

## Call for application for 2 PhD positions under RBC-CLEAN-AIR(Africa) Project grant

### (Extended Application Deadline)

#### 1. Background

In collaboration with the University of Liverpool through the NIHR CLEAN-Air(Africa) Global Health Research Unit ([www.cleanairafrica.com](http://www.cleanairafrica.com)), the Rwanda Biomedical Centre (RBC) is launching a call for 2 PhD applications to be held at University of Rwanda.

CLEAN-Air(Africa) is a multi-national collaboration among seven research institutions from the UK and sub-Saharan Africa: University of Liverpool (UoL, UK), Kenyan Medical Research Institute (KEMRI, Kenya), Moi University (Kenya), Douala General Hospital (Cameroon), University of Dar es Salaam (Tanzania), Makerere University Lung Institute (Uganda) and RBC (Rwanda). Through this project, the Unit plans to implement a rigorous and diverse program of research and capacity building to tackle the global burden of disease from household air pollution (HAP) and accelerate adoption of clean cooking to address this burden under the Sustainable Development Goals (SDGs) time horizon of 2030, focusing on developing and supporting strategies under SDG7 namely: *“Ensure access to affordable, reliable, sustainable and modern energy for all”* in sub-Saharan Africa (SSA).

#### 2. Research Area

CLEAN-Air(Africa) aims to positively impact health, environment, climate and gender equality in Rwanda and sub-Saharan Africa by investigating technological and digital innovations to support rapid, scaled transition to clean modern household energy and through strengthening health systems in primary and secondary prevention of air pollution related non-communicable disease.

Specifically in Rwanda, research objectives to be addressed under CLEAN-Air(Africa) include:

- 1) To evaluate the potential positive impacts on non-communicable diseases and child ALRI from reductions in household air pollution through clean cooking. These health impacts can be assessed through objective measurement of exposure to air pollution (quantifying levels of PM<sub>2.5</sub>) for people using different fuels for cooking (polluting vs clean fuels).
- 2) To evaluate interventions to address barriers to sustained/ exclusive use of clean cooking fuels in households – required to achieve the health benefits from clean cooking. Interventions to reduce cooking times for long duration foods (a barrier



to use of gas for cooking) will be evaluated (for example pressure cookers). Research will assess more exclusive use of clean cooking fuels, time, fuel and cost savings to address health, environment, climate and gender impacts from transition away from reliance on polluting fuels.

- 3) To evaluate the positive impacts on air pollution, health and environment (deforestation) from transition of Rwandan schools to clean cooking (displacing reliance on wood fuel). Working within a national program of transitioning schools to clean cooking in Rwanda, CLEAN-Air(Africa) will measure the positive impacts of switching to clean cooking on health, environment and climate to provide supporting evidence for scale of clean cooking in Rwandan schools.

### **3. Call for application: PhD topics and structure**

The Rwanda Biomedical Center - Single Project Implementation Unit. (RBC-SPIU) is advertising a call for applicants for two full-time, fully funded PhD scholarships. The PhD program will be associated with the CLEAN-Air(Africa) Unit's wider research program that will begin by May 2023. The doctorates will fall under two disciplines:

- (1) PhD by Research in Public Health
- (2) PhD by Research in Epidemiology

The topics for these two PhDs will fall within the remit and objectives of the CLEAN-Air(Africa) Unit's wider research program and will focus on these themes:

- (1) The economic, well-being and gender impacts of transitioning to clean cooking fuels at the household-level
- (2) The health, economic, educational and environmental impacts of transitioning schools to clean cooking fuels;

The PhDs will be registered with the University of Rwanda (UR), under the College of Medicine and Health Sciences (School of Public Health). Interested candidates are invited to apply through the RBC/ UR application procedures detailed below.

### **4. Funding**

The PhD program is funded by RBC through the University of Liverpool/ CLEAN-Air(Africa) Global Health Research Unit sponsored by the National Institute of Health and Care Research (NIHR) in the UK.

Successful candidates will be funded for tuition fees, monthly living allowances, field allowances and any other research expenses, for the 3.5 years of the full-time program.

The PhDs will be registered with the University of Rwanda (UR) and interested candidates are invited to apply through the RBC/ UR application procedures detailed below.

### **5. Requirements**

Requirements for applications for the PhD scholarships include:





1. Having a Master of Science Degree in Public Health, Epidemiology, Environmental Health, Medicine, health economic, Business Administration or any other Health/ Biological Science for a PhD in Public Health or Epidemiology.
2. Able to submit a copy of the abstract of their Master's thesis as well as copies of their scientific publications.
3. Able to submit a research concept note in English relevant to the PhD degree sought and the topic areas described, to demonstrate applied thinking. The proposed topic and research questions may not necessarily be the final PhD project topic. The concept note should not exceed 2000 words. The concept note should clearly define the research problem, relevant research conducted so far to address the problem with annotated references, gaps in the current evidence base and research work to be done (methods) with justification. We expect clear articulation of objectives, methods, and indicate expected outcomes linked to the priority research areas (set out in section 2).

#### **6. Documents required for application/Application file**

- A cover letter indicating the motivation to join the PhD program.
- An up to date curriculum vitae (CV).
- Notarized Masters and Bachelor's degrees and transcripts.
- Recommendation letters from at least two academic referees who are knowledgeable about the applicant.
- Copies of valid identification card and/or passport.
- Applicants who studied in countries where English is not the main language must provide an English proficiency certificate (reading, writing, spoken) from a relevant body or institution in their respective countries.
- Research Concept note relevant to the PhD degree sought.
- Master's thesis abstract.
- List of any peer reviewed publications.
- Proof that you have applied for Equating Foreign Qualifications at higher educational council (HEC) of Rwanda for applicants from outside Rwanda and Rwandans who obtained their degrees outside Rwanda.

#### **7. Selection Criteria**

The selection of candidates will be carried out based on the submitted documentation by applicants. Only candidates who meet the entry requirements mentioned above and who will have submitted all the required documents will be invited to interview. Candidates who successfully pass the interview process will be recommended for admission.

#### **8. Important dates and notes**

Applicants are requested to submit the required documentation with their application by **25<sup>th</sup> March 2023**. Successful candidates are expected to complete registration and commence their studies by April/May 2023. Candidates are expected to complete the full-time PhD within the timeframe of the CLEAN-Air(Africa) program and in line with UR standards, by January 2027.



## How to Apply

Interested applicants are required to submit via email, **by 25<sup>th</sup> March 2023**, a complete application file in pdf format to the principal investigator Professor Claude Mambo Muvunyi, and make a copy to Jean Regis RWAKAYIRU and Jean de Dieu Ntivuguruzwa to the following addresses, using the email subject "RBC-CAA PhD Application":

[claudio.muvunyi@rbc.gov.rw](mailto:claudio.muvunyi@rbc.gov.rw)

[regis@rbc.gov.rw](mailto:regis@rbc.gov.rw)

[jeandedieu.ntivuguruzwa@rbc.gov.rw](mailto:jeandedieu.ntivuguruzwa@rbc.gov.rw)

**Note:** A candidate should submit only one application

Approved by



**Prof Claude Mambo MUVUNYI**

**Director General**

**Rwanda Biomedical Centre**