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Dennis Folds received his Ph.D. in Engineering Psychology from Georgia Institute of Psychology in 1987, and his M.S in Applied Psychology from Jacksonville State University in 1982. He was Research Scientist at the Georgia Tech Research Institute from 1984-2017, where he served as the GTRI Chief Scientist from 2008-2013, and Associate Director from 2013-2014. He was also Chief of Human Systems Integration Division from 2006-2010, and Head of the Human Systems Engineering Branch from 2000 – 2006. He served as project director and principal investigator for over 100 sponsored research programs. He developed Georgia Tech's professional education offerings in Human Systems Integration and served as lead instructor for over ten years. He directed the Information Technology Technical Assistance and Training Center for Georgia Tech. His major research programs include experimentation on characteristic errors in rapid decision-making, modeling and simulation of human performance in engineered systems, auditory perception of multiple simultaneous sounds, and human capital modeling. Dr. Folds is the author of over 50 refereed journal articles and conference papers, and five book chapters.

His association with IARIA began in 2015 with the first Human and Social Analytics (HUSO) conference in Malta. He had a paper accepted for presentation there, and in subsequent years he has been on the HUSO program committee, serving as session chair, panel chair, and special track coordinator. For the second HUSO conference in 2016, he organized a special session on Next Generation Social Analytics, and prepared an editorial on the challenges and payoffs expected from social analytics as new methods for "big data" sources are developed. He served on the steering committee for the third HUSO conference in 2017, and coordinated two papers related to modeling community resilience using the tools and methods of social analytics. He continued this theme for the fourth HUSO in 2018, coordinating a special track on social analytics and community resilience. At that same conference he conducted a special workshop on using logic modeling to guide selection of social analytics estimation methods in evaluating program effectiveness.

His work on human capital modeling is the foundation of his work on social analytics. His key innovation is to define the core of human capital as the combination of subjective well-being (SWB) and standard of living (SOL) of individuals. By studying and modeling factors that cause SWB and SOL at the individual level, it is possible to prospectively predict, or retrospectively assess, the value of efforts to improve the human condition in a population of interest. This has been of particular interest in predicting community resilience in the presence of acute or chronic stressors, and especially in predicting the impact of efforts to improve resilience in vulnerable populations. He also defined methods for applying human capital modeling to predict the impact of large-scale changes in healthcare systems, in terms of disability-adjusted life years (DALY) and lost work days (LWD).

Dr. Folds developed a conceptual framework known as operator role theory (ORT) to help guide function allocation decisions in systems engineering. In that framework he proposed a distinction between supervisory control (in which human operators can adjust how a function is performed by a machine) and executive control, in which the human can simply enable or disable the function but otherwise cannot adjust it. He subsequently put this forward to provide a structure for understanding and designing autonomous systems, asserting that humans must maintain executive control over most functions of an autonomous system.

He began his research career with the US Army Aeromedical Research Laboratory in 1980, and spent over 35 years doing research at Georgia Tech in Atlanta, Georgia USA. In 2017 he became Chief Scientist for Lowell Scientific Enterprises. In 2018 he was also named Chief Human Systems Scientist for Problem Solutions, LLC in Johnstown, PA USA.