

CREATION CARE GREEN TIPS - AUGUST

1. For the past 10 years, scientists funded by the US Agency for International Development's Predict program (USAID/PREDICT) have pinpointed and warned about the **more than 900 viruses most likely to cross over from animals' bodies into humans**. Since 1940, hundreds of microbial pathogens, such as **HIV, Ebola, Zika, MERS, West Nile, and a number of novel coronaviruses (such as COVID-19)** have emerged either for the first time or in new territory, with **60% of them originating in animal hosts**. More than **two-thirds spread from wildlife, where the pathogens live harmlessly, while some come from pets and livestock**. HABITAT DESTRUCTION from **cutting down forests to expand towns, cities and industrial activities** not only threatens vast numbers of wildlife with extinction, it also forces wild species into closer, intimate contact with humans, **allowing benign microbes to be transformed into deadly pathogens**. The U.S. government ended the PREDICT program last October, but we can URGE OUR POLICY-MAKERS to work to not only reinstate it, but also to **protect wildlife habitats that keep animal microbes from jumping between species**.

2. COVID-19 is just one of a number of diseases (**zoonotic diseases**) that are caused by viruses that have jumped from animal hosts to the human population in recent decades. According to the United Nations Environment Department (UNEP) and International Livestock Research Institute (ILRI), such diseases are "highly predictable" given the **human activities that drive pandemics: deforestation for agriculture and development that results in mosquito-borne disease; the expansion of suburbs into northeastern US forests that increases tick-borne diseases by driving out predators and increasing deer and white-footed mice; raising tens of millions of farm animals in "factory farms" that provide opportunities for microbes to turn deadly; catastrophic loss in biodiversity, reckless destruction of wildlands for economic development, and warming temperatures**. Every year **2 million people die** from neglected zoonotic diseases, and in the past two decades alone, zoonotic diseases have caused **economic losses of more than \$100 billion, not including the cost of the COVID-19 pandemic, which is expected to cost \$9 trillion over the next few years**. SUPPORT EFFORTS to integrate **human health, animal health, and environmental policy that protects ecosystems**.

3. A recent study monitoring dust deposits in nearly a dozen protected areas (for example, Joshua Tree National Park, Rocky Mountain National Park and the Grand Canyon) found that **more than 1,000 tons of miniscule plastic particles each year are landing on these protected areas, equal to 123 million to 300 million pulverized plastic water bottles**. Known as **microplastics**, these particles are made from **artificial-clothing fibers, broken-down consumer products, beads used in medical and industry applications and other sources**. In a world that generates **hundreds of millions of tons of plastic every year**, microplastics can be as small as one-tenth the width of a human hair, **and if ingested, become lodged in human lungs**. We've known for decades that plastics litter the oceans, but only recently have scientists realized they are in the dust particles picked up by the wind, according to research at Scotland's University of Strathclyde. YOU CAN BE AN ADVOCATE for sensible legislation banning or regulating the use of **single-use plastic, especially plastic bags**.

4. Unlike traditional iron mines, **sulfide ore (copper nickel) mining operations release toxic**

heavy metals like mercury, which causes acid runoff. The PolyMet mine near the Boundary Waters, in the St. Louis River watershed, runs through the Fond du Lac Reservation, providing drinking water for the people of Duluth, and is the furthest along in permitting. The Minnesota Pollution Control Agency (MPCA) has issued **four permits to PolyMet, all of which were struck down by Minnesota courts, the last one as recently as March, 2020.** Realizing that no sulfide ore mine has ever operated without polluting nearby lakes, streams, and groundwater, **Minnesotans overwhelmingly oppose mining near the Boundary Waters, according to a MPR/Star Tribune poll.** While iron ore mining provided 16,000 jobs at its peak in 1979, sulfide ore mining is promising **1,100 jobs for the 20 years of production,** with fluctuations in copper prices creating periodic layoffs. Meanwhile, **healthcare businesses and outdoor recreation provide thousands of jobs on the Range that are sustainable for many lifetimes.** CONTACT YOUR STATE POLICY MAKERS, demanding that they **protect the Boundary Waters, Lake Superior, northern Minnesota communities' water supplies, treaty rights, and create sustainable, good-paying jobs.**

5. Scientists have long stated that the Arctic is **warming twice as fast as the rest of the world, but recent data from NASA shows that the region is now warming at nearly three times the global average.** According to researchers at the University of Alaska, Fairbanks, temperatures occurring in the High Arctic during the past 15 years were not predicted to occur for another 70 years. During May, parts of Siberia saw an average monthly temperature that was **18 degrees F above average for the month,** according to the European Union's Copernicus Climate Change Service. Persistent warmth in the Arctic has helped to **fuel wildfires and pest outbreaks, eviscerate sea ice, and destabilize homes and buildings due to permafrost thawing.** Thawing permafrost also led to a **massive oil pipeline spill and has the potential to release huge amounts of greenhouse gases trapped under the frozen ground.** Scientists from around the world are in agreement that **man-made global warming from fossil fuels is driving many extreme weather events and climate change.** Now it is up to us to pay attention and insist that our leaders move to implement clean, renewable energy.