Could AI Destroy the Planet, or Might AI Art and Gaming Save it?

by Kay Poh Gek Vasey

Image credit: Kay Poh Gek Vasey via '*Sky Farm Island*'

There are reasons to hope that AI can power data-driven insights that can help produce innovative solutions to the climate emergency. There are also real concerns about the climate cost of producing AI models in the first place and about issues such as environmental justice and power imbalances. MeshMinds Founder Kay Poh Gek Vasey asks will AI turn out to be a net negative or a net positive for the sustainability of life on the planet – and might AI art and gaming play a part in helping to save the world?

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AI taps into all of the world's online information to date, either legitimately obtained or acquired by the means of 'Grand Theft Data'.[1] It is powerful because it can make links between data points that humans may not have been aware of. Yet, because it is referencing only a particular dataset, it is very much 'inside

the box' thinking.[2] It fundamentally lacks human common sense, imagination and diversity.[2] And it certainly doesn't 'dream of electric sheep' because it doesn't dream at all.[3]

We cannot afford to be seduced by the allure of 'magic' promised by AI companies or rely on their assurances of future improvements. The stakes are too high, and the consequences too grave.

The dark side: AI as planet destroyer

AI systems only 'understand' something based on what they are programmed to understand. Consider asking an AI how to reduce carbon emissions. The AI suggests flooding the Sahara Desert to create a 'Sahara Ocean' as an extension of the planet's carbon sink. Sounds innovative enough, except, this solution ignores the massive environmental disruption and logistical nightmares it would create. The AI, in its pattern-seeking brilliance, could easily hallucinate this solution by combining unrelated data about the carbon absorbing properties of our oceans and vast 'unused' spaces.

In today's world, a single ChatGPT query consumes ten times more energy than a Google search.[4] AI's carbon footprint is increasing rapidly due to indirect emissions from data centre construction at a time when clean energy is still struggling to win its war against fossil fuels. Despite commitments from the largest tech companies to becoming carbon negative by 2030, the rapid expansion of cloud services around the world is making that seem simply unattainable. Are we to imagine, then, that in some cruel twist of fate, tasked with finding the best way to reduce carbon emissions, the AI could turn on itself one day and CTRL+ALT+DELETE?

'The problem is, large language models are so good at what they do that what they make up looks right most of the time. And that makes trusting them hard'.[5] We cannot afford to be seduced by the allure of 'magic' promised by AI companies or rely on their assurances of future improvements. The stakes are too high, and the consequences too grave. So let's bring in the regulators to stop this runaway train!

Unfortunately, the European Union's draft AI Act had to be rewritten when ChatGPT burst onto the scene in 2021 and even now finally ratified will only be enforced from 2026, a lifetime in the world of AI.

If we look back in history at GDPR, only now – after more than five years – have any significant fines been levied. 2023 witnessed the biggest single GDPR fine ever issued, surpassing €1.2 billion. Nevertheless, the 'violate and pay' approach of Big Tech calls into question whether the punishments of 'the toughest privacy law in the world' have been effective.[6]

The lack of a unified, global regulatory framework has created inconsistent oversight. When might we see the first fines levied at companies recklessly developing AI that harms the planet?

The light side: AI as world saviour

While the risks are significant, there are also opportunities for AI to uplift and inspire, especially in the realm of art. Let's talk about hope – through the lens of AI art. Take Refik Anadol, the new media artist who raised the question, 'what would you do if you owned your data?'[7] He has created the 'Large Nature Model' that turns petabytes of nature data into mind-bending art.

Anadol was inspired by Google's DeepDream AI and concluded that if a machine was able to learn, it could also remember – and therefore dream. Using over 100 million raw data images of glaciers, both downloaded from public sources and self-captured, Anadol created *'Glacier Dreams,'* a powerful 'AI data painting' that transformed environmental data into emotional, impactful art that inspires viewers to consider their impact on the planet and spark climate action on our Blue Planet. When you experience one of his pieces, you get a glimpse of the beauty and magic AI could bring to the world if we guide it and use it the right way.

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Artists are always the ones blazing the uncharted trail. Take Carla Chan's work, *'Traces of Space Beyond',* which invites viewers to contemplate the relationship between human activities, nature, and technology. By using AI to blend physical and digital elements, Chan's work aims to foster a deeper connection between the audience and the environment.

Digital art has also become a powerful tool for raising awareness about environmental and social issues, and AI has expanded the possibilities. Through these examples, we start to see how AI art can make complex information more accessible and foster a sense of empathy and co-creation.

Image credit: Kay Poh Gek Vasey via '*Sky Farm Island*'

By involving audiences as co-creators, these AI art projects not only visualise data but also allow people to feel represented in the artwork, creating a sense of connection that drives action. This is AI as a force for good—using its capabilities to inspire and motivate us to protect the world we share.

machine making misguided decisions that would cost the planet, at the other, it could be an amplifier of humanity's creativity and problem-solving power.

The train may be travelling at breakneck speed but let's imagine that it's going towards a vision in which AI, matched with the best in human creativity, helps us save the world, instead of turning it into a chaotic planet fuelled by misguided hallucinations. Because if it ever comes down to that, we're doing this whole AI thing very wrong.

***'The greatest threat to our planet is the belief that someone else will save it.'*[9] -Robert Swan OBE**

Going one step further, gamified experiences, more recently powered in part by AI-generated art and code, are also being developed to encourage behavioural change, particularly among younger audiences. Projects such as *'Carbon Island'* by Tencent Games, *'Sky Farm Island'* by MeshMinds, *'Longleaf Valley'* by TreesPlease Games and *'EverForest'* by Carbon Counts engage players in climate-conscious activities, promoting a deeper understanding of sustainability through interactive and immersive gameplay.

As Robert Swan OBE said, *'The greatest threat to our planet is the belief that someone else will save it.'*[8] If we can use AI art to rally and unify the troops, perhaps machines can dream of a brighter future. A future in which humans will remain part of the problem, merely by our existence, but also a fundamental part of the solution.

The way forward

AI's future depends on how we use it. At one end of the scale, it could become a relentless

Author bio

Kay Poh Gek Vasey is the Founder of creative technology studio, MeshMinds. Bringing together the best minds in the art, technology, real and virtual worlds to form partnerships and collaborations to protect our culture and the environment in the digital age, the MeshMinds Foundation community of impact artists, technologists, and sustainability advocates donates their skills and time to maximise action towards securing an inclusive, accessible and sustainable future for all generations.

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2. *'Glacier Dreams'*
3. *'AI Data Painting'*
4. *'Traces of Space Beyond'*
5. Gamified Experiences
6. *'Carbon Island'* by Tencent Games
7. *'Sky Farm Island'* by MeshMinds
8. *'Longleaf Valley'* by TreesPlease Games
9. *'EverForest'* by Carbon Counts