

Das Gupta, Jishu

B.Sc. (Computer Engineering) American International University Bangladesh (AIUB), Masters of Computing (MComp) USQ

Thesis Title:

Effect of Pedestrian Movement on MIMO-OFDM Channel Capacity in an Indoor Environment

Supervisors:

Dr Karla Ziri-Castro (Principal)

Dr Hajime Suzuki (Associate)

Dr Bouchra Senadji (Associate)

Citation:

This project presented, for the first time, a model to characterize the capacity of recently developed wireless network systems in indoor populated environments. The model will significantly contribute to optimize the design of Wireless Indoor Local Area Networks, ultimately achieving a more efficient utilization of the existing and limited frequency bandwidth. The computational model is based on measurements of the wireless channel characteristics in real life scenarios.