inks sustainable aviation fuel deal with major airlines

By Sharon Udasin, The Hill, Oct 31, 2024

<https://thehill.com/policy/energy-environment/4964066-california-airlines-sustainable-aviation-fuel-agreement/>

[SEPP Comment: Is the next step for passengers to bring their own fuel?]

Drunk animals far more common than previously thought, helping explain human love of alcohol

By Saul Elbein, The Hill, Oct 30, 2024

<https://thehill.com/policy/energy-environment/4958843-alcohol-animals-consume-study/>

Link to paper did not work.]

Stand and don't deliver

By John Robson, Climate Discussion Nexus, Oct 30, 2024

<https://climatediscussionnexus.com/2024/10/30/stand-and-dont-deliver/>

In the face of all this frenetic inactivity, UN Climate Change Executive Secretary Simon Stiell, and yes, lots of lucrative jet-setting jobs for the boys and girls including in his case with the UNFCCC not UNEP, just said COP29 in Azerbaijan in November “must be the stand-and-deliver COP”. Which has a certain logic to it, although if he had any research staff, they might have warned him that “stand and deliver!” was “said in the past by highwaymen when they stopped a carriage... to demand objects of value from the travelers” until America’s colorful hillbilly culture gave us the phrase “Reach for the sky” instead. So, a threat not outreach, albeit one he might not be very well placed to carry through on.

The Death of the Lamp Post

By Paul Homewood, Not a Lot of People Know That, Oct 28, 2024

<https://notalotofpeopleknowthat.wordpress.com/2024/10/28/the-death-of-the-lamp-post/>

Another step back to the Dark Ages.

Tidbits

By John Robson, Climate Discussion Nexus, Oct 30, 2024

<https://climatediscussionnexus.com/2024/10/30/tidbits-84/>

The government of Canada, apparently flush with borrowed cash, tells us “The communities of Shelburne and Barton will have 13 new, energy efficient, homes after an investment of more than \$5.1 million from the federal and provincial governments and Co-operative Homes Ltd. (Compass Nova Scotia).” And while we hate to do math in the midst of a spending blitz, including on the size of our national debt and interest payments on same, if it really takes over \$5 million in subsidies to procure 13 houses, we’re never going to get enough of them.

ARTICLES

1. America Can't Do Without Fracking

Shale is crucial to the U.S. economy, and it allows Washington to buttress our allies across the globe.

By Daniel Yergin, WSJ, Oct. 30, 2024

https://www.wsj.com/opinion/america-cant-do-without-fracking-shale-economy-allies-national-security-prices-1b311c75?mod=hp_opin_pos_4#cxrecs_s

TWTW Summary: The Chairman of S&P Global and long-time writer on energy begins with:

“This year’s presidential race features an oddity: a discussion about a ban on fracking. What’s striking is that such a conversation is happening at all. This talk takes participants through the Wayback Machine to the first two decades of this century, when hydraulic fracturing and horizontal drilling—together known as fracking—came to public attention. The U.S. was then the world’s largest importer of oil. Today it is energy-independent with, S&P Global estimates, more than 70% of its oil and more than 80% of its natural gas produced through fracking. The process has become essential to the nation’s energy supply and can’t be eliminated.

Not long ago the prospect of U.S. energy independence seemed fanciful. For more than four decades every president aspired to it, but their goal seemed unattainable. Many observers considered the U.S. destined to grow more dependent on imports. In recent years, however, America has achieved energy independence on a net basis. U.S. output is closing in on 13.5 million barrels of crude oil a day, exceeding that of perennial big producers Saudi Arabia and Russia by several million barrels per day. Add what are called natural-gas liquids, and the U.S. produces around 20 million barrels per day.

Textbooks used to hold that commercial production of shale was impossible. Innovation and investment over decades have proved otherwise. Yet despite this progress, many continue to underestimate how transformative shale oil has been for the U.S. economy and the American way of life.

Consider a concrete example. My firm estimates that battery-powered and plug-in hybrid electric vehicles will account for about 2% of the U.S. on-road light-vehicle fleet in 2024. If fracking were banned, the U.S. would need to import extraordinary amounts of oil to fuel our gasoline- and diesel-powered cars. In 2008, before shale-oil production began in earnest, the net bill for importing petroleum was \$388 billion—more than 40% of the total merchandise trade deficit. Today the same bill, by contrast, is virtually nothing.

There would be other costs to a phase-out of fracking. If the U.S. were to start importing again, the price of oil would doubtless rise, as we would be forced to compete for supplies with countries such as China, which is estimated to import more than 70% of its petroleum. The U.S. also exports a large amount of liquefied natural gas, mostly produced from shale. Without it, LNG’s positive effect on the trade balance would disappear too.”

The author points out how disastrous a ban of fracking would be for the US allies in Europe and concludes with:

“The same dynamic applies for U.S. allies in the Pacific. Japan and South Korea have come to rely on U.S. energy exports, which have proved essential for diversifying their supply and strengthening their security. Losing that contribution would make them more vulnerable, reduce their confidence in the reliability of the U.S., and likely push them toward importing from Russia.

A ban on fracking would be both misguided and destructive for the U.S. and its allies. Recurrent out-of-touch debates on the topic need to be tabled in light of a central fact: Shale has become crucial to the U.S. economy and global energy security. It’s here to stay.”

2. Climate Change Can Take Big Toll on Asian Economies, Inaction Could Cost More, ADB Report Says

It could reduce Asia-Pacific’s gross domestic product by 17% in 2070, ADB says.

By Fabiana Negrin Ochoa and Amanda Lee, WSJ, Oct 31, 2024

https://www.wsj.com/articles/climate-change-can-take-big-toll-on-asian-economies-inaction-could-cost-more-adb-report-says-f10cb97b?mod=hp_minor_pos17

Link to: Asia-Pacific **Climate Report 2024: Catalyzing Finance and Policy Solutions**

By Staff, Asian Development Bank, October 2024

<https://www.adb.org/publications/asia-pacific-climate-report-2024>

TWTW Summary: The article and report are largely trivial. The estimated GDP of China was \$114 billion in 1972 (50 years ago); it was \$17,889 billion in 2023. About 157 times that of 1972. Doubt a calculated reduction of future growth of 17% 50 years from now is very meaningful to the leaders of Asian countries.

https://en.wikipedia.org/wiki/Historical_GDP_of_China