Global Warming And Your Health

ScienceDaily (Oct. 23, 2006) — Global warming could do more to hurt your health than simply threaten summertime heat stroke, says a public health physician. Although heat related illnesses and deaths will increase with the temperatures, climate change is expected to also attack human health with dirtier air and water, more flood-related accidents and injuries, threats to food supplies, hundreds of millions of environmental refugees, and stress on and possible collapse of many ecosystems that now purify our air and water.

"When most people think about climate change, they think of heat stress from heat waves," said Cindy Parker, M.D., of the Johns Hopkins Bloomberg School of Public Health in Baltimore. "The heat wave in Western Europe in 2003 killed in excess of 30,000 people who wouldn't have died otherwise. With climate change, heat waves will become more severe, and last for longer periods of time."

"Scientists (in the U.S.) haven't done a good job of communicating why climate change is important to regular people," said Parker, who was invited to give a presentation on the health hazards of global warming at the Annual Meeting of the Geological Society of America in Philadelphia. Parker will speak in a Pardee Keynote Symposium on Sunday, 22 October.

"The other thing that has gotten a lot of media attention is the increased risk of infectious diseases," said Parker. "This is of greater concern to other parts of the world than the United States." That's because the U.S. has good public health systems that can track down infectious diseases, such as malaria, and intervene so they don't spread, she said.

"In my professional opinion, some of the less direct impacts will be much more devastating for us," said Parker.

Hurricane Katrina was a primer on the matter. Global warming will bring bigger storms and hurricanes that will hold more water, according to climate scientists. Katrina showed how the water from a hurricane does far more damage than the high winds. All that flooding brings with it a host of direct and indirect health problems.

"As we saw from New Orleans, we're not good at evacuating people during storms." What's worse, she said, you can't evacuate critical infrastructure. "Our biggest medical centers have been built in our larger cities."

Thirteen of the 20 largest cities on earth are located at sea level on coasts, Parker points out. "As sea level rises, there go our medical institutions, water treatment plants, emergency response units such as fire departments and ambulances. The bulk of the services designed to keep us healthy are almost all located in our larger cities, which are also located frequently at sea level."
Then there is the matter of water. Clean water is one of the most basic and critical health needs. But climate change is threatening water supply quantities in many areas as well as water quality.

"Even without climate change, water is already in short supply," said Parker. "But under changed climate conditions, precipitation patterns are expected to change." That means droughts and famines could become more prominent.

Worsening water quality is expected to go hand-in-hand with the continuing deterioration of the natural ecosystems all around us.

"We rely on our ecosystems to provide very basic services to us," Parker explained. "Despite our technology, we can't live without clean water, clean air, and soil to produce food. We rely on healthy ecosystems to provide these basic and absolute necessities."

Forests, for example, absorb carbon dioxide from the environment, photosynthesize, and release oxygen as a waste product, which is essential for animal life. Similarly, with water, a healthy ecosystem such as a forest or wetland can filter a lot of toxins out of water and provide us with clean drinking water.

Water supplies and water quality are already major health problems worldwide. In most years, drought and famine cause more than half of all deaths from natural disasters. Already 1.8 million people, mostly children, die each year from diarrheal diseases caused by contaminated water. Climate change will just make this worse, Parker says.

Another absolute and basic need is, of course, food. That's also facing trouble, says Parker. Climate change will bring huge changes to how we grow food. Studies are mounting that show crops are likely to be more negatively affected by climate change than previously thought. "We need to steel ourselves from changes and, quite likely, reductions in food supplies from around the world."

All these changes, plus displacements of millions of people as was seen after Hurricane Katrina, pose health threats for everyone. But the most vulnerable members of our societies will be hardest hit, such as children, elders, city dwellers, and those who are socio-economically disadvantaged, says Parker. Planning for these threats and taking measures to minimize impacts is happening much too slowly, she said.

"These measures don't necessarily require a lot of money and we already have the new technology," she said. "I'm a preventive medicine physician, and I use that training and way of thinking with respect to climate change as well. It makes a whole lot more sense to me to prevent our climate from more instability rather than waiting and putting our research and resources into trying to fix problems after they've happened."

Recommend this story on Facebook, Twitter, and Google +1:

Like 18  Tweet 0 0

Other bookmarking and sharing tools:
  | More
Story Source:

The above story is reprinted from materials provided by Geological Society of America.

Note: Materials may be edited for content and length. For further information, please contact the source cited above.

Need to cite this story in your essay, paper, or report? Use one of the following formats:

- APA
- MLA


Note: If no author is given, the source is cited instead.

Disclaimer: This article is not intended to provide medical advice, diagnosis or treatment. Views expressed here do not necessarily reflect those of ScienceDaily or its staff.