

Editorial

Environmental Guardian: A New Voice for a Clean, Green and Sustainable Future

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1. Introduction

With the emergence of the second quarter of the 21st century, extraordinary scientific advancements and technological innovations are witnessed by the humanity, but still unprecedented ecological crisis is worrying the environmentalists. The accelerating pace of climate change, biodiversity loss, pollution, and resource depletion is threatening the very foundation of life on Earth. It is against this backdrop that we proudly launch *Environmental Guardian*, a journal dedicated to championing rigorous scientific inquiry, laboratory research, innovative thinking, and transformative action for the protection of our shared environment.

My first editorial outlines the vision, mission, and purpose of *Environmental Guardian*. Our goal is to create a platform that not only tracks the current state of the environment but also motivates collective responsibility, thoughtful dialogue, and practical pathways to environment friendly and sustainable outcomes.

At its core, *Environmental Guardian* believes that protecting the environment is inseparable from ensuring human health and global peace. We imagine a future where environmental care is central to policy, education, innovation, and culture. The journal's mission is threefold:

1. **Scholarly Contribution:** To publish peer-reviewed studies, research articles, reviews, short communications, policy insights, letter to the Editor and commentaries that tackle urgent environmental challenges from a wide range of disciplines.
2. **Dialogue and Collaboration:** To provide a space for meaningful exchange between researchers, academician, policymakers, industry professionals, and civil society of environmental sciences and multidisciplinary areas.
3. **Catalyst for Action:** To go beyond identifying issues, highlighting innovative solutions and encouraging approaches that support environmental recovery and resilience.

The title "Guardian" reflects a shared ethical obligation to safeguard the Earth's air, water, biodiversity, and ecosystems for both current and future generations. The journal will prioritize clear, purpose-driven communication to engage not only academics but also decision-makers and the general public.

Environmental Guardian will offer a unique, integrative perspective that will position environmental protection as a moral duty. While other journals focus narrowly on specific topics, our approach and commitment would be to unify diverse areas like, combining insights from environmental and natural sciences, technology, social sciences and traditional knowledge systems. Ultimately, this journal aims to be more than a collection of articles and it will inspire the readers for the moral commitment towards the mother nature.

1.1. Background of the Environmental Field

In last almost 50 years the thoughts on the environmental issues have dramatically changed. In the year 1962 Rachel Carson published 'Silent Spring', followed by Santa Barbara Oil Spill in the year 1969, the first Earth-day on 22 April 1970 and then recognition of environmental programs in United Nations, are those events, which sparked worldwide environmental consciousness and triggered a global movement toward ecological awareness and reforms. Thus, in 1987–Montreal Protocol, 1992–Rio Summit and 1997–Kyoto Protocol, are some of those historical intercontinental events, which mobilized the public awareness and changed the vision of international researchers, which ultimately developed environmental legislation and policies. Many such results, particularly on



the legal bindings and international treaty on climate change, were witnessed in the Paris Agreement held in the year 2015.

Alongside these milestones, environmental science has rapidly evolved. Tools like satellite sensing, genomics, and systems modelling have expanded our planetary understanding. At the same time, grassroots activists and indigenous communities have shown that true ecological insight includes ethics, culture, and traditions—not just the scientific data.

Environmental Guardian places itself in this evolving context, honouring past progress, evaluating current practices, and preparing for future environmental challenges.

1.2. Recent Developments and Emerging Trends

In recent years, the field of environmental science has seen major shifts. Noteworthy trends include:

- **Climate Change and Resilience:** Climate science has taken centre stage as extreme weather and worldwide rising temperatures increase. Resilience strategies, focused on adaptation, mitigation, and risk, are now shaping policies and research.
- **Circular Economy and Sustainable Technology:** There's growing interest in replacing the outdated linear economic model with circular systems. Research in recycling, sustainable design, and green chemistry is expanding rapidly.
- **Biodiversity and Ecosystem Services:** The biodiversity crisis is now linked to broader concerns like food security and public health. Studies increasingly emphasize the economic and cultural importance of ecosystem services.
- **Pollution and Human Health:** Issues such as microplastics, air toxins, and hazardous chemicals are gaining urgency due to their health impacts on the humans and living-beings. There's a growing focus on the link between environmental harm and social justice.
- **Digital Innovation and Data Science:** Technologies like Artificial Intelligence, big data, and geospatial tools are revolutionizing how we monitor ecosystems and forecast environmental changes.

Our *Environmental Guardian* will prioritize these cutting-edge topics while remaining open to unconventional ideas that push beyond traditional thinking.

2. Aims and Scope of the Journal

Though broad aims and scope of *Environmental Guardian* are already available on our website, the summary of the wide array of topics, including:

- Climate science, adaptation, and mitigation
- Environmental governance, policy, and ethics
- Renewable energy, green technology, and sustainable engineering
- Biodiversity, ecosystem services, and ecological restoration
- Pollution, waste management, and environmental health
- Safeguarding air, water and soil
- Assessment of environmental impacts
- Intersections of environment with culture, society, and economics
- Knowledge and traditional ecological practices
- Future-focused themes like planetary and space-environment interactions

The journal will feature a range of formats: original laboratory and field research, pilot studies, critical reviews, brief reports, case studies, policy briefs, and editorials. We may also try to dedicate space for early-career researchers to support the next generation of environmental leaders.

3. Outlook for Environmental Guardian

Looking ahead, we aim for *Environmental Guardian* to become more than a publication, it should evolve into a global community of experts and advocates who place environmental protection and clean and green environment of the Earth at the centre of sustainable progress.

In the future, we hope to encourage cross-sector collaboration by strengthening connections between academia, industry, governments, and civil society so that research brings real-world solutions. Our focus will also be to elevate voices from environmentally most affected regions and societies, which are often excluded from global discourse. Together, we will commit ourselves to support transformative research and will go beyond

documenting problems to publish visionary research work that will reshape relationship of the humanity with the mother nature.

The future of *Environmental Guardian* rests in its ability to drive meaningful changes, where academic insights spark action, and action, in turn, inspires new discoveries.

4. Conclusions

The inception of *Environmental Guardian* is both a celebration and a solemn responsibility. It celebrates growing awareness of the environment's role in global well-being, clean and green environment and sustainable development. At the same time, it reminds us of our duty, as researchers and citizens to safeguard our fragile ecosystems.

We extend an open call to scholars, practitioners, policymakers, and concerned individuals across the globe to join us. Together, let's work toward a world where future generations inherit a resilient, thriving, and beautiful planet.

Conflicts of Interest

The author declares no conflict of interest.

Use of AI and AI-Assisted Technologies

No AI tools were utilized for this paper.