



*Nutrition and Treatment Outcome: Development of a
Ugandan – Irish HIV / Nutrition Research Cluster*

Two research studentship positions (PhD's) associated with the Irish Aid-funded NOURISH project available in Trinity College Dublin and linked with the Infectious Disease Institute at Makerere University and with the School of Public Health at Makerere University

NOURISH (Nutrition and treatment outcomes: development of a Ugandan-Irish HIV/Nutrition Research Cluster) is a research project funded by Irish Aid as part of its programme of Strategic Cooperation with Higher Education and Research Institutes in Ireland and partner countries in Africa. The NOURISH project mainly involves Trinity College University of Dublin in Ireland and Gulu and Makerere universities and the Joint Clinical Research Centre (JCRC) and Infectious Diseases Institute (IDI) in Uganda.

NOURISH has three broad aims relating to HIV and nutrition in Uganda:

1. To build capacity in Ireland and Uganda to engage in cross-disciplinary and demand-led research linking HIV and nutrition
2. To increase understanding of the complex interactions between food insecurity, livelihood, nutritional deficiencies, immunosuppression, antiretroviral therapy, nutritional supplementation and HIV/AIDS outcomes
3. To develop ways of integrating HIV/AIDS programmes with activities relating to hunger reduction, food security and fighting under-nutrition

The research component of NOURISH is divided into three Work Packages (WPs). Of these, WP1 focuses on the role of nutrition as a determinant of treatment outcome for HIV infected adults and children in Uganda, by examining clinical, pharmacological and immunological responses to food supplementation in patients with and without malnutrition. WP1 will take place primarily in IDI and Kampala City Clinics (KCC) but may also take place in other clinics as necessary. TCD in collaboration with IDI will design a study to characterise a group of moderately and severely malnourished HIV positive children and adults with respect to immunological, clinical, nutritional, pharmacological and dietary intake status. The study will determine the effect of malnutrition on immunological and pharmacological factors relevant to initiating ART, and the effect of short-term food supplementation on safety, adverse effects and efficacy of ART including early morbidity and mortality. The study will inform future public health policy in relation to supplementary feeding for PLWHIV/A.

The two studentships offered are in the areas of immunology, pharmacology and nutrition. The two PhD students will set up and coordinate a randomized intervention trial of a RUTF supplement in adults and children who are receiving antiretroviral therapy for HIV infection. Students will evaluate health status using a variety of immunology, pharmacology and nutrition methodologies. Included is the collection of blood samples which will be analysed for markers of inflammation, nutritional status, pharmacological parameters of drug metabolism, phenotypes of circulating leukocytes and T cell, B cell, natural killer cell and innate T cell responses to antigens and mitogens.

Both PhD research positions are full-time and fully funded, and are scheduled to commence late 2013. The PhD positions are for a maximum of four years. Students will be registered in Trinity College Dublin (TCD) and will receive their Degree award from TCD. They will be registered in TCD through the INDIGO programme which is Trinity's International Doctoral programme in Global Health. As part of this programme students spend at least one year in TCD but will undertake the majority of their field work in Uganda as may be registered as research fellows at MU during this period. Students are normally expected to return to TCD towards the end of their PhD training. TCD PhD regulation will be applied. In addition to fees and a stipend, funds are available through the NOURISH project to cover fieldwork laboratory costs, consumables and travel etc.

Both postgraduate students will receive supervisory support from the NOURISH research team, including from Professor Derek Doherty (immunology TCD), Professor Martina Hennessy (Clinical Pharmacology TCD) and Professor Fiona Lithander (Nutrition TCD). The Student will be supervised on a day to day basis by staff at IDI including Dr Mohamed Lamorde and Dr Andrew Kambugu. They will have close links to the Dept of Clinical Medicine at MU. They will also have the opportunity to collaborate with Partners in JCRC; Dr Cissy Kityo, Deputy Director and Dr Victor Musiime, Head of Research at JCRC. Within MU they will also collaborate with Colleagues from Makerere's Dept's of Food Technology and Nutrition (Prof Archileo Kaaya) and School of Public Health (Dr Nazarius M. Tumwesigye).

Applications are invited from candidates who fulfill the following criteria:

- Be medically qualified with an MBBS from a recognized University.
- Have at least 2 years postgraduate clinical experience- post internship,
- Hold Membership of a recognized postgraduate training body such as MRCP or equivalent.
- Be eligible for registration with the relevant medical Council
- Be able to comply with relevant vetting and occupational health procedures for health care practitioners in the jurisdiction.
- Have demonstrable experience in managing patients with HIV disease
- Have demonstrable experience in Good clinical practice, data handling and statistics
- Previous completion of a piece of research (perhaps as part of an MSc) and a period fieldwork will be an advantage.
- Previous laboratory based experience would be an advantage
- Have Excellent Written and oral communication skills. English language fluency is essential
- Candidates should be prepared to travel independently within Ireland and in Uganda and be able work collaboratively with partners outside the University system including clinical care providers such as JCRC, IDI and other Non-Governmental organisations.
- The candidate should have some experience in managing others including providing direction to junior staff and research assistants that may be associated with the project. The candidate should have excellent time management skills, excellent team skills and be able to work independently.
- Candidates will have a passion for excellence in research, a strong interest one or more of the following disciplines; HIV disease and its treatment, immunology, clinical pharmacology and its links to nutrition.

For Further information and to submit an application in the form of an up-to-date CV, 2 references and a covering letter highlighting your skills and experiences relevant to the research detailed above please contact Dr. Derek Doherty (derek.doherty@tcd.ie) or Dr. Martina Hennessy (mhenness@tcd.ie)

Applications should be submitted no later than the 15th of February 2013.