

# *Ecosphere*

## Subject Tracks and Submission Types

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## Summary of Elements by Manuscript Type

Submission Type	Abstract needed?	Abstract length (words)	Key words required?	Additional requirements
Article	Yes	350	Yes	N/A
Comment	No	N/A	No	N/A
Concepts & Theory	Yes	350	Yes	N/A
Innovative Viewpoints	Yes	350	Yes	N/A
Introduction	No	N/A	No	By invitation only
Synthesis & Integration	Yes	350	Yes	N/A
Reply	No	N/A	No	By invitation only

## Subject Tracks

In addition to general animal and plant ecology papers, those from all subdisciplines of ecological science, and interdisciplinary studies relating to ecology, *Ecosphere* welcomes papers within distinctive subject tracks (Freshwater Ecology, Agroecosystems, Disease Ecology, and many others).

Submitting your paper to a subject track allows the journal's editorial staff to quickly assign it to a Subject-matter Editor and, should the paper be accepted, publicize it along with other topically related papers.

### Agroecosystems

*Interdisciplinary research into the interface between agriculture and ecology.*

Of particular interest are intersections of the four pillars of agriculture (production, transportation, nutrition, security) with ecological systems. Agroecosystems include

managed forests, plantations and orchards, pastures, rangelands, and croplands, and the organisms living in them (cultivated and otherwise).

## Coastal and Marine Ecology

*Research about ecological patterns and processes in coastal and marine ecosystems.*

The CME track publishes ecological science that contributes to ecological theory, bodies of empirical knowledge, or methodology. Applied ecology examining the impacts of human activities in marine ecosystems and focused on marine environmental problem solving in an ecological context is also strongly encouraged. Major advances in ecology will continue to emerge from interdisciplinary marine research that combines biological with physical science, natural with social science, surveys with experiments, and theory with empirical observations. Papers published in this track are quantitative and address questions of broad ecological relevance.

## Disease Ecology

*Research exploring the epidemiology, evolution, and ecology of host-pathogen and host-parasite interactions and disease.*

Outbreaks of infectious diseases are frequently caused by changes to the ecology of the host, the pathogen, or the environment. Therefore, understanding the incidence, prevalence, or timing of disease requires understanding ecological systems that support transmission and infection broadly across plants, non-human animals, and humans in both natural and built environments.

## Eco-Education

*Research related to teaching and learning about ecological concepts and practices.*

An understanding of ecology is crucial both for informed citizenship and the training of scientists. Thus, research into how people learn and apply ecological concepts is critical. Research can occur in both formal and informal education settings and can span age groups from elementary students to adult learners.

## Ecology of Critical Zones

*Research that investigates the role of ecological processes in shaping the structure and function of the critical zone.*

The critical zone is the Earth's heterogeneous thin outer veneer extending from the top of the canopy to the base of weathered bedrock and sustains life through its provision of critical zone services such as climate regulation and water purification. This subject track encourages research that is interdisciplinary, especially incorporating geological perspectives and time scales into their studies. Possible topics include the role of plants in plumbing the critical zone, microbes in mediating weathering and other biogeochemical processes, and longer-term geological processes in shaping the community and/or ecosystem structure and function.

## Ecosphere Naturalist

*Papers intended to attract a wide audience by showcasing the natural history of particular organisms (their morphology and behavior, their life histories, their habitats, and their roles in food webs and ecosystems).*

Submissions about animals, plants, fungi, or microorganisms are all welcome. Submissions should include at least one striking, high-quality photo documenting some interesting or previously unknown aspect of an organism's life cycle or ecology.

## Emerging Technologies

*Research that uses a wide array of approaches and technologies to gather data, address ecological questions, or test hypotheses.*

"Technologies" include applications of machine learning, robotics and devices, integrated software solutions, and new developments or refinements in traditional technologies, statistical methods, simulation models, and image analysis.

## Freshwater Ecology

*Contributions that investigate the ecology of freshwater ecosystems, including lakes, streams and rivers, wetlands, springs, bogs, and ponds.*

We are interested in a wide variety of papers—basic to applied, genes to biomes, microbes to mammals—that are conducted in freshwater and rooted in ecological principles and theory. Interdisciplinary freshwater research is also encouraged.

## Methods, Tools, and Technologies

*Research in statistical theory, comparative analyses, and methodology applied to ecological problems.*

Papers that compare different types of methods, such as manual approaches with sensor datasets, are especially encouraged. Papers submitted to this new track will have less detail on the ecology of the system compared with traditional ecological papers and more detail on the methods and approaches being used or compared.

## Macrosystems Ecology

*Research into ecological dynamics across multiple interacting spatial and temporal scales.*

Macrosystems studies develop general theory, understanding, and predictions either in space or time, beyond local processes and conditions (an individual scale) or to place local conditions at one scale within a broader spatial or temporal context. This research uses a variety of methods and approaches, including comparative analyses, meta-analyses, reviews, spatial analyses, multi-model and other temporal analyses, machine learning, and numerical modelling.

## Socio-Ecological Systems

*Research about integrated socio-ecological systems and the complex interactions between the ecological and human ("socio"- economic, social, political, institutional and behavioral) aspects of the system.*

The Socio-Ecological Systems track publishes interdisciplinary work coming from the ecological sciences that considers natural and social processes to be aspects of an integrated system. The track is also a venue for environmental social scientists who wish to share their research with the natural science community. Papers that push conceptual boundaries and build new analytical and theoretical frameworks are particularly encouraged.

## Vegetation Ecology

*Interdisciplinary research on patterns and processes of terrestrial plant communities and their interactions with the environment, including impacts and legacies from disturbances, either abiotic (such as wildfires) or biotic (such as insect outbreaks).*

Studies at all spatial and temporal scales are welcome, particularly those that combine empirical information with theoretical models. Of particular interest are papers that span observational data, field manipulations, and laboratory analyses, with the aim to provide an outlet where debate on fundamental assumptions is encouraged as long as it relies on evidence-based worldviews.

## Submission Types

### Article

Articles typically follow the format of a traditional research paper (Abstract, Introduction, Methods, Results, Discussion, Conclusions). Although there are no page limits, concise writing is expected.

### Comment

A Comment points out errors of fact or interpretation in a paper that was previously published in *Ecosphere*. Although there are no page limits, concise writing is expected.

See our [guidelines for Comments \(PDF\)](#) for more information.

### Reply

A Reply is submitted after invitation from the journal's editorial staff in response to a Comment by the author of the manuscript that was commented upon. In order to submit a Reply, this author must have previously submitted a signed review of the Comment. Although there are no page limits, concise writing is expected.

See our [guidelines for Replies \(PDF\)](#) for more information.

### Concepts and Theory

These papers conceptually advance the field of ecology. They should go well beyond the works being reviewed to include discussion of new theories and conceptual frameworks that lead to new research directions and resolutions of old questions. These papers may be primarily conceptual, supported by published data, and without the presentation of new data.

### Innovative Viewpoints

Innovative Viewpoints are thought-provoking papers that advocate important future directions, new ideas, or emerging frameworks. Viewpoints can also revisit historic ideas with a modern twist. Novel, cutting-edge linkages between ecology and other disciplines that have the potential to transform science or impact policy are encouraged.

### Additional requirements

Papers submitted as Innovative Viewpoints should be defended with citations or data sufficient to warrant publication. Authors interested in submitting Innovative Viewpoints should first e-mail a one-paragraph proposal (<300 words) to the Editor-in-Chief and the journal's editorial staff. All submissions will be peer-reviewed and subject to the standard publication fee.

### Synthesis and Integration

These papers are intended to provide a synthesis of a field/subfield AND an integration of those findings. These papers can begin by reviewing a topic, but they must go beyond the review to provide a new synthesis and blending of those ideas and data in new ways.



## Special Features

Special Features are groups of papers intended to address various aspects of a theme that is likely to be of broad interest to ecologists. Ideally, the group of papers should teach a large audience about an unfamiliar topic or an area in which there has been considerable recent progress, or it should cause the audience to reexamine an issue that has not been settled as most have presumed. Proposals for Special Features should be addressed to the [Editor-in-Chief](#).

There is essentially no limit to the topics for Special Features, so long as they fit within the broader scope and subject matter guidelines for Ecosphere. The key guideline is that the papers address aspects of a topic or theme and that this topic or theme is likely to be of broad interest to ecologists.

Special Feature submissions must be approved prior to manuscript submission. In ScholarOne, the appropriate Special Feature should be selected in the designated field.

For more information, see our complete [overview of Special Features \(PDF\)](#).