

Tertiary Education

- 2012–2013 **MPhil in Advanced Computer Science**, *University of Cambridge*, England.
Degree awarded with *Distinction*
Aggregate: 83.3%
Thesis title: *Memory-mapped Socket Buffers for Zero-copy Networking*
- 2011 **BSc Honours Computer Science**, *University of KwaZulu-Natal*, South Africa.
Degree awarded *Summa Cum Laude*
Aggregate: 93.5%
1st class pass for all subjects
Thesis title: *Plant Classification using Leaf Recognition*
- 2008–2010 **BSc Computer Science**, *University of KwaZulu-Natal*, South Africa.
Degree awarded *Summa Cum Laude*
Aggregate: 95.5%
1st class pass for all subjects

Publications

- 2011 Lagerwall, R.D., Viriri, S. Plant Classification using Leaf Recognition. *Proceedings of the 22nd Annual Symposium of the Pattern Recognition Association of South Africa*, 22-25 November 2011, Johannesburg, South Africa. pp 91–95.

Experience

- 2014– **Software Engineer**, *Citrix Systems*, Cambridge, United Kingdom.
Developed XenServer open source server virtualization software.
Roles included performance testing, analysis and improvements, scalability improvements, and upgrading the underlying distribution on which the appliance is built. Technologies used include C, Python, Git and Mercurial.
- 2012 **Junior Developer**, *ThoroughTec*, Durban, South Africa.
Developed mining and vehicle simulations in C++.
Projects included implementing vehicle logic, dragline dynamics, and user interface changes. Technologies used include Microsoft Visual C++, C# and Perforce.
- 2011 Contributed significantly to the Python programming language and became a core developer.
- 2010– **Software Developer**, *Numberwise*, Durban, South Africa.
Developed an interactive web-based maths program called Numberwise with over 20 000 users.
I developed a client program in Visual Basic which connects to a server written in PHP and MySQL.

Technical Skills

I am fluent in C, C++, Python and Java. I have a good knowledge of PHP and JavaScript as well as experience with database programming and SQL.

Other experience includes using various markup languages (HTML, CSS, \LaTeX and reStructuredText) and version control systems (Git, Mercurial, Subversion, and Perforce).

Problem solving interests me as well as theoretical Computer Science and the practice of programming (especially languages, operating systems and network servers).

I use Linux extensively and am interested in Linux programming and open source software.