## **NITheCS**

National Institute for Theoretical and Computational Sciences

## NITheCS Colloquium Monday, 26 July 2021, 16h00

Prof Judy van Biljon | University of South Africa (UNISA)

"Machine Learning for the Developing World: Towards a Research Agenda"

## **ABSTRACT**



Researchers from across the social and computer sciences are increasingly using machine learning to study and address global development challenges. Machine learning for the developing world (ML4D), is an interdisciplinary domain at the intersection of machine learning and development research. Past experiences of using technology towards achieving global development challenges has had mixed success and the failure to acknowledge the local

context in the design and project implementation has often been identified as the main reason why development projects failed or were not sustainable. Therefore, the voices of developing country researchers are important in the discourse shaping the ML4D research agenda. In this talk I will consider systematic differences between ML4D and more traditional machine learning applications. I will present challenges to be considered and how the technical complications of ML4D can inspire novel research questions. Finally, I will propose a road map that could be considered towards developing a ML4D research agenda in South Africa.

## **BIOGRAPHY**

Judy van Biljon holds the National Research Foundation's Chair in Information and Communication for Development (ICT4D) hosted by the School of Computing at the University of South Africa (Unisa). She holds a Ph.D. in Computer Science from Unisa, and an M.Ed. from the North-West University. She has contributed to the body of academic knowledge by publishing on Human-Computer Interaction evaluation and design for marginalised groups, technology adoption, and sustainability in digital learning for resource-constrained environments. She promotes research capacity building through collaboration initiatives such as the establishment of the Southern African Chapter of the International Network for Postgraduate Students in the area of ICT4D (IPID). Currently she serves Associate Editor of Information Technology for Development and as a Senior Editor of the Electronic Journal of Information Systems in Developing Countries.

**CLICK TO REGISTER** 

https://bit.ly/3rnbWOG