Instructor Biography

Nicholas Beser

Nicholas Beser received a Ph.D. in 1983 in systems engineering and computer science from the University of Pennsylvania. Dr. Beser has worked at the Johns Hopkins University Applied Physics Laboratory for over 30 years. Currently, he is Section Supervisor for the Signal and Image Processing and Analysis Section of the Seeker and Information Processing Group. Dr. Beser is the Lead Engineer for several computer vision and video projects. He was also the Project Manager for the Multimedia Forensic Laboratory and was the Chief Engineer on the Digital Video Authentication Project. He has also been the lead researcher on several Video Exploitation IR&D projects developing video mosaic, super-resolution, and automated scene change detection methods. In addition, he has supplied video exploitation services to both Howard County Police and Baltimore City Police in the analysis and enhancement of crime video tapes. Dr. Beser is the JHU/APL representative to the International Standards Organization Moving Pictures Experts Group (MPEG) Panel. He has authored many papers on data compression standards, history of space data compression, and data compression quality measures. Dr Beser is also co-inventor of several patent's covering surveillance, forensic data and 3D Visualization. In addition, he also has extensive work experience in the area of high-speed signal and data processing covering both design and software. Prior to working at the Applied Physics Laboratory, Dr. Beser was a Lead Electronics Systems Engineer at General Electric Valley Forge Pennsylvania. During that period Dr. Beser was the project lead for a MIL-STD-1750A flight computer for a satellite mission. This computer was designed and certified by the Air Force in 9 months as part of a high priority effort. Dr. Beser also was on loan supporting the CR&D (GE Corporate Research and Development) DARPA MIPS project (Floating Point Unit).