We are looking for exceptional students to apply for a funded PhD opportunity at the Centre for Health Economics (CHE). This studentship is part of the work programme of the Economic Methods of Evaluation in Health and Social Care Interventions (EEPRU). This is a National Institute for Health Research-funded Policy Research Programme undertaking work for the Department of Health and Social Care and arm’s-length bodies including NICE, Public Health England and NHS England. We are offering a studentship in the following topic area.

Developing and Applying Economic Evaluation Methods for Interventions Affecting Health and the Environment

The interdependence between nature and human health is now acknowledged. The 2018 UK Environment Plan mentions this relationship when supporting policies such as green infrastructures and nature-based mental health therapies. Furthermore, health care delivery can harm the environment, with the NHS being responsible for 25% of all UK public sector emissions.

An explicit policy objective of improving population health and reducing health inequalities whilst reflecting environmental impacts has significant implications:

(i) The value of environmental interventions with potential health impacts needs to be assessed against that delivered by more traditional interventions like screening programmes or public health campaigns.
(ii) When considering the value of new medical technologies, such as pharmaceuticals and medical devices, their environmental impacts need to be reflected.
(iii) In making decisions regarding medical technologies with environmental impacts, a social value judgement may have to be made regarding how much gain in population health should be forgone to achieve environmental benefits.
(iv) Interventions can deliver interrelated environmental, economic, and health benefits. Health benefits could translate to economic benefits in the form of cost savings to the NHS and increased productivity, but increased longevity of populations can have environmental implications.

Current economic evaluation methods applied to medical technologies are generally narrow in scope, focussing only on health outcomes and costs falling on health care budgets. Evaluating interventions that have intended positive or unintended negative environmental impacts requires a broader scope to reflect the presence of a mix of health and non-health outcomes, and costs and consequences falling over different sectors, such as health and social care, economic development, environment, planning and transport. There is a need to reflect the uncertainty associated with health and environmental effects and how this can impact on decisions where some effects can be irreversible when additional evidence emerges. Looking at environmental, as well as health, impacts may also change the appropriate time horizon of economic analyses. A research challenge exists in terms of
how to reflect environmental effects in cross sectoral economic evaluations and understand their normative implications. These could, for example, be incorporated using measures of environmental outcome in ‘natural units’ or through public preferences expressed as a composite measure of environmental benefit, market values or willingness to pay.

Published evaluations of policies with effects across different sectors frequently adopt a ‘naïve’ societal perspective, where multiple outcomes are monetized using various estimates of ‘willingness to pay’ and then summed across budgets and sectors, which fails to reflect relevant opportunity costs. Moreover, the impact on health inequality, one of the main objectives in public health, is rarely reflected.

This PhD topic will aim to develop a framework for the economic evaluation of interventions at the interface of public health and environmental policy. This will build upon recent methodological research in intersectoral economic evaluation and incorporating objectives relating to health inequalities. The framework will reflect the particular challenges associated with these interventions but also the needs of decision making for resource allocation. It will then apply the framework to the evaluation of specific policies as part of projects being undertaken at the University of York or identified through collaboration outside the University.

Supervisory team: Laura Bojke, Susan Griffin, Mark Sculpher, Centre for Health Economics, University of York

Supervision and research environment

The successful candidate will be supervised in CHE and will be registered through the Department of Economics and Related Studies or the Department of Health Sciences at the University of York. He/she will have strong quantititative skills, a Master’s degree in economics or health economics and, ideally, some experience in the field of economics applied to health.

This is an opportunity to work in close contact with researchers in one of the most successful health economics research groups in the UK. CHE has a leading international reputation, and is one of the world’s largest health economics research centres. Its mission is to undertake “high quality research that is capable of influencing health policy decisions”. The Centre attracts some of the best and brightest people in the field in the form of PhD students and visitors from overseas, creating a vibrant research environment. The University of York is widely recognized as one of the leading research universities in the UK and is also at the top of the teaching quality rankings.

CHE has an Athena SWAN Bronze award which recognises our commitment to good practice in recruiting, retaining and supporting the careers of women. We strive to provide a supportive culture and family friendly work environment and to offer equal opportunities to all staff members. We seek to ensure the policies and procedures in the department are fair and support good work practices for everyone.
The award

The award will cover academic fees at the UK/EU rate plus a maintenance stipend for 3 years (£15,009 in 2019/20). Non-EU/UK students will be expected to meet the cost of the difference between the UK/EU rate and the International (non-EU) rate.

Students are welcome to register full-time or part-time.

Eligibility criteria

To register in the Department of Economics, the ideal candidate will have (or be about to complete) a master’s degree in economics or a specialization within economics, with a substantial component in econometrics or a related quantitative subject. The English language requirement is IELTS: 6.5, with no less than 6.0 in each component.

To register in the Department of Health Sciences, please note the English Language requirement is a total IELTS score of at least 7 (or equivalent) with a minimum score of 6.5 in each component of the test.

Process for application

Applications should be made using the University of York on-line application process which can be accessed using the following link. [http://www.york.ac.uk/study/postgraduate/apply/](http://www.york.ac.uk/study/postgraduate/apply/). Select PhD in Economics on the application form, in order to be registered in the Department of Economics and Related Studies. Alternatively, select PhD in Health Sciences to be registered in the Department of Health Sciences. Insert reference CHE EEPRU PHD2019 in “How studies will be funded” field. Please also provide a curriculum vitae and two academic references. In addition, you should upload an outline of your intended approach to the area of research, noting the potential methods or approaches that could be used (Note that for this particular studentship you are only required to submit up to 500 words in PDF format). If you have already published academic papers, one of these may also be uploaded.

Applications should be received no later than Wednesday 31 July before 16.00h (UTC).

Shortlisted candidates will be interviewed. Interviews take place on Friday 23 August 2019.

At interview, candidates will be expected to give a short presentation on their proposed project including relevant literature, potential data sources and applicable methods. It should also focus on their plans for the studentship for which they have applied and the skills they would bring to their doctoral research.

Students residing overseas will be offered an opportunity to be interviewed using the video-conferencing eg ZOOM or SKYPE.