CALL FOR APPLICATIONS FOR RESEARCH GRANTS PROPOSALS RELATED TO THE ECOSYSTEM-BASED ADAPTION

As a part of strategy to realize its vision of becoming research led university, the University of Rwanda closely partners with different stakeholders to ensure optimization of support from members of its research ecosystem. As a result of such collaborative working relationship, the University of Rwanda has received a research grant from the Rwanda Environment Management Authority (REMA), aimed at establishing long term research program (LTRP) for climate change adaptation (CCA) in Rwanda. Thus, the related research activities to be undertaken will lead to the implementation of activities aimed at establishing long-term research program (LTRP) to inform long-term climate change adaptation (CCA) planning and implementation in Rwanda. The LTRP will bridge the knowledge gap to identify the appropriate climate change adaptation (CCA) interventions and to design adaptation strategy.

Main activity

The main activity is to conduct broader research and knowledge in priority areas of climate change adaptation and Ecosystem Based Adaptation(EbA) to contribute to well-informed policy-making.

Research Focus The program will focus on four important EbA related research areas namely: Biodiversity and natural resources that are of benefit to the local people Climate change adaptation strategies Biodiversity resilience for climate change Business models for engagement of private sector in EbA.

EbA Research Areas



Figure2: Important conceptual areas for research to support EbA of greatest priority is indicated by the numbers. The meaning of the number1-4 is indicated here below.

- 1. Priority: Transdisciplinary research linking all three EbA cornerstones.
- 2. Biodiversity benefits for people
- 3. Climate change adaptation strategies for people
- 4. Biodiversity resilience to climate change.

Research Area		Research questions
1. Multidisciplinary	Valuation and	What are the economic values of improved natural
linking all 3	economic issues	resource/ecosystem service provision resulting from the
cornerstones		activities?
		What are the benefits and costs of EbA interventions (see
		Section 4)?
		What are the incentives that can help drive EbA
		implementation in the long term?
		Are the adaptation interventions cost-effective in the long-
	T 1	term?
	Implementation	How can non-EbA projects best be converted into EbA?
		Which circumstances yield the best or most reliable
		outcomes?
		How can projects be made sustainable in the long term?
		(Including themes such as values around stewardship; legacy
		impacts; ownership and
		maintenance).
		and implemented under different conditions?
		How is the success of the interventions affected? By climate
		change?
	Monitoring and	What are the ke indicators to measure EbA effectiveness?
	Evaluation	Development of an evidence base on the outcomes of FbA
	L'unuution	initiatives
		What are the livelihoods benefits for EbA?
	Policy and	How to integrate EbA into different sectors e.g., urban,
	Planning	agriculture, health & biodiversity.
	0	How to best integrate EbA across scales of governance,
		including a specific focus on local municipalities and how
		EbA considerations may be mainstreamed and/or
		operationalised into development planning at this scale?
		Specific studies of cross-sectoral EbA, e.g., involving food
		security; pest management; drought or flood
		mitigation; invasive alien species control; bush
		encroachment.
		Alignment between EbA and existing policies.
		How can EbA projects contribute to poverty alleviation and
		job creation?
		How best to integrate $Eb\Delta$ with insurance considerations?
		Liability for outcomes of EbA projects.
	Capacity	What are the key capacity gaps for implementing EbA?
	building	What learning materials are needed (formal or informal)?

Table1: Proposed research questions per each research area.

		How can the value of ecosystem services be better	
		communicated?	
		How can different types of knowledge (including indigenous	
		knowledge, local ecological knowledge, citizen science) that	
		engage/originate from non-scientists be (better] utilised to	
		help address EbA research and practice needs?	
	Synergies and	Integrating EbA with Ecosystem-based Mitigation.	
	between co-	How can trade-offs be optimised?	
	benefits		
2. Biodiversity benefits	- What are the ecos	system services provided by targeted ecosystems?	
for people	- What are the impacts of BbA interventions on the quantity and quality of		
	ground and surface	e water sources? How does improvement in natural resources	
	management throu	gh EbA impact agricultural Productivity?	
	- What are the imp	acts of agroforestry on crop productivity under climate change	
	conditions?		
	- What are the mai	n adaptation benefits of improved natural resource	
	management?		
	- Which stakeholders benefit or are negatively affected by		
	the adaptation inter	rventions?	
	-Are there any unit	ntended impacts of the adaptation interventions (positive or	
	negative)?		
3. Climate change	- How is climate cl	hange impacting livelihoods and what are the projected	
adaptation strategies for	scenarios?		
people	- How is climate change impacting land use?		
	- Are the adaptatio	n interventions sustainable?	
	- Are interventions	gender sensitive?	
4. Biodiversity	- How is biodivers	ity impacted by the EbA intervention? If negative, what	
resilience to climate	mitigation measures are necessary?		
change	- What changes to the design of the intervention can be made to maximise the		
	biodiversity benefi	ts?	
	- What adaptation	impacts do the biodiversity benefits have for local	
	communities, inclu	iding farmers?	
	- What socio-econe	omic opportunities are provided by the	
	biodiversity benefi	ts of the interventions?	
	Have the intervent	ions resulted in the spread of invasive alien plant species?	
	-Development of a f	ramework to assess	
	biodiversity/ecosys	stem resilience to climate change.	
	-what are the limits	of ecosystem resilience to climate change impacts? Impacts of	
	change (Research or	n) Identification of desired future states of ecosystems and the	
	circumstances under	which they are preferred with appropriate 'back casting' to identify	
	strategies for achiev	ing those states. Conservations interventions to build resilience, e.g.	
	corridors.	6	
	-Do natural or near r	natural systems produce different benefits to artificial systems?	
	-Are the activities su	accessful in reducing encroachment and degradation of ecosystems?	
	E-or restoration inter	rventions, which species are the most productive under climate	
	1 of restoration inter		
	change conditions, a	nd	
	change conditions, a -Which species are u	nd insuitable?	
	-Which species are u -Are there any unint	nd insuitable? ended: environmental impacts (positive or negative)?	

-What are the impacts of agroforestry on soil biomass?
-How much water is being used as a result of restoration as a form of EbA?
-Are there any unintended impacts of the adaptation interventions (positive or
negative)?

For the purpose of ensuring that each category of people is given an opportunity to benefit from this

fund, proposals are invited from the University of Rwanda Academic staff as follows:

- i. Research grants for female academics
- ii. Research grants for academics who have completed PhD in the last 3 years.
- iii. Competitive research grants open to all academics.
- iv. Research grants for Transdisciplinary research linking all three EbA cornerstones (i.e; the team consists of colleagues from different disciplines who perform different, specialized functions).

A project proposal can be submitted to only one category of grants, and a researcher cannot be a PI in more than one proposal during the same period.

• Eligibility for funding

- i. A PI must be a holder of a PhD degree, and where the PI does not have a PhD degree but has a master's degree, the Co-Investigator (Co-I) must have a PhD degree. The PI must have a proven evidence of research activeness based on research publications.
- **ii.** Whenever possible, each research team must include at least one postgraduate student.
- **iii.** Whenever possible, each research team must have at least 1/3 of the opposite sex of the PI. In this regard, 30% of female team members should be respected whenever possible.
- **iv.** The research proposal should be aligned with at least one of the provided areas. This include the need for generating new knowledge (i.e fundamental or applied research) preferably using multidisciplinary approach.

• Non-eligibility:

- **i.** A **PI** who has an ongoing research project or abandoned research project funded through UR is not eligible.
- ii. To ensure equitable distribution of research funds among academic staff, it will take a minimum of three years for a PI who has completed his/her project to apply for a new project funding.

• Project duration

The duration for the funded project will be two (2) years, beginning from the date on which the PI receives the fund.

• Budget

The budget can include but not limited to following broad areas of research activities:

i. **Purchase of minor equipment and consumables** (e.g laptop, chemicals and reagents, stationery and other necessary gear). While the PI will keep the laptop for future research activities after registration in the UR asset register, other remaining consumables such as lab equipment, reagents and chemicals will remain in the laboratory.

- **ii. Data collection and analysis:** Laboratory and/or field work, data access and analysis will be done professionally.
- **iii. Preparatory meetings** with the stakeholders meant to build rapport and enhance ownership which is a foundation for research uptake.
- **iv. Research dissemination**: conference attendance, production of brochures, feedback to the stakeholders' events, etc.
- v. Meetings for managerial implications/policy brief presentation and discussion
- vi. Capacity building: Participate in specialised training
- vii. Other approved operational activities
- The grant application will be channelled through the PIs' Head of Department and endorsed by the College Director of Research and Innovation of the concerned college and submitted to the Deputy Vice Chancellor for Academic Affairs and Research using the following email addresses: <u>advisor.dvcaar@ur.ac.rw</u> and <u>advisor.dvcaar@gmail.com</u> with copies to the University director of Research and Innovation, Prof Bideri Ishuheri Nyamulinda, at <u>nbideri@yahoo.com</u>, the Dean of the School and the College Principal.
- Project Proposal Template (https://ur.ac.rw/?APPENDIX-3-PROPOSAL-TEMPLATE)

All applications must follow the format given attached to this call.

- Deadline for the submission of the grant proposals is 23rd December 2021.
- Include the following in your application:
 - i) A letter to the DVCAAR
 - ii) The completed application template
 - iii) Current CVs of the PI and all CO-PIs that include a list of current peer reviewed publications
 - iv) List of all research projects in which investigators on the team have been involved in (if any)

Done at Kigali on October 22,nd 2021

Prof Nosa Egiebor

Deputy Vice Chancellor for Academic Affairs and Research