Functional Genomics Workgroup Co-Chair Candidate

Daniel Peterson

Director & Professor Mississippi State University

Dr. Daniel G. Peterson is director of the Institute for Genomics, Biocomputing & Biotechnology (www.igbb.msstate.edu) and a professor in the Department of Plant & Soil Sciences at Mississippi State University (www.msstate.edu). Peterson received his B.S., M.S., and Ph.D. 1993, and 1998, respectively) from Colorado State University degrees (1991, (cytogenetics/molecular biology; advisor: Stephen M. Stack). He then worked as a postdoctoral associate at the University of Georgia for three years (genomics; advisor: Andrew H. Paterson) before becoming a faculty member at Mississippi State University in 2002. Peterson's research is focused on exploring the structure, function, and evolution of eukaryotic genomes using genomic, computational, cytogenetic, and molecular biology techniques. His research group is illuminating trends in molecular evolution and discovering those sequences responsible for economic and adaptive traits of crop plants. Peterson played a key role in generating the 'gold standard' genome sequences of Gossypium raimondii and sorghum (Sorghum bicolor), and is currently involved in studying how evolution and domestication have shaped Gossypium genomes/genes. In addition, Peterson is involved in international efforts to sequence the genomes of three crocodilians (American alligator, Australian saltwater crocodile, and the Indian gharial). For their work facilitating production and analysis of the Gossypium raimondii genome sequence, Peterson, Andrew Paterson, Jonathan Wendel, Jeremy Schmutz, and Dan Rokhsar received the National Cotton Council's 2012 Cotton Biotechnology Award. Dr. Peterson wishes to strengthen and broaden his collaborations within the cotton research community via participation in the ICGI.