



UNIVERSITY of LIMERICK
OLLSCOIL LUIMNIGH

PhD Studentship in Nutrition & Metabolic Health in Inflammatory Bowel Disease (IBD)

Location

University of Limerick and University College Cork

Background

Metabolic dysfunction is increasing in prevalence in IBD as the most common cause of chronic disability among this growing population group. In line with the general population, declining metabolic health is a phenomenon that is rapidly replacing historical projections for IBD sufferers including weight loss and suboptimal nutrient intake.

There has been a paradigm shift towards investigating the role of the gut microbiota and its implications in the pathogenesis of various disease states including IBD, obesity and metabolic syndrome. Indeed poor metabolic health has been associated with an altered gut microbiota. While a wealth of human dietary interventions, especially focusing on fibre have shown improvements in metabolic health, few have considered mediating these improvements via the microbiota. This study aims to answer this important research question.

The proposed research aims to build on over a decade of knowledge gained by our research group in this exciting field to advance the current understanding of the role of specific functional dietary fibres in modifying the gut microbiota and metabolic parameters in IBD sufferers.

Description

This PhD studentship will specifically focus on the role of fibre in glycaemic control and metabolic health in patients with IBD. The work programme will involve the development of human dietary intervention studies to define the potential benefits of novel fibres with functional health effects relevant to metabolic health in IBD. The PhD candidate will work in the University of Limerick in close collaboration with colleagues in the Alimentary Pharmabiotic Centre (APC) and the Dept. of Gastroenterology, Cork University Hospital. Novel biomarkers of disease will also be analysed (e.g. faecal calprotectin and Gas6) to understanding their use in the context of monitoring metabolic health in IBD.

The successful candidate will have responsibility for a number of specific areas including:

- To complete a focused PhD Programme within research activities of the UL and the APC/UCC.
- To contribute to the coordination and implementation of appropriate human feeding trials to determine the metabolic health effects of selected fibres.
- To have an appreciation of good laboratory practice to conduct biomarker assessment and bile acid analysis.
- To conduct dietary assessment, statistical analysis and aid with microbiota analysis.
- To prepare and present data for discussion within the team on a regular basis and at scientific conferences.
- To assist in the preparation of scientific reports and peer review scientific publications and have an awareness of intellectual property.

Qualifications

The ideal candidate will have an honours (2.1 minimum) degree in nutrition, food/health science, biochemistry, immunology, or related area. Show an interest in understanding the biology of human health/disease from the clinical perspective with the opportunity to develop strong mechanistic insight. The successful candidate should be a hard-working, enthusiastic and self-motivated individual, who can work independently and interact well within a larger research team.

Applicant requirement:

1. BSc (honours) in nutrition, food/health science, biochemistry, immunology and/or related field.
2. Excellent scientific, organisational and project management skills
3. Commitment to research and excellent problem solving skills. Evidence of good maths and statistics acumen.
4. Ability to work independently and as part of a multi-disciplinary team focused on delivery of high-quality research.
5. Excellent interpersonal and communications skills.

Further Details

Stipend: €18,000 per annum. Postgraduate fees will also be covered. The PhD is planned to start on 1st June 2018 and funding is available for 4 years. Transportation is essential as work programme will be conducted in both institutions.

Informal enquiries can be made to Dr Eibhlís O'Connor at eibhlis.oconnor@ul.ie

Please send your applications including cover letter, evidence of current academic achievement (transcript) and CV (with details of at least two referees) to Dr Eibhlís O'Connor at eibhlis.oconnor@ul.ie

Closing Date

18th May 2018