President Elect Candidate: Sebastian Schornack

Priorities:

Plants grow and develop in interaction with their living environment. Understanding plant microbe interactions is thus crucial to understanding plant biology.

Priority of the IS-MPMI is to be the leading society for anything 'plant-microbe' by maintaining and growing a community of like-minded members through knowledge exchange, information distribution via seminars and conferences as well as through its own publications, first and foremost the *MPMI* journal. IS-MPMI should maintain existing relationships and forge new links with other organizations and societies to establish research priorities and to cooperatively advance the science of plant microbe interactions. Expanding membership and reaching further across the globe will ensure researchers from all around the world can benefit from and participate in this community. I see potential in re-strengthening molecular, symbiotic, and endophytic molecular interactions in parallel to the already strong pathogen research at the IS-MPMI Congress. Finally, the Society should put a strong emphasis on outreach and communication beyond its membership to further raise awareness of the importance of MPMI.

Commitment to principles of equity, diversity, and inclusion:

I am running a research group with members from five nationalities, and I am committed to the principles of diversity, equity, and inclusion (DEI). We can foster research and innovation most effectively in an environment where every member feels valued, respected, and empowered to contribute their unique strengths and which reflects the diversity of ideas, perspectives and talents present in our community. Let's make the Society a home for everyone interested in molecular plant-microbe interactions, independent of their age, disability, ethnicity, gender identity, sexual orientation, immigration status, national origin, race, religion, and socio-economic status.

The landscape of DEI is constantly evolving, and we need to adapt accordingly to create meaningful and lasting change. Checks on how effective our efforts are and feedback from the membership is an important aspect of that. I saw this firsthand when I suggested the introduction of a system at our institute where research and service team leaders can receive formal and anonymized feedback from everyone.

We need to establish, expand, and regularly update resources, designed to be inclusive and accessible, so that members are aware of the Society's most relevant DEI issues. It is also important to note successes and that efforts are recognized on the community and individual level.

Region(s) of the world I am representing:

I am part of the western European research community. I grew up in Germany and moved to the United Kingdom after my PhD. Working with various model systems, pathogenic as well as

beneficial aspects of MPMI, and in multicultural environments enables me to reach out to people across the full spectrum of plant-microbe interactions research.

I have been leading an independent research team at the Sainsbury Laboratory Cambridge University (SLCU) for 11 years and am contributing to teaching at the Department of Plant Sciences. I have supervised undergraduate and graduate students from the UK and overseas. Researchers from my team have continued to pursue successful careers in industry and academia.

I have demonstrated leadership and organizational skills by being part of the local organizing committee of MPMI 2019 in Glasgow, Sainsbury Laboratory Symposia in 2016 and 2024, the Molecular Mycorrhiza Meeting 2023 (principal local organizer), and I am a Steering Committee member of the Oomycete Genetics Network. I acted as Issue Editor for Current Opinion in Plant Biology and am an Associate Editor for PLOS Pathogens. At my home institute I am the Biosafety officer and member of the Communications Committee.

I consider myself a team player and see clear benefits in collaborative research, especially since the challenges in the field become more and more complex as we move from single-gene oriented studies and binary systems to more complex relationships. I am a strong supporter of open science and preprinting culture that enables fast and free access of our research to the global community.

I am committed to raising public awareness and understanding of plant science and what it means to be a plant-microbe scientist. I support my team members and enjoy taking part in citizen science projects, public and school lectures. I value the reach of social media and have also communicated complex scientific findings to diverse audiences via TV interviews, newspaper articles, podcasts and podium discussions. It is valuable to me to inspire artists, most recently Eleanor Havsteen-Franklin [https://www.instagram.com/p/CWwPq66I_wB/] and Shezad Dawood, with our research.

Growing up in the former East Germany I was lucky to attend extended secondary school and study just after the German Reunification. My studies in Botany, Genetics, Zoology and Informatics, my Diploma and PhD at the Martin-Luther-University Halle-Wittenberg under the supervision of excellent scientists have influenced my understanding of the intricate relationships between plants and microbes. I contributed to cloning a disease resistance gene against Xanthomonas bacteria, co-discovered the TAL effector code and since then have continued to explore how microbes manipulate plants and how plants permit or prevent infections. The systems have changed, though. After my PhD I was drawn to filamentous microbes because their infection structures are beautifully discernable under the microscope.

Having either studied or utilized viruses, bacteria, oomycetes and most recently symbiotic fungi as well as a range of monocot, dicot and nonvascular liverwort plants I have a profound appreciation for the diversity and innovative nature of life, and the importance of comparative and evolutionary studies, especially on the cellular and molecular level. I am insatiably curious but also well aware of the benefits and limitations of the different plant microbe systems.

For these reasons, I feel that I can connect well with other researchers and their questions and problems they pursue. I am committed to representing IS-MPMI to the best of my abilities and with the input I get from all of you if you are willing to put your trust in me.

Please find out more about me here: <u>www.schornacklab.net</u>; Twitter/X: @dromius; Bluesky: @dromius.bsky.social; Google Scholar: <u>https://scholar.google.co.uk/citations?user=iJScODIAAAAJ&hl=en</u>

Short Bio: Sebastian Schornack

Dr. Sebastian Schornack is a Senior Group Leader at the Sainsbury Laboratory, Cambridge University (SLCU). Sebastian was an undergraduate at the Martin-Luther University of Halle, Germany, and conducted his Diploma project in 2000 under the supervision of Ulla Bonas and Thomas Lahaye on the cloning of the tomato disease resistance gene Bs4.

He earned his PhD degree in 2006 in Plant Biology, working on the structure, specificity, and regulation of the Bs4 disease resistance gene and was awarded the Martin Luther Award for Excellence.

A subsequent short postdoctoral study with Thomas Lahaye at the University Halle resulted in the co-discovery of the TAL effector DNA binding code. Sebastian was then awarded a postdoctoral scholarship from the German Science Foundation and undertook research on Phytophthora effector proteins with Sophien Kamoun at The Sainsbury Laboratory Norwich, UK from 2008 to 2012.

In 2013 he was awarded a Gatsby Fellowship and a Royal Society University Research Fellowship and started his own independent research on Intracellular Plant-Microbe Interactions as a Gatsby Fellow at SLCU Cambridge. Sebastian was promoted to Principal Gatsby Fellow in 2019. Sebastian is also a Full Affiliate of the Department of Plant Sciences, University of Cambridge since 2018. He held a Research Associateship at Sidney Sussex College Cambridge from 2015-2017.

Sebastian is an Academic Editor for PLOS Pathogens since 2021 and served as Issue editor for Current Opinion in Plant Biology between 2017 and 2018.

Sebastian received a Poster Award at the XIII. MPMI meeting, The Sainsbury Laboratory (TSL) Alumni Fellowship Award in 2013 and, as part of a team led by Sophien Kamoun and Ryohei Terauchi, the 2011 Daiwa Adrian Prize for British-Japanese cooperation.

Sebastian served as a member of the Royal Society International Exchanges Committee and is currently a member of the Royal Society Grant Review Committee. At SLCU, he is a Biosafety Officer, a member of the Intellectual Property committee, Communications committee, and the EDI Research subcommittee. Sebastian was the main organizer of the International Molecular Mycorrhiza Meeting (iMMM) 2023 in Cambridge.

Within the last five years, Sebastian held a Gatsby Foundation Research Fellowship and an ERC Starting grant. Overall, he has received significant funding from the DFG, Gatsby, BBSRC, NERC, Royal Society, the European Commission, and ENSA. Sebastian is an inventor on several filed patents and patent applications on disease resistance genes, the TAL effector code, and improved nitrogen fixation.