

Computational Acoustics

The Computational Acoustics (CA) Technical Specialty Group (TSG) is pleased to announce its promotion to a full-fledged Technical Committee (TC), as of the May 2022 meeting in Denver! In Jan. 2022, the TSG exceeded the 2% threshold for ASA members declaring CA as their primary interest. Subsequently, a petition was submitted to the ASA Executive Council to become a new TC. The petition was approved at the Denver meeting. CA thus became the ASA's first new TC since Signal Processing in 2000.

Prior to becoming a TC, CA existed as a TSG for four years, following approval by the EC at the Minneapolis meeting in Spring of 2018. Additional information on the formation and purpose of the TSG can be found in an *Acoustics Today* "Sound Perspectives" article (<https://acousticstoday.org/technical-specialty-group-report-computational-acoustics-d-keith-wilson/>). The CA TC provides a forum for researchers interested in numerical methods, optimization of calculations, benchmarking, and practical application of computational models. It includes particularly strong representation from young ASA members, industry, and government laboratories.

Promotion to a TC culminated from the hard work and support of many people. To cite several here: Amanda Hanford collaborated with me on the original petition to become a TSG. Jennifer Cooper served as CA's first Technical Program Organizer and continued for many years, while advocating for CA at every opportunity. Laura Brill, Ralph Muehleisen, and Jennifer organized our first Early Career presenter competition. Kimberly Riegel set up the first version of the CA web site. Elaine Moran coached me through the process of becoming a TSG and then a TC, and provided timely assistance whenever needed. Thanks are also due to many I have not mentioned, who participated in our open meetings, organized special sessions, and other activities -- we did this together!

CA sponsored three special sessions at the Fall 2021 meeting in Seattle: "Validation and Verification (V&V) for Acoustics and Simulations," which was organized by Sheri Martinelli and Andrew Wixom, "Computational Aeroacoustics," organized by Hales Swift and Charlie Zheng, and "Showcases of High-Performance Computing in Acoustics," organized by Kuangcheng Wu, Ralph Muehleisen, and Shung Sung. A tutorial lecture on "Software Best Practices" was also held in Seattle. Three special sessions were sponsored at the Spring 2022 meeting Denver: "Finite and Boundary Element Methods Across Acoustics," which was organized by Jennifer Cooper, Michelle Swearingen, and Subha Maruvada; "Contributions in Emerging Methods for Design and Optimization in Computational Acoustics", organized by Amanda Hanford and Andrew Wixom, and "Application of Model Reduction Across Acoustics," organized by Kuangcheng Wu, Shung Sung, and Keith Wilson.

CA held its second Early Career Presenter award competition at the Denver meeting. Any presenter who has completed their final degree within the past 5 years is eligible. Three papers received awards: Jiacheng Hou for "Time-domain simulation of acoustic scattering and internal propagation from multiple gas bubbles", Simon Kerston for "Influence of the Model Parameters for the Finite Element Simulation of Bone Conduction in the Human Head", and Allison Kaminski for "Predictions for the perturbed root mean square displacement of a vibrating structure using modal parameters."

Amanda Hanford served as the CA Technical Program Organizer for both the Seattle and Denver meetings. Thanks also to the many dedicated editors involved in computational acoustics for ASA publications: Kuangcheng Wu is the *JASA* Coordinating Editor for CA; John

Fahnlne, Raymond Kirby, Ying-Tsong Lin, Assad Oberai, and Nickolas Vlahopoulos serve as the *JASA* Associate Editors for CA; Vlahopoulos and D. Keith Wilson are *JASA Express Letters* AEs for CA; and Matthew Blevins and Amanda Hanford are *POMA* AEs for CA.

Please come to our first full official meeting as a TC, in Nashville! The CA TC welcomes ideas and participation from all members of the ASA interested in computational acoustics, such as topics for special sessions, benchmarking and validation, and code repositories.

D. KEITH WILSON
Chair, 2021–2024