Summary I’m a research fellow at a Connected Intelligent Centre located at University of Technology Sydney. My entire higher education has been about Computer Science and Information Technology with my PhD specifically focused in applied machine learning and artificial intelligence in Education. Currently, my focus areas are Skills Analytics, Occupational data analytics, Data Science and Curriculum analytics, and the application of these in education science.

Career history Post-doc Research Fellow at Connected Intelligent Centre, University of Technology Sydney

March 2021 – Current

This data science/research intensive role is largely focused on advancing learning analytics research through the use of labour insight and occupational data analytics to improve education and university outcomes.

Key responsibilities

* Actively engage with university’s different stakeholders to help them with data analytics needs
* Provide research-based solutions for different educational problems, specifically the ones that deal with employability, lifelong learning, quality education.

Achievements

* Apply the state of the art research in skills analytics to measure skills gap across entire university’s curricula
* Design and implementation of a course recommendation system

Post-doc Research Fellow at Macquarie University, Sydney

March 2019 – March 2021

Bringing artificial intelligence, text mining and machine learning, and data science to technology enhanced teaching and learning.

Key responsibilities

* Translate industry partner’s EdTech needs to research problem and provide research-based solutions
* Provide consultation for the industry partner

Achievements

* Designed, implemented, and evaluated a teacher training professional development program in delivering technology-enhanced pedagogy
* Design, implementation and evaluation of multiple natural language processing and text mining toolkits in RapidMiner for Virtuoso, a webtool designed for delivering educational content to high school students. The toolkit provides automated feedback on student’s homework, comments, and test results to the teachers.

Casual Academic at School of Software, University of Technology Sydney

July 2011 – March 2019

Activities mainly included lecturing and coordination of different teaching units (subjects) offered at School of Software, as well as other forms of activity such as tutoring, lab assisting, marking, and helping students with special needs.

Key responsibilities

* Delivering teaching content and evaluate learning by design and conducting assessments
* Provide assistance and guidance to the students through implicit or explicit feedback

Achievements

* High score in student feedback survey collected from my past (4,000) students
* By analysing the data collected from my past students, I set the stage to look at the data as a PhD project from which I eventually graduated.

Education PhD in Software Engineering from University of Technology Sydney

Graduated 2018

Master of Information Technology from University of Technology Sydney

Graduated 2013

Key skills Confident in processing, analysing, visualising, and interpreting different types of data, as well as aggregated data in other structures (anthologies, taxonomies, API request results, etc.

Knowledge Data science, Artificial Intelligence, Machine learning, Text Mining, Research

Programming Influent in R, Python, MATLAB

Tools RapidMiner, SQL, AWSs, PowerBI, Shiny R

References Available upon request