



Science Granting Councils Initiative in Sub-Saharan Africa (SGCI)

Towards Effective Public-Private Partnerships in Research and Innovation

Research Grant Concept Note and Terms of Reference

1.0 Background

The Science Granting Councils Initiative in sub-Saharan Africa (SGCI) is a 5-year Initiative which aims to strengthen the capacities of Science Granting Councils (SGCs) in sub-Saharan Africa in order to support research and evidence-based policies that will contribute to economic and social development. The objectives of this Initiative are to strengthen the ability of Councils to (i) manage research; (ii) design and monitor research programmes based on the use of robust science, technology and innovation (STI) indicators; (iii) support knowledge exchange with the private sector; and (iv) establish partnerships between Councils and other science system actors. The Initiative is jointly funded by the United Kingdom's Department for International Development (DFID), Canada's International Development Research Centre (IDRC), and South Africa's National Research Foundation (NRF). The SGCI theme on Networking Africa's SGCs is being implemented by the African Technology Policy Studies Network (ATPS) in partnership with the Scinnovent Centre.

The SGCI in partnership with the African Union Commission and New Partnership for Africa's Development (AUC/NEPAD) convenes Annual Forums (AFs) that brings together African Councils and other key stakeholders to deliberate and develop interventions in strategic areas. The forums provide a unique opportunity for the SGCI to support and strengthen the voices and views of participating Councils; contribute to key STI policy debates at regional and continental levels that go beyond its four objectives; contribute to the implementation of the African Union Commission's (AUC) Science, Technology and Innovation Strategy for Africa 2024 (STISA-2024); contribute to new knowledge as a global public goods by commissioning state-of-the-art papers on key STI themes in order to facilitate sharing of lessons and "good practices" from across the world; provide a platform for sharing information, experiences and lessons amongst participating Councils, and with other STI system actors; and showcase its work to country representatives of the SGCI's funders, heads of government missions of funding countries, and other interested parties. The SGCI currently collaborates with 15 sub-Saharan Africa countries (Box 1). The overarching theme for the 2017 forum is: ***Towards Effective Public - Private Partnerships in Research and Innovation.***

Box 1: SGCI member countries

Botswana, Kenya, Rwanda, Uganda, Tanzania, Ethiopia, Côte d'Ivoire, Burkina Faso, Senegal, Ghana, Zambia, Mozambique, Malawi, Namibia, and Zimbabwe

This document provides guidelines on the Concept and Terms of Reference (ToR) for a research paper to be commissioned on the topic ahead of the Annual Forum in November 2017.

2.0 Objectives of the Commissioned Paper

The commissioned paper aims to explore issues of public-private partnerships in research and innovation and propose good practices from around the world to the Councils for increased economic growth and development in sub-Saharan Africa. The paper, guided by the authors' expertise, experience and current state of affairs will look into public-private partnership issues including but not limited to: challenges and opportunities of public-private partnerships in research and innovation; existing good practices around Africa and the rest of the world; the effect of policy and regulatory issues on the success of public-private partnerships; the role of government intermediaries – particularly the Science Granting Councils in catalyzing and facilitating public-private partnerships; mechanisms for stimulating private and public funding for R&D to realize increased rate of returns on investments; existing governance and accountability structures and how effective they support monitoring, learning and evaluation; and characteristics of public-private partnerships (PPPs) in the African context.

3.0 Contextualizing Public-Private Partnerships in Research and innovation for Africa's Development

African governments have widely recognised the role of Science, Technology and Innovation (STI) as a key driver towards achieving the goals of the African Union's Agenda 2063 and the Sustainable Development Goals (SDGs). Beyond this recognition, the African Union's (AU's) Science, Technology and Innovation Strategy for Africa 2024 (STISA 2024) provides a road map for the acceleration of Africa's transition to an innovation-led, knowledge-driven economy (African Union Commission, 2013). The STISA 2024 brings a stronger focus on the status of STI as the engine of Africa's transformation in terms of technical competence, human capital, infrastructure, enabling environment, innovation and entrepreneurial mind-set. Over the last decade, Africa has witnessed increased research funding commitments from national governments, increase in the rate of scientific production and innovation activities, emergence of new organizations that fund science, technology and innovation, and increasing cases of collaboration on cross-regional research. Many African governments have also made commitments to increase their gross domestic expenditures on research and development (R&D) to 1% as outlined in the 1980 Lagos Plan of Action.

As Africa articulates its vision on improving its research and innovation systems to provide an enabling environment for STI to drive socio-economic growth, discussions on strengthening partnerships between the public and private sector have been reignited. African governments have pledged their supports for partnerships as vehicle for achieving sustainable development and committed to "the development, coordination and sustaining of networks and partnerships at national, regional, continental and global levels" as outlined in the New Partnership for Africa's Development (NEPAD) agenda (NEPAD, 2013). At the Second Ministerial Forum on Science, Technology and Innovation in Rabat on 17 October, 2014, African countries' STI Ministers reaffirmed their commitments to STI development and to put steps in place to strengthen the catalytic role of public investment. This is achieved by mobilizing private investment through public-private partnerships and encouragement of private initiatives and entrepreneurship in STI to accelerate inclusive and sustainable growth. The Sustainable Development Goals (particularly goal 17) also emphasizes the role of partnerships (including public-private partnerships) as a key mechanism

towards achieving the new post-2015 development agenda and calls for scaling up and mainstreaming of public-private partnerships (UN, 2016).

In order to enhance the role of public-private partnerships¹ in socio-economic development and in support of Africa's STISA 2014, the Initiative seeks to identify, profile and analyze through case studies, practitioner interviews and literature studies, practical examples of where such partnerships have contributed to increased knowledge exchange and product developments between the public and private sector entities. The literature on public-private sector partnerships in STI places strong emphasis on the need for co-creation and exchange of knowledge and products with the private sector and to collaboratively mobilize investments for scientific research and innovation to address socio-economic development challenges (OECD, 2013).

4.0 Motivations

Why the Public-Private Partnerships?

The motivations for entering into public-private partnerships differ depending on each actor's interests. Such motivations include among others: access to knowledge, expertise, skills, networks and contacts; access to funding; improved stakeholder relations; improved reputation and credibility; increased operational efficiencies and effectiveness; creation of more appropriate services and products; access to and/or knowledge of new (future) markets; access to and more insight into business operations, current markets and supply chains; and increased leverage/impact (Rondinelli and London, 2003). Joint programming, knowledge transfer, research commercialization, and collaboration between universities, national research institutes and business communities can encourage stronger and productive partnerships between the public and private sector. Flourishing public-private partnerships has the potential to increase public sectors' responsiveness to the transformation of innovation processes and associated private sector needs and strategies, as well as enhance the translation of research results and outputs into innovations. Building public-private partnerships have been hailed as effective in solving societal development challenges by combining skills, competencies and expertise to overcome their individual limitations (Kania and Kolk, 2013). Public-private partnerships fulfil several other sustainable development functions including – knowledge production, information, innovation; dissemination of knowledge and good practices; technical implementation; institutional capacity building; standard setting, and certification; lobbying and advocacy; and technology transfer amongst others (Pattberg *et al.*, 2012).

5.0 Public-Private Partnerships in Research and Innovation: Experiences and Issues

Research conducted by the Organisation for Economic Co-operation and Development (OECD) in several member countries reveal long-term experiences in fostering public-private partnerships for research and innovation. Several programmes and organizations, including Knowledge Transfer Partnerships (KTPs) in the United Kingdom; Industry/University Cooperative Research Centers, (I/UCRCs) in the United States of America; Competence Centres for Excellent Technologies in Austria; the Swedish Competence Centres; and the 'Forschungscampus' programme (research campus) in Germany, among others have been established to strengthen the linkage between the public and private sectors to promote research and innovation. In Australia, the Cooperative Research Centres Programme (CRC) links and builds on outstanding research activities in the public

¹ Public-private partnership broadly emphasizes on the cooperative arrangement between a public agency (federal, state or local) and a private sector entity. However, the SGCI is interested in the linkages between the publicly-funded research entities such as universities and public research institutes (PRIs) on the one hand, and the industry, particularly the manufacturing sector, on the other hand.

and private sector through research cooperation achieved through the concentration of research activities in one location, or through effective methods of networking and strengthening research training (Australian Government, 2014).

As the numbers of Science Granting Councils in Africa grow and their influence on strengthening public-private partnerships for scientific research and innovation increases, discussions about these partnerships, their design, management and impact become essential in shaping the roles of Councils within national systems of innovation. Preliminary findings from baseline studies being conducted under the SGCI show that Councils in Africa are beginning to promote public-private sector partnerships. For example, the Ministry of Environment, Science, Technology and Innovation (MESTI) in Ghana has piloted five public-private sector collaborations bringing together universities and the private sector. The World Bank-funded Initiative provided competitive grants of up to US \$500,000 to universities and public research institutes for the establishment of “technology development and transfer centres” (TDTs) as new offices for private sector R&D collaborations, fund latter-stage applied research, facilitate technology transfer and facilitate capacity building for CEOs of the research institutions. In Kenya, the National Commission for Science, Technology and Innovation (NACOSTI) has been promoting multi-institutional, multi-disciplinary research involving public and private sector actors through its STI grants scheme. NACOSTI has also been piloting the University Research Chairs Programme with support from the International Development Research Centre (IDRC) since 2013. This Programme has so far established two research chairs in Health Systems and Technological Innovation in Manufacturing, which are designed to engender linkages with the private sector. Such partnership projects will ensure that the priorities of public sector research organizations are aligned with the needs of the private sector, thereby enabling knowledge exchange and use of research findings. The SGCI seeks to learn from and build on such programmes by introducing participating Councils to experiences and “good practices” that promote public-private partnerships.

6.0 Terms of Reference (ToR)

The commissioned paper could examine the following issues, however, the author(s) are invited to offer other suggestions that could effectively address the public-private partnership issues in sub-Saharan Africa: (i) assess when and under which conditions public-private partnerships have led to successful innovations, (ii) in cases where such partnerships have failed, what were the key lessons learnt in terms of initiation, design, and management? (iii) generate evidence to inform the practice of establishing and governing effective public-private partnerships geared towards addressing societal problems, and (iv) explore other partnership phenomena that deserve more research attention. The paper should delve deeper into the notion of public-private partnerships in research and innovation and its role in spurring innovative outputs, products, technologies and services that contribute to economic growth and societal welfare. More importantly, the paper should be based on practical experiences and case studies of either historical or contemporary partnerships in Africa and the rest of the world. The paper will propose successful experiences and “good practices” which can strengthen the intermediary role of Councils in fostering public-private partnerships. In order to bring experiences from different regions of the world, two authors from different regions of the world may team up to write this paper.

Potential questions that the author(s) could address include the following. The author(s) are however invited to refine these questions further, or suggest additional ones.

- i) How have public-private partnerships in research and innovation contributed to the translation of research outputs into new products and services?
- ii) What are the key characteristics of public-private partnerships (PPPs) in the African context?
- iii) What are the current challenges in achieving strong public-private partnerships in Africa?
- iv) What are the existing good practices of effective public-private partnership in Africa and around the world?
- v) What policies, practices and incentive structures are required in order to strengthen public-private partnerships in research and innovation?
- vi) What changes (for example, structural, institutional, roles, and mandates) should be made to enhance the capacity of Councils in catalyzing, facilitating and mediating public-private partnerships?
- vii) What analytical framework including performance measurements and indicators might be used by the Councils to assess the impacts of their public-private partnership programmes?

7.0 Research Methodology and Approach

a. Approach for delivering the commissioned paper

Interested authors will be invited to propose a methodology/ approach for delivering the paper. Such methodology or approach could draw from primary data, secondary data, as well as insights and experiences of practitioners and other experts.

b. Final draft

In addition to the final paper which will be presented at the Annual Forum, the authors are expected to produce a high-quality article (to be published in an international peer-reviewed journal) and a policy brief.

8.0 Process and Timeline for the Production of the Paper

- (i) An Expression of Interest and detailed CV(s) of potential author(s)
- (ii) An annotated outline of the commissioned paper with a detailed work plan
- (iii) Draft paper that will be submitted at various stages for reviews by the ATPS/Scinnovent Centre team after the authors have been selected
- (iv) Final paper that will be revised after presentation to the Annual Forum in November 2017
- (v) A draft article for publication in an international peer-reviewed journal to be submitted for reviews by the ATPS/Scinnovent Centre team
- (vi) One draft policy brief emanating from the paper to be submitted for reviews by the ATPS/Scinnovent Centre team

Deliverables	Timeframe
Selection and Contracting of authors(s)	15 June 2017
Submission of the 1 st draft paper	15 August 2017
Submission of the 2 nd draft paper	15 September 2017
Presentation of the paper during the 2017 Annual Forum	November 2017
Submission of the final paper	February 2018
Submission of draft article for publication in a peer-reviewed journal	February 2018
Submission of the final version of article for the paper	March 2018
Submission of 1 policy brief	February 2018

9.0 Submission of Expression of Interest, Detailed CV of Potential Author, Annotated Table of Content and Work Plan

The deadline for submission of the above mentioned documents is on or before **Wednesday, 31 May 2017 by 6:00 pm East African Time**. All submissions should be made directly via email to: executivedirector@atpsnet.org Submissions received after this deadline may not be considered. The successful candidate will be notified within one week after the deadline. Please note that the **Expression of Interest** should not exceed one page of an A4 paper, single spacing, font type- Times New Roman, font size- 11. The **CVs** should emphasize strongly the publications and previous work done by the author in the selected area of public-private partnerships in research and innovation. The **Annotated Table of Content** should be clearly written with proposed chapters, sections and subsections as the case may be. The **Work Plan** should align with the deliverables and timeframe already identified under Section 8 above.

10.0 Budget

A maximum budget of up to **US\$27,000.00** has been marked for this assignment. A team effort in the production of the Commissioned paper is highly recommended especially if coming from different regions of the world with Africa inclusive. We shall also cover the travel expenses for the main author to present the paper during the SGCI Annual Forum event scheduled for November 2017 in Livingstone, Zambia.

11.0 ATPS/SCINNOVENT Centre Input to the Process

- i) Provide relevant documents to the researcher as needed; and
- ii) Interact closely with the researcher and provide input and feedback as needed.

12.0 References

- African Union Commission (2013). African Union Science, Technology & Innovation Strategy for Africa 2024
- Australian Government (2014a). Cooperative Research Centres Programme Review. Discussion Paper. Canberra: Commonwealth of Australia.
- Kania, J. and Kolk, A. (2013). Partnerships as panacea for addressing global problems? On rationale, context, actors, impact and limitations. In M. Seitanidi & A. Crane (Eds.), *Social Partnerships and Responsible Business: A Research Handbook*, Routledge.
- NEPAD (2013). Annual Report. <http://www.nepad.org/download/file/fid/2932%20>. NEPAD Agency, Pretoria
- OECD (2013). Implementing research and innovation policy at the policy and institutional levels in Africa. Proceedings of Expert meeting. Programme on Innovation, Higher Education and Research for Development (IHERD). Available at [https://www.oecd.org/sti/Final Addis%20summary.pdf](https://www.oecd.org/sti/Final_Addis%20summary.pdf)
- Pattberg, P., Biermann, F., Chan, S. and Mert, A. (2012). *Public-Private Partnerships for Sustainable Development. Emergence, Influence and Legitimacy*, Cheltenham: Edward Elgar.
- Rondinelli, D.A. and London, T. (2003). How corporations and environmental groups collaborate: assessing cross-sector alliances and collaborations. *Academy of Management Executive*, 17(1): 61-76.
- UN (2016). Sustainable Development Goal 17: Revitalize the global partnership for sustainable development <http://www.un.org/sustainabledevelopment/globalpartnerships/> *United Nations* New York.