Candidate for Chair

Andreas Tolk
MITRE, Charlottesville, VA, USA

BIOGRAPHY

Academic Background:
Ph.D., University of the Federal Armed Forces, 1995, Computer Science.

Professional Experience:
Chief Scientist, MITRE, Charlottesville, VA, 2020 – Present;
Simulation Principal, MITRE, Hampton, VA, 2016 – 2020;
Professor, Old Dominion University, Norfolk, VA, 2006 – 2013.

Professional Interest:
Artificial Societies and Multiagent Systems, Conceptual Alignment for Multiscale and Hybrid Simulations, Epistemology of Simulation, Complex Adaptive Systems, Systems Engineering Application Support by Simulation.

ACM Activities:
Chair, SIGSIM, 2023 – Present;
Vice-Chair, SIGSIM, 2016 – 2023;
Treasurer, SIGSIM, 2010 – 2016.

Membership and Offices in Related Organizations:
Various board positions, Society for Modeling and Simulation International, 2002 – Present.

Awards Received:
Distinguished Contribution Award by ACM SIGSIM, 2019;
Distinguished Professional Achievement by SCS, 2014;
Technical Merit Award by SISO, 2010.

STATEMENT

I have been on the SIGSIM board for several years in all positions. I have contributed to establishing the Profession of Modeling and Simulation in academia and industry. Part of these efforts was editing the Body of Knowledge for Modeling and Simulation as a handbook. I believe SIGSIM needs to closely collaborate with Society for Modeling and Simulation (SCS), which I see as our purest sister organization, and will make the consolidation of our relation my main goal if elected to serve another term on the SIGSIM Board.

Another topic on my agenda is to integrate our various efforts closer with the board activities. Diversity of efforts is a good thing, but if it happens in isolation, it quickly leads to isolated splinters of activities. Our three major conference activities, PADS, WSC, and MSWiM need to be aware of each other and collaborate with our journal, TOMACS. These activities should all collaborate with the related efforts of SCS to broaden SIGSIM's reach and impact. I cannot do this alone. I plan to continue to integrate my Vice-Chair to ensure seamless contributions in case I am not available. And I will listen to you, so keep your ideas coming.

Candidate for Chair

Srikanth B. Yoginath
Oak Ridge National Laboratory, Oak Ridge, TN, USA

BIOGRAPHY

Academic Background:
Ph.D., Georgia Institute of Technology, 2014, Computational Science and Engineering.

Professional Experience:
Senior Research Staff, Oak Ridge National Laboratory, Oak Ridge, TN, USA,
2023 – Present;
Research Staff, Oak Ridge National Laboratory, Oak Ridge, TN, USA, 2015 – 2023;
Research Associate, Oak Ridge National Laboratory, Oak Ridge, TN, USA, 2010 – 2015.

Professional Interest:
Massively Parallel Simulations, Digital Twins, Machine Learning and Deep Learning,
High Performance Computing.

ACM Activities:
Program Committee Member SpringSim, SIGSIM, 2019 – Present;
Program Committee Member WSC, SIGSIM, 2018 – Present;
Member ACM, SIGSIM, 2017 – Present;
Publicity Chair ACM Sponsored Simutools Conference, SIGSIM, 2014.

Membership and Offices in Related Organizations:
Member, IEEE, 2019 – Present;
Member, SCS, 2019 – 2022.

Awards Received:
DOE Award Exploratory Research on Extreme Scale Science Proposal, 2022.

STATEMENT

I am honored to be nominated to run for SIGSIM Chair. I have been an active member of
ACM since 2017 and have been publishing in ACM conferences and journals since 2008.
I have served as a technical reviewer for many conferences, journals, and US DOE
proposals. I have served as a program committee member and publicity chair for ACM-
sponsored conferences. I am also actively serving in some of these roles. Within Oak
Ridge National Laboratory, I have held several community development roles in the
software council, interview panel, and award selection committee.

Community organization and outreach to advance simulations as a science and profession is a hard task that has been successfully performed with persistent effort and member consensus over several decades by our fellow researchers and professionals. As Chair, I intend to continue this trend with a mindset to perform the right actions derived from member discussions and past learning. I will work hard to strengthen existing collaborations with industry and academia, and further promote collaborations with other research institutions, like US DOE National Laboratories. I will also promote events encouraging larger participation of students and junior researchers for the sustenance and growth of our community.

Candidate for Vice-Chair

Anastasia Anagnostou
Brunel University London, London, UK

BIOGRAPHY

Academic Background:
Ph.D., Brunel University London, 2014, Large scale distributed simulation.

Professional Experience:
Senior Lecturer, Brunel University London, London, UK, 2021 – Present;
Lecturer, Brunel University London, London, UK, 2018 – 2021;
Research Fellow, Brunel University London, London, UK, 2014 – 2018.

Professional Interest:
Large Scale Modeling & Simulation, AI and Simulation, Digital Twins, High Performance Simulation, Cloud Computing.

ACM Activities:
Vice Chair, SIGSIM, 2023 – Present;
Program Chair, Winter Simulation Conference 2025, 2022 – 2025;
PhD Colloquium Committee (Chair), Winter Simulation Conference 2018, 2017 – 2018;
Registration Chair, ACM SIGSIM PADS 2015, 2014 – 2015.

Membership and Offices in Related Organizations:
General Chair, Op. Res. Soc. 10th Simulation Workshop (ORS SW 2021), 2019 – 2021;
Programme Chair, Op. Res. Soc. 9th Simulation Workshop (ORS SW 2018), 2017-2018;
Programme Chair, Op. Res. Soc. 8th Simulation Workshop (ORS SW 2016), 2015 – 2016.

STATEMENT

I have been a member of ACM SIGSIM for almost a decade. During this time, I have had several volunteering roles and actively contributed to the successful running of SIGSIM related activities, such as being member of Organizing and Technical Committees for the Winter Simulation Conference (WSC), the International Symposium of Distributed Simulation and Real Time Applications (DS-RT), and the International Conference on Principles of Advanced Discrete Simulation (PADS) among others.

Since February 2023, I have held the position of SIGSIM Vice Chair and I'm interested in continuing my role and contributions to the successful leadership of SIGSIM. My vision is to introduce and support activities that will increase the participation of women,

especially from underrepresented backgrounds, in the simulation community, and I'm determined to work towards this goal.

Candidate for Vice-Chair

Edward Hua
MITRE, Mclean, VA, USA

BIOGRAPHY

Academic Background:
Ph.D., Cornell University, 2009, Electrical & Computer Engineering.

Professional Experience:
Lead Simulation and Modeling Engineer, The MITRE Corporation, Mclean, Virginia, USA, 2018 – Present;
Network Engineer, Janus Research Group, Aberdeen, Maryland, USA, 2013 – 2018;
Systems Engineer, QED Systems, LLC, Aberdeen, Maryland, USA, 2009 – 2013.

Professional Interest:
Digital Twins, Simulation and Artificial Intelligence, Artificial Society, Supply Chain Optimization, Wireless Communications.

ACM Activities:
Track Chair for WSC 2024, SIGSIM, 2024 – Present;
Track Chair for WSC 2023, SIGSIM, 2023 – 2023;
Track Chair for WSC 2022, SIGSIM, 2022 – 2022;
Track Chair for WSC 2021, SIGSIM, 2021 – 2021.

STATEMENT

I am honored to have been asked to run for the SIGSIM Vice President position. I first became a member of ACM through my association with the Winter Simulation Conference, at which I have been serving as the Simulation & AI track co-chair for the last few years.

The M&S community is undergoing a profound expansion in recent years, with the explosive advances in technologies such as blockchain, AR/VR/ER, Digital Twins, Metaverse, etc. SIGSIM should serve as a nexus for researchers in these diverse fields to exchange ideas and seek collaborative opportunities.

If elected, I will work to encourage more collaboration among members of the SIGSIM to probe and explore a viable ecosystem that brings all these new technologies to address the new challenges facing the M&S community.

Candidate for Secretary/Treasurer

Ayesha Afzal
Erlangen National High Performance Computing Center (NHR@FAU), Germany

BIOGRAPHY

Academic Background:
Ph.D. Candidate, Friedrich Alexander Universität Erlangen- Nürnberg Germany, Erlangen National High-Performance Computing, 2024 (expected), Computer Science.

Professional Experience:
Researcher, Erlangen National High Performance Computing Center (NHR@FAU), Germany, 2018 – Present;
Researcher, Hardware/Software Co-Design, Friedrich Alexander Universität, Germany, 2017 – 2018;
Lecturer, University of Management and Technology (UMT), Pakistan, 2012 – 2013.

Professional Interest:
Performance Measurement, Evaluation, Modeling and Engineering; Performance Profiling Tools and Parallel Simulation Frameworks; Parallel Algorithms and Programming Models; Multi-Core and Parallel Architectures, High-Performance Computing.

ACM Activities:
Vice-Chair, ACM Supercomputing Posters -ACM SRC, Research, Doctoral Showcase, 2023 – Present;
Chair, ACM HPDC PERMAVOST Workshop, 2022 – Present;
Publicity Chair, ACM SIGHPC ICPP Conference, 2023 – Present;
Mentoring Chair, ACM Supercomputing WHPC Workshop, 2022 – 2023.

Membership and Offices in Related Organizations:
Member, ACM, ACM-W, ACM-SIGSIM, 2022 – Present;
Member, IEEE, including Computer Society, Young Professionals, WiE, etc., 2023 – Present;
Co-Chair, WHPC Mentoring (SC) and Posters (ISC), 2022 – Present.

Awards Received:
Best Short Paper Award, ACM SC PMBS Workshop, 2023;
Global Award of Achievement, WeAreTheCity's Rising Stars, 2023;
Named in YouTube's Heroes Top 100 Future Leaders Role Model List, 2023;
First place in PhD Forum Award, ISC-HPC Conference, 2021.

STATEMENT

It is important for the community members to give back to the research community by volunteering. I contribute to significant scientific community events as a chair, vice-chair, program committee member, reviewer, panelist, and active speaker. Having an amazing experience leading and organising events, I am particularly interested to get engaged with ACM SIGSIM to contribute my insights as an early-stage researcher who actively engages in student concerns and is a supporter of more outreach and inclusivity.

My motivation for volunteering for ACM SIGSIM is driven by a strong desire to become an integral part of the community and to establish meaningful connections and foster collaborations with like-minded individuals who share a passion for research. I am particularly interested in helping newer members of the community, increasing participation of researchers from under-represented groups and in making the ACM SIGSIM program stronger and more inclusive. I believe I can accomplish this more successfully by being a part of the ACM SIGSIM in the nominated Secretary/Treasurer role.

Candidate for Secretary/Treasurer

Cristina Ruiz Martin
Carleton University, Ottawa, Canada

BIOGRAPHY

Academic Background:
Ph.D., Carleton University/Universidad de Valladolid, 2018, Electrical and Computer
Engineering / Industrial Engineering.

Professional Experience:
Instructor, Carleton University, Ottawa, Canada, 2020 – Present;
Post Doctoral Fellow, Carleton University, Ottawa, Canada, 2018 – 2020;
PhD Student, Carleton University/Universidad de Valladolid, Ottawa, Canada/Valladolid,
Spain, 2013 – 2018.

Professional Interest:
Discrete Event Modeling and Simulation, Engineering Teaching, Organizational
Resilience, Model Transformation, Applications of Modeling and Simulation.

ACM Activities:
Ph.D. Colloquium Winter Sim - ACMSIG representative, SIG-SIM, 2022 – Present.

Membership and Offices in Related Organizations:
Elected Director-at-Large, Society for Modeling & Simulation Int, 2021 – Present.

Awards Received:
Reviewer of the Year 2021 - Runner up. Journal SIMULATION., 2021;
Young Simulation Scientist Award. SCS, 2020;
DEVS Modeling and Simulation Ph.D. Dissertation Award. SCS, 2019.

STATEMENT

I am honored to run for the position of Secretary-Treasurer of SIGSIM. My first contact
with the group was in 2018 when I attended the Winter Simulation Conference, where
the annual SIGSIM meeting is held. Since then, I have been active in the community,
participating in the Winter Simulation Conference every year. After graduation, I have
taken on more leadership roles, such as program committee member, track chair for the
poster session, and Diversity and Inclusion chair. Over the last two years, I have been
the SIGSIM representative in the Ph.D. Colloquium. I want to continue contributing to
the community, and I am now running for the role of Secretary-Treasurer of SIGSIM. In

this new role, I will focus on ensuring that we continue with our solid financial situation. I will also work toward giving more visibility to the grants and awards the society offers.