

MAKE THE MOST OF YOUR SOCIETY JOURNAL

Matthew J. Simpson¹, Reinhard C. Laubenbacher², and Ruth E. Baker³

¹School of Mathematical Sciences, Queensland University of Technology,
Brisbane, Australia.

²Department of Medicine, University of Florida, Gainesville, Florida, USA.

³Wolfson Centre for Mathematical Biology, Mathematical Institute,
University of Oxford, Oxford, OX2 6GG, United Kingdom.

The *Bulletin of Mathematical Biology* (BMB) publishes original research and related information at the biology-mathematics interface. While most articles published by the BMB are original research articles, we also welcome review articles and contributions on mathematical biology education, as well as different types of commentaries that include contributions describing open problems in mathematical biology and perspective articles. Articles published in the BMB typically focus on computational, theoretical, or experimental biology, and we welcome contributions across a spectrum of types of novelty and impact. The novelty and impact of some articles is associated with the application of established and well-understood mathematical tools to provide new insights into a biological problem. Alternatively, the novelty and impact of other articles is associated with the development of new mathematical and theoretical foundations that are well-motivated by the need to solve biological problems. A key feature of the BMB is that it is the official journal of the Society for Mathematical Biology (SMB). The main aim of this Editorial is to highlight the dual benefits of choosing to publish in the BMB and being a member of the SMB. We write this Editorial in our capacities as the current Editor-in-Chief of BMB (Simpson); in-coming President of the SMB and former Editor-in-Chief of BMB (Laubenbacher), and out-going Chair of the SMB Publications Committee (Baker).

Scientific societies have long been a central feature of scientific research, beginning with the famous Académie des Sciences in France and the Royal Society in England, both established in the seventeenth century. They quickly became clearing-houses of scientific work, both as

a meeting place for scientists to exchange ideas and results and as a publishing venue for research. This remains the paradigm followed by most scientific societies today, including the SMB, with its annual meetings and its publications, principally the BMB. Both the SMB and the BMB have a long history going back to 1973, when the SMB was founded by George Karreman, Herbert Landhal, and Anthony Bartholomay. Karreman served as its first President, followed by Landhal, after whom one of the SMB prizes is named. The history of the SMB is described in detail at <https://smb.org/History-of-the-Society>.

In this editorial we would like to address two important points:

1. *What are the advantages of publishing in a society journal?*

At the time of writing, the SMB has almost 1000 members, meaning that articles published in the BMB have a ready-made audience who regularly pay attention to the web-pages of both the BMB and SMB. Recent coordination between the SMB Publication Committee and the BMB mean that the corresponding authors of all accepted articles are invited to provide a 200-word summary of their work and an attractive infographic that are promoted on the recently-updated SMB website [<https://www.smb.org/>]. Along with the online promotion of articles on the SMB website, the SMB Publications Committee have the capacity to promote articles in several ways, including on various social media platforms, the SMB YouTube Channel, and the Biology in Numbers Podcast (see <https://www.smb.org/Communications>). In addition, the SMB Publications Committee regularly showcases the monthly “top ten most downloaded articles” of the BMB.

As mentioned above, one of the key activities of the SMB is to recognise excellence in mathematical biology through several SMB awards. The Lee A Segel prize has been awarded every second year since 2009 (full details at <https://www.smb.org/Lee-A.Segel-Prize>). The prize was established in memory of Lee Segel, who made hugely important contributions to the BMB, and to the field of mathematical biology as a whole. The prizes recognize outstanding contributions to mathematical biology and help promote important research findings to the broader mathematical biology community. Recipients are typically invited to make a presentation about their award-winning work at the following annual SMB meeting.

It is with great pleasure that we use this Editorial to announce the winners of the 2025 Lee Segel Prize:

The best publication prize is awarded to Veronica Ciocanel and co-authors Ding, Mastro-matteo, Reichheld, Cabral, Mowry and Sandstede, for their 2024 article “Parameter identifiability in PDE models of fluorescence recovery after photobleaching” [1].

Best student publication prize is awarded to Matthew Penn and co-author Donnelly, for their 2023 article “Asymptotic analysis of optimal vaccination policies” [2].

Congratulations to Veronica, Matthew and their research teams! Selecting winners of the Lee Segel prizes is incredibly challenging, with the decision being guided both by referee reports and the assistance of members of the BMB Editorial Board, which brings us to mention another advantage of publishing in a society journal. Engaging with the SMB, either through the annual meeting or various subgroup activities, allows members to identify a large pool of experts who can be nominated as potential referees when submitting articles to the BMB. The corresponding author of each submission is also asked identify potential handling editors who oversee referee selection and assist in decision-making once referee reports have been submitted. Being engaged in SMB activities gives all authors a chance to meet and interact with potential editors and referees, which is a clear advantage for SMB members who submit their work to the BMB. Engaging with the SMB and publishing in the BMB supports both organisations as clearinghouses of first-rate research in mathematical biology.

Like most scientific societies, a significant portion of the income the SMB has available to support its membership through fellowships, prizes, scientific programs and services is derived from its partnership with Springer-Nature, publisher of the BMB. Combining the scientific expertise of the SMB with the resources of a major scientific publisher has helped position the BMB as one of the leading journals in mathematical biology. Publishing in the BMB strengthens this position and helps keep the SMB on a sound financial foundation.

2. How can you make the most from publishing within a society journal?

After submitting your article to the BMB, one of the first steps in assessing the work is for the Editor-in-Chief to read the cover letter, where we hope to see straightforward statements about why the work is suitable to be considered for publication. Given that the BMB is the official journal of the SMB, it is useful to let us know if you are a member of the SMB, and perhaps to mention how the work relates to SMB activities and interests. As mentioned above, being an active and engaged member of the SMB will make it relatively straightforward for authors to get to know different editorial board members, and to identify peers who are well-qualified to act as potential referees. If you would like to volunteer, either as a referee or as a member of the editorial board, please e-mail the Editor-in-Chief. The success of the BMB-SMB relationship relies on the goodwill of people who generously volunteer their time and expertise. Becoming involved in refereeing or as an editorial board member allows everyone to play a part in making the most of our society and our society journal.

We welcome proposals for Topical Collections. These collections can be organised around activities such as meetings of various SMB subgroups or perhaps as the outcome of a workshop (e.g. workshops hosted by the Banff International Research Station, Issac Newton Institute, the MATRIX Institute, or similar). Full details of current and past collections are available at <https://link.springer.com/journal/11538/collections>. Proposals for Topical Collections are assessed by the Editor-in-Chief, in consultation with relevant members of the editorial board. Publications in Topical Collections are subjected to the same editorial processes and standard as regular articles, and they appear online in chronological order among the regular articles within the journal, as well as being grouped together on the Topical Collections page of the BMB webpage. Acting as editor of a Topical Collection is a fantastic pathway into editorial activities and allows early- and mid-career researchers to develop their research leadership skills.

Regardless of the type of article you choose to publish in the BMB, after the work is accepted for publication please remember to complete the online form so that a summary and attractive infographic relating to your work can be promoted by the SMB!

References

1. Ciocanel MV, Ding L, Mastromatteo L, Reichheld S, Cabral S, Mowry K, and Sandstede B. Parameter Identifiability in PDE Models of Fluorescence Recovery After Photobleaching. *Bulletin of Mathematical Biology* 2024; 86:36. DOI: <https://doi.org/10.1007/s11538-024-01266-4>
2. Penn MJ and Donnelly CA. Asymptotic Analysis of Optimal Vaccination Policies. *Bulletin of Mathematical Biology* 2024; 85:15. DOI: <https://doi.org/10.1007/s11538-022-01114-3>