

Climate upheaval is upon Utah, and we can't dither, Robert Gehrke explains

"We're moving to a state where we're seeing global catastrophes everywhere all the time," Utah State University expert says.



Warm enough for ya?

If not, give it a bit, because according to the latest report from

the planet's best climate scientists, we are destined to see the Earth continue to warm.

If that seems like a frightening prospect — it should.

In Utah, [June was the hottest month on record](#). We are [in the midst of an intense drought](#) that has lasted more than two decades, [reservoirs are dropping and the Great Salt Lake is at its lowest level](#) since Brother Brigham rolled into town.

And now, we can brace for the average temperatures to rise another degree, [according to the latest report from the United Nations' Intergovernmental Panel on Climate Change](#).

"We're in a crisis," [Robert Davies, a physics professor at Utah State University who studies climate science](#), told me. "This is an absolute emergency in the very definition of the word. An emergency is a situation that requires an immediate response to avoid catastrophic outcomes, and this report is crystal clear on tha



(Francisco Kjolseth | The Salt Lake Tribune) Robert Gehrke.

t.”

The [call to action contained in the IPCC report is straightforward](#): It is “unequivocal” that humans are causing climate change, but they can also stop it. The solution is both simple and complex, but the report says it is imperative that humans slash greenhouse gas emissions to net zero, and the sooner we get started the better.

“From a mitigation standpoint, every little bit of additional warming that we get is our choice,” Davies said. “We can choose not to do that.”

In Utah and the western United States, [the IPCC report](#)

[predicts increasing heat waves](#) — the most deadly weather event on the planet.

Davies studied the temperatures in Tooele and found that in the entire 20th Century there were four days where the high temperature was over 103 degrees. In the first decade of this century, the temperature in Tooele passed that mark 28 times, and surely has surpassed it many more since.

Somewhat counterintuitively, the report simultaneously forecasts more precipitation and more drought, because more of the precipitation will come in rain versus snow and more moisture will evaporate because of the increased temperatures.

The diminished snowpack, Davies said, means the source of water for most Utahns is going away, [not to mention the harm done to Utah's multi-billion-dollar ski and tourism industries](#).

Higher temperatures and dryer conditions will [also mean wildfires will continue to grow in size and intensity](#).

Governments will also need to brace for multiple, simultaneous catastrophic emergencies at the same time, Davies said, like wildfires in California compounded by hurricanes in the South.

"What's happening and is projected to happen is, instead of going from local or regional catastrophes at different times,"

he said, "we're moving to a state where we're seeing global catastrophes everywhere all the time."

Those severe weather events have secondary, sociological and cultural impacts, Davies said. What happens when California becomes intolerable and thousands move to Montana and Utah? Now imagine millions all over the world migrating to find escape drought or famine or find someplace more hospitable. It causes immense social upheaval and political instability, he said.

Conflict over finite resources can intensify. In the West, that is especially true of water. Already tensions are rising over Colorado River allocations.

"I can picture in the coming decades," Davies said, "the Utah and Nevada national guards facing off over (Colorado River) water."

But, as I mentioned, the IPCC report was clear that humans caused the current climate crisis. We are also the only ones who can stop the devastation.

"The goal, unequivocally, is we've got to stop using fossil fuels as fast as possible. As fast as possible," Davies said. "That's not politics. That's physics."

We have the technology to do it, he said. We need rapid deployment on a massive scale — and the political will to

make it happen.

That second part is admittedly challenging, especially in a state like Utah where rural economies are still reliant — albeit less and less — on extractive industries like coal and oil. Mitigating the economic damage to these communities will be perhaps more challenging than the transition itself — but it is absolutely essential if we want to succeed.

Earlier this year, the Kem Gardner Policy Institute at the University of Utah [issued a Utah Roadmap for climate and clean air](#) that recommended things like more aggressive targets for reducing greenhouse gas emissions, transitioning to electric vehicles, investing in climate research and helping communities transition away from fossil fuel-based economies.

It's a good starting point, Davies said, and I agree. We can build from there. But for too long our state has been bogged down by climate deniers and skeptics. Now we need to get serious about solutions and become a leader in doing what we can to reverse the damage we've done.

And, as the IPCC report makes clear, the sooner we get to work on it, the better for everyone.