

## Professor Mohamed Bakr



**Mohamed H. Bakr** received a B.Sc. degree in Electronics and Communications Engineering from Cairo University, Egypt in 1992 with distinction (honors). In June 1996, he received a Master's degree in Engineering Mathematics from Cairo University. In 1997, he was a student intern with Optimization Systems Associates (OSA), inc. He earned the Ph.D. degree in September 2000 from the Department of Electrical and Computer Engineering, McMaster University. In November 2000, he joined the Computational Electromagnetics Research Laboratory (CERL), University of Victoria, Victoria, Canada as an NSERC Post Doctoral Fellow. Dr. Bakr received a Premier's Research Excellence Award (PREA) from the province of Ontario, Canada, in 2003. He also received an NSERC Discovery Accelerator Supplement (DAS) award in 2011. In 2014, he was a Co-recipient of Chrysler's innovation award for a project on novel designs of hybrid cars. In 2020, he was a recipient of a Faculty Appreciation Award by the McMaster Engineering Society (MES). He was awarded the President's Award for Outstanding Contributions for Teaching and Learning from McMaster University in April 2021. In July 2021, he was awarded a Distinguished Engineering Educator honorific from the Faculty of Engineering, McMaster University. He was also included in Stanford's list of the top 2% most cited scientists for the years 2020-2022. His research areas of interest include optimization methods, computational electromagnetics, computer-aided design and modeling of power circuits and motors, microwave circuits, THz, and photonic devices, nanotechnology, artificial intelligence and its applications, smart analysis of high frequency structures and efficient optimization using time/frequency domain methods. He is currently the Chair of the Department of Electrical and Computer Engineering, McMaster University. He authored/coauthored over 300 journal and conference papers, two books on the optimization and CAD of high frequency structures, three book chapters on optimization, electromagnetic modeling, and artificial intelligence, and three patents.