

Hotter temperatures As greenhouse gas concentrations rise, so does the global surface temperature. Floods may sweep away urban slums, destroying homes and livelihoods. Global warming exacerbates water shortages in already water-stressed regions and is leading to an increased risk of agricultural droughts affecting crops, and ecological droughts increasing the vulnerability of ecosystems. Climate impacts are already harming health, through air pollution, disease, extreme weather events, forced displacement, pressures on mental health, and increased hunger and poor nutrition in places where people cannot grow or find sufficient food. Changing weather patterns are expanding diseases, and extreme weather events increase deaths and make it difficult for health care systems to keep up. Poverty and displacement Climate change increases the factors that put and keep people in poverty. As temperatures rise, more moisture evaporates, which exacerbates extreme rainfall and flooding, causing more destructive storms. Heat stress can diminish water and grasslands for grazing, causing declining crop yields and affecting livestock. But more carbon dioxide makes the ocean more acidic, which endangers marine life and coral reefs. Such storms often destroy homes and communities, causing deaths and huge economic losses. Increased drought Climate change is changing water availability, making it scarcer in more regions. Droughts can also stir destructive sand and dust storms that can move billions of tons of sand across continents. The frequency and extent of tropical storms is also affected by the warming ocean. As the ocean warms, its volume increases since water expands as it gets warmer. Forest fires, extreme weather, and invasive pests and diseases are among many threats related to climate change. Not enough food Changes in the climate and increases in extreme weather events are among the reasons behind a global rise in hunger and poor nutrition. Most refugees come from countries that are most vulnerable and least ready to adapt to the impacts of climate change. Temperatures in the Arctic have warmed at least twice as fast as the global average. Cyclones, hurricanes, and typhoons feed on warm waters at the ocean surface.