

IET Travel Award Report

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I recently had the opportunity to participate in the 41st IEEE International Conference on Consumer Electronics (ICCE) organized by the IEEE Consumer Technology Society (CTSoc) in Las Vegas, USA. The conference was held in conjunction with the Consumer Electronics Show (CES) and provided a platform for researchers, industry experts, and academics to come together and share their knowledge and ideas in the field of consumer electronics. This report provides a detailed summary of my participation in the ICCE conference and my visit to CES.

The 41st IEEE International Conference on Consumer Electronics was organized by the IEEE Consumer Technology Society and was held in Las Vegas from the 6th to the 8th of January. The conference provided a platform for researchers, industry experts, and academics to come together and share their knowledge and ideas in the field of consumer electronics. Around 250 papers were presented during the conference, which was attended by notable people in the industry including IEEE President and Consumer Technology Association CEO. Participation in ICCE came with complimentary access to the CES, the most influential tech event in the world.

The technical focus of the conference was on the latest advancements and developments in the field of consumer electronics. The conference covered a range of topics, including artificial intelligence, wearable technology, robotics, and their applications in consumer products. The conference provided a platform for attendees to discuss their research and receive feedback from peers.

As a participant at the ICCE conference, I had the privilege of presenting "Phonocardiogram Segmentation with Tiny Computing", a paper I had co-authored with Danilo P. Pau and Oriana Di Marco, both from STMicroelectronics, and Dr Terence Leung from University College London (UCL). Research for this publication was carried out during my summer internship at STMicroelectronics in collaboration with the Medical Physics and Biomedical Engineering department at UCL. The paper proposed an 8-bit convolutional neural network for phonocardiogram segmentation, which received positive feedback and interest from the audience. Following the presentation I was invited to lead a tutorial on the subject of deeply quantized neural networks at the ICCE-Berlin 2023 conference.

The conference provided ample opportunities for networking with experts in the field of consumer electronics. I had the chance to interact with industry experts, researchers, and academics and gain a better understanding of the current trends and challenges in the industry. I also had the opportunity to attend several networking events, including poster sessions, technical sessions and conference dinners which provided me with a platform to engage in meaningful discussions with other attendees. I also had the opportunity to build relationships with fellow attendees, which could potentially lead to future collaborations.

In addition to my participation in the ICCE conference, I also visited the Consumer Electronics Show (CES) which was held in Las Vegas at the same time. CES provided me with a comprehensive insight into the latest advancements in the consumer technology industry. I had the opportunity to talk to employees from many high-profile companies in the tech industry, such as Nordic Semiconductor, TP-Link, Samsung, and many more. These conversations provided me with valuable insights into the challenges and trends in the industry and allowed me to make connections with professionals in the field.

CES also provided me with an opportunity to see demonstrations of the latest products and technologies in the tech industry. I was able to see new products in the fields of medical devices, robotics, and autonomous mobility, which helped me to understand the direction in which the industry is moving. This experience has provided me with inspiration for future research and has allowed me to see the real-world applications of my work.

I am grateful to the Institution of Engineering and Technology (IET) for providing me with a Travel Award that made my trip to Las Vegas possible. The funding provided me with the opportunity to participate in ICCE and CES. This experience allowed me to gain a better understanding of the current trends and advancements in the industry and provided me with inspiration for future research. The contribution of the award has been invaluable to my research and has played a significant role in shaping my future career.

In conclusion, participation in ICCE and CES provided me with valuable experience. The conference allowed me to present my research, receive feedback from professionals, and network with other researchers, industry experts, and academics. CES allowed me to gain insight into the latest advancements and trends in the consumer electronics industry. Overall, this experience was incredibly valuable and will be instrumental in my future research endeavours.