

## Editorial

**International Cooperation: A Global Imperative for Dealing with Ecological Risks***Sreenath Dixit**International Crops Research Institute for the Semi-Arid Tropics Patancheru, Telangana 502324, India; email*

Today's world is more interconnected and interdependent than it was ever. Ecological risks affect rich and poor countries alike and without any regard to the national boundaries. Boundaries are manmade and make no sense to the consequences of use, abuse, and overuse of the planet's resources. Life on Earth is facing a constant threat due to degenerating ecosystems, heightened pollution, loss of biodiversity, and climate change. These challenges can only be addressed holistically and hence the call for collective action from all nations through international cooperation. This editorial underlines the urgency and importance of global collaboration for collective action to mitigate ecological risks and highlights the potential benefits it holds for both present and future generations.

The planet Earth is not merely an entity of regions and nations, but an organism with innumerable interconnections functioning intelligently. Although this reality is captured very well in the ancient Sanskrit saying "*Vasudhaiva kutumbakam*" (वसुधा इव कुटुम्बकम् in Devanagari script) quoted in *Maha Upanishad*, VI. 72, an ancient Indian text, meaning *the entire Earth is like ONE extended family*, it is experienced more vividly in modern times. What more evidence does one need to establish the interconnectedness than climate change, the effects of which are being experienced first-hand irrespective of where one lives on the globe?

The ozone hole caused by the deterioration of the ozone layer is evidence of how people and ecosystems are vulnerable to harmful ultraviolet radiation across the globe. Extreme weather events, rising sea levels, and disruptions in agricultural productivity, the purported effects of climate change, have affected countries notwithstanding their national borders. These have had a cascading effect on the livelihoods and well-being of people worldwide. The loss of biodiversity and the destruction of fragile ecosystems have impacted local communities and disrupted the global ecological balance and brought in economic peril.

Preventing ecological disasters and reversing their effects would be a mammoth task necessitating the commitment of enormous financial and technical resources. Even if all anthropogenic activities leading to emissions were to cease today, it would not readily take the Earth's temperature back to the pre-industrial era. It will take a few decades to restore normalcy as the ocean currents bring excess heat conserved in the depths of the oceans to their surface. The temperature on Earth's surface would stabilize only after the stored-up heat is dissipated out into space. This poses several challenges to the current quality of human life. According to an estimate arrived at by the Wall Street Journal, it would cost \$131 trillion for reducing global warming. Even if the entire world economy pledges its wealth for this cause, there will still be a shortage of \$27 trillion (the world GDP was estimated at \$104 trillion in 2022 by the IMF).

Collective efforts and cooperation are quintessential for alleviating global environmental risks. This calls for sharing the responsibility of cleaning up by all nations. A collaborative approach is necessary for resource-pooling, knowledge-sharing, and expertise exchange for effectively mitigating the causes and adapting to the perils in the interim, as no single nation can tackle these challenges in isolation.

Ecological risks, such as air and water pollution, forest fires, droughts, floods, rise in ocean levels, cyclones and hurricanes, locust attacks, and invasive species are transboundary in nature. Environmental degradation in one country can have far-reaching consequences on neighboring nations and beyond. A recent wildfire in Canada

affected the respiratory health of millions in the US cities of New York and New Jersey. The economic costs of such risks are far greater and complex even to estimate as they affect human productivity, loss of work, and hospitalization besides pushing the costs of health insurance. Cooperation and coordinated efforts are critical for the exchange of timely information and for implementing best practices for abating the ill effects of disasters across borders.

Some of the best examples of international cooperation for environmental protection include the Montreal Protocol to phase out ozone-depleting substances and Paris Agreement on climate change. The former helped phase out ozone-depleting substances resulting in the successful recovery of the ozone layer through a collaborative approach, scientific research, and technology transfer to demonstrate the potential of multilateral efforts. The latter strived to achieve consensus for a global commitment to limit global warming and promote sustainable development by encouraging nations to set long-term goals of reducing greenhouse gas emissions and supporting vulnerable countries in adapting to the impacts of climate change. The agreement has catalyzed international cooperation by encouraging nations to upgrade their climate goals and share knowledge on mitigation and adaptation strategies.

A beginning has just been made and we have a long distance to traverse. Countries need to support the Multilateral Environmental Agreements (MEAs) and develop new ones where necessary. MEAs offer a reasonable framework for collective action, facilitate information exchange, and encourage bringing into practice the agreed-upon measures. However, MEA compliance needs to be reviewed periodically to ensure its effective implementation.

Developing countries have always been at the receiving end of ecological risks and are often fraught with resource constraints and technological challenges in complying with MEAs. Proactive measures on the part of developed countries to exchange knowledge and build the capacity of developing nations would help them in adopting sustainable practices and technologies. In this way, developed countries can help themselves by investing in developing countries. Besides, there is also a need for the affected nations to flag environmental concerns and mainstream them into bilateral and multilateral platforms.

Reducing ecological risks is a complex proposition requiring collective action. It calls for a unified approach with a cooperative spirit at the global level. It needs a platform for nations to come together and work collectively toward a sustainable and resilient future. Nations need to recognize the shared responsibility and inherent interconnectedness of ecological challenges. This should pave the way for nations to build robust alliances, innovate equitable solutions, and protect the planet for now and posterity. This is the time for nations to cooperate and reduce ecological risks for building a sustainable and prosperous future together.

## References

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