Extreme weather

The summer of 2022 has seen record-breaking heatwaves in countries as widespread as India, the UK, Brazil and Australia. The high temperatures have resulted in many serious problems. Wildfires have destroyed vast areas of vegetation across Europe and sometimes houses or entire towns. Although humans sometimes are the cause of these fires, climate plays a large part in the extent of their damage.

First, scorching temperatures draw moisture from the ground, resulting in tinder-dry conditions. Then, lightning from storms, which also increase in hot weather, may supply the spark that sets the vegetation alight.

Meanwhile, in China, the heatwave resulted in power cuts. This event is due to the lakes that supply the hydroelectric power stations drying up. The drought has affected crop production everywhere, which is forecast to be up to fifty per cent lower for some crops in Europe. This will result in food shortages and higher prices.

The drought has affected crop production everywhere, which is forecast to be up to fifty per cent lower for some crops in Europe. This will result in food shortages and higher prices. This is because more moisture evaporates into the atmosphere, resulting in more and heavier drops that fall in a shorter space of time. In Asia, the monsoon rains have become more unpredictable. Dry periods have occurred at critical planting times, while sudden downpours have destroyed homes and drowned out entire crops. Cyclones are also more common.

Human-induced climate change is now accepted as the reason behind these extreme weather events. Emissions caused by the burning of fossil fuels have been trapping heat in the atmosphere since the start of the industrial era. Climate experts say that extreme temperatures are now ten times more likely a result of climate change, and future temperatures may well be higher. How much so depends hugely on our ability to reduce carbon emissions in the next few years. Whether or not we meet the emissions targets set by the Paris Agreement in 2015 will affect billions of people across the globe.

The best-case scenario is that countries manage to keep global temperatures to less than 2ºC above preindustrial levels. However, even in this case, the heat index is forecast to reach dangerous levels ten times more often. When this happens, the effects of heat on the body make it increasingly difficult for humans to maintain a safe body temperature. The conditions will be unprecedented for people working outdoors in countries where it is already as hot as this, such as Sub-Saharan African farmers.

Poorer countries like Bangladesh, Pakistan and Afghanistan, experiencing increasingly extreme weather events, are looking to richer countries for more finance. **These countries claim they are bearing the brunt of climate change caused by richer nations.** With limited means themselves, they are forced to choose between rebuilding or developing ways to cope with future climate crises. Richer countries have promised funding, but developing countries still need to receive it or receive it in the form of loans they cannot repay.