



## **Joy REGINALD-OPARA**

**Home Country:** Nigeria

**Degree:** PhD in Pharmacy

**Expertise:** Pharmacokinetics and  
Biopharmaceutics,  
Nanomedicines

**Research Focus:** Drug Delivery using  
Nanotechnology

**Host University:** University of Auckland, New  
Zealand

**Fellowship Awarded:** 2016

Joy Reginald-Opара was born and grew up in Orji, a village in the south east of Nigeria. She developed a love for science and mathematics at a young age, and was encouraged to pursue her interest by sponsorship she obtained during her junior secondary school education from her performance in Mathematics. She completed her high school education at Holy Rosary College, Enugu, Nigeria, and subsequently chose to embark on a career in Pharmacy.

Joy studied at the School of Pharmacy, University of Nigeria, Nsukka, where in 2010 she completed her BSc as the best graduating student in the Faculty of Pharmaceutical Sciences. As a result of this she was awarded a position as a teaching and research assistant in the same institution, and during the course of her work enrolled for an MSc, specializing in Physical Pharmaceutics, which she gained in 2014. Since then she has been a Senior Lecturer in the University's Faculty of Pharmaceutical Sciences and has published several research papers in peer-reviewed international journals.

The PhD research focuses on the use of nanotechnology for the effective and targeted delivery of drugs - especially those used for managing diseases that are widespread in Africa. Research into the development of novel delivery systems such as surface modified nanoliposomes is essential to achieve optimal and sustained therapeutic concentrations of drugs – especially those that are poorly soluble – and to help deliver them to the appropriate parts of the body.

Following her studies in New Zealand, Joy plans to return to the University of Nigeria, Nsukka where she hopes to become a professor of formulation sciences and a renowned researcher in drug delivery. She would like to lead a research team focused on translational research into drug delivery methods for preventing and treating tropical diseases that remain a substantial burden in Africa.