Regional Universities Forum for Capacity Building in Agriculture
Secretariat Quarterly Report

1st January- 31st March 2020

Summary

This report is a synthesis of key achievements and progress made during the period 1st January- 31st March 2020 (the third quarter of the Financial Year 2019/2020, and the second year of implementing the operational plan, 2018-2022 of RUFORUM Vision 2030). The Operational Plan is designed around four (4) flagship programmes underpinned by activities to support regional collective action and learning to give impetus to achieving the RUFORUM vision for vibrant transformative universities catalyzing inclusive agricultural development to feed and create prosperity for Africa. The four flagship programmes are:

- Transforming African Agricultural Universities to meaningfully contribute to Africa’s Growth and Development (TAGDev) seeks to transform African agricultural universities and their graduates to better respond to developmental challenges through enhanced application of science, technology, business and innovation for rural agricultural transformation.
- Cultivating Research and Teaching Excellence (CREATE) seeks to realign universities’ research and teaching functions into a more integrated model with a focus on problem solving and enhancing the capacity of the entire university academic practice and outreach system mainly.
- Regional Anchor Universities for Higher Agricultural Education (RANCH) seeks to escalate the setting up of a network of linked universities as African anchor universities/African centres of excellence and academic leadership in agricultural higher education and learning.
- Knowledge Hub for University Networking, Partnership and Advocacy (K-Hub) builds on RUFORUM’s convening power and facilitates the creation, capture, organising, sharing and refining of information and content across teams and geographic locations – thus increasing access to latest evidence based information and knowledge.

Below are the highlights of progress made:

1. The Republic of Ghana signed the RUFORUM Charter becoming the fourth African Country to officially endorse RUFORUM’s continental role in Higher Agricultural Education, Science, Technology and Innovation (the others are Sierra Leone, eSwatini and Liberia). The Secretariat continues to dialogue with African Governments to secure the endorsement of the RUFORUM Charter.
2. The Ministerial Communique, one of the outputs of the Ministerial Policy Dialogue hosted during the 15th RUFORUM Annual General Meeting held in the University of Cape Coast, Ghana was signed by 18 African countries and shared with Vice Chancellors of RUFORUM Member universities and the general public.
4. Under the same FAO-RUFORUM Letter of Agreement, the Secretariat contributed in the third Annual General Meeting Assembly of the Eastern African Parliamentary Alliance of Food Security and Nutrition to co-facilitate capacity building and knowledge sharing on the current food Security and nutrition policy and legislation landscape in Eastern Africa and opportunities for legislators’ actions to achieve the right to food. The meeting provided opportunity for RUFORUM to offer some of its delivery models to the Intergovernmental Authority on Development (IGAD) and Parliamentary Alliance to support innovations and technology transfer to rural communities for increased agricultural productivity, value addition and business creation.

5. The Secretariat developed a draft manuscript of ten chapters documenting the stories and experiences of TAGDev supported students at Gulu and Egerton Universities sowing Agri-entrepreneurship in African Universities.

6. In partnership with Enterprise Uganda, the Secretariat facilitated training of 35 academic staff at University of eSwatini in entrepreneurship to support agribusiness incubation training at the university. In addition, thirty five (35) graduate and undergraduate students were trained on enterprise development.

7. Eleven (11) of the 14 students that completed Masters studies at Gulu University disseminated technologies and innovations emerging from their research with 1,382 direct beneficiaries to support the delivery of complementary extension services through Field Attachment with various institutions and smallholder communities.

8. Nine additional placements under the RUFORUM Graduate Teaching Assistantship (GTA) Programme were supported during the quarter. A total of one hundred and thirty three (133) GTA placements from 37 Universities in 25 African countries have been facilitated to increase the pool of PhD trained faculty in African Universities.

9. Eleven PhD students from seven African countries (Burundi, Ethiopia, Ghana, Kenya, Malawi, Uganda and Zambia) completed their studies and graduated, adding to the pool of PhD trained staff in African Universities and research institutions. They have all returned to their home countries and are employed.

INTRODUCTION:

The narrative below shows details of RUFORUM Secretariat’s progress and achievements made during the period 1st January- 31st March 2020, the third quarter of the financial year 2019/20. The report is arranged by Flagship Programmes of the RUFORUM Vision 2030.

Flagship programme: TAGDev-Transforming African Agricultural Universities for Africa’s Growth and Development

a) Recruit students (PhD, MSc, BSc and TVET students) to create Africa’s new age of development practitioners and cadres

The Secretariat recruited seven (4 Male, 3 female) additional Masters students, 1 PhD (Male) and 37 undergraduate (27 male, 10 female) students at Egerton University to support effective delivery and engagement with the communities whilst supporting access to higher education among disadvantaged students. This brings the total to 383 students at undergraduate (194), Master (172) and PhD (17) levels facilitated to access higher education with support from the Mastercard Foundation. Of these, five students
have completed their Master’s degree studies at Gulu University-Uganda, bringing to total fourteen (14) students supported who have completed their studies under the TAGDev flagship at five universities namely Gulu University (5), Bindura University of Science Education (1), University of Abomey-Calavi (3), University of Nairobi (2), and University of Cape Coast (3). An additional nine students with support from RUFORUM Nurturing grant completed Masters studies at Gulu University.

b) **Scale-out agribusiness incubation centers and accelerators (at least 11 new Agribusiness incubation hubs) at selected BTVET institutions, universities and communities to engage Africa’s youth in innovation and investments in agriculture**

In this quarter, one incubation hub was operationalised at University of eSwatini to *Improve livelihoods through employment creation in agro-processing and associated value chain in the Kingdom of eSwatini*. Incubation hubs are part of the RUFORUM Entrepreneurship Challenge Program (RECAP) that aim to strengthen university entrepreneurship education and impact by supporting the development/ strengthening of Agri-Enterprise Innovation Hubs (AIHs) at universities to support the development of agricultural enterprises through entrepreneurial skills development. Fourteen (14) agribusiness incubation hubs are fully operational in 14 Member Universities including University of Abomey-Calavi (Benin), University of Burundi (Burundi), Université Catholique de Bukavu (Democratic Republic of Congo), Haramaya University (Ethiopia), University of eSwatini (eSwatini), University of Cape Coast (Ghana), South Eastern Kenya University (Kenya), Bishop Stuart University, Busitema University, Makerere University, Muni University, Ndejje University, Uganda Christian University (Uganda) and University of Juba (South Sudan).

The RECAP projects have to-date supported 471 students (177 female, 294 male) to establish businesses both within the University campus and outside with varying levels of success. For instance, under the “Building the capacities of agricultural students in entrepreneurship and leadership to improve their professional insertion” RECAP at University of Abomey Calavi, 14 enterprises are operational with seven operating outside the University campus. At Egerton University out of the 16 enterprises incubated under the *Empowering Kenyan youth through agrienterprise incubation for improved livelihoods and economic development (AGLEAD)* RECAP, 11 successfully operate out of the university, three within the university, one is inactive and one failed. These student enterprises are employing from one to 20 employees besides the students-young entrepreneurs themselves.
c) **Support field attachment of students (both MSc and BSc) to communities for experiential learning and further enhance the delivery of complimentary agricultural advisory services through Field Attachment Program Awards (FAPA)**

A total of 11 students (5 female, 6 male) out of the 14 that completed Masters studies at Gulu University were supported to undertake field attachments to disseminate research findings, enhance linkage with public and private sector and increase their experiential learning. Three students were placed at the International Crop Research Institute for Semi-Arid Tropics (Nairobi) whilst the other eight were placed at various local government and Non-Governmental Organizations in Northern Uganda. Technologies disseminated by the students as part of this initiative included: utilization of cassava or cassava processing by-products for the animal feed industry in Coastal Kenya; improved cassava varieties through the minisetts technology to smallholders in coastal Kenya; and the Indigenous Microorganisms technology (IMO). Further, nine students at the University of Nairobi engaged with smallholder cassava farmers in Taita Taveta and Kilifi counties in Kenya in technology, innovation and management practices delivery as well as development of cassava based agribusinesses with rural farmers.

a) **Support the integration of University teams in interdisciplinary and multi-agency research through Community Action Research to strengthen commodity value chains for smallholder farmers and agribusinesses**

Following two years of investment in clean seed potato production, Egerton University and Baraka Agricultural College were recognised as certified seed potato merchants by National Potato Council of Kenya and the Kenya Plant Health Inspectorate Services (KEPHIS). These are important milestones in the transformation of institutions of learning. Further, the sixteen (16) community action research programmes operational in fourteen (14) Universities and ten (10) African nations have continued to support 58,000 rural smallholder farmers with relevant technologies, innovations and management practices. The CARP projects continue encouraging universities to develop and invest in more comprehensive and sustained action research in a particular geographical area or in a selected commodity along the full value chain. Students within the CARP projects are valorising their research results into business opportunities. For example:

Students from the University of Cape Coast under the Pineapple CARP project started Fruition Crushed, a value addition enterprise producing juices from the produced pineapples by the project and farmers engaged in the project implementation.

The Cassava CARP+ project at the University of Nairobi has led to good cassava yield in Kilifi and Taita Taveta counties estimated at 50 metric tonnes per hectare. Further, the incubator created under the Cassava CARP has incubated eight student enterprises along the cassava, guava and bee value chains. These enterprises include; MuMiSET Company Limited providing disease free certified cassava planting material; CASSAVA
ECONET Company focused on logistics, bulking and primary processing of cassava; CAV STARCH LTD producing cassava starch to meet the market for starch; EHENA FOODs focused on producing healthy, high quality consumables from cassava to the diverse market; DUKE Enterprises focused on producing six guava products which are in the process of being patented, trademarked and commercialised. These have been successful in securing investment from one of the highly competitive national pitch competitions to support their business acceleration. The students have also developed a services tool, the MUHOGO TIBA focused on delivering extra value by leveraging and exploiting existing ecosystem gaps using ICT specifically artificial intelligence driven diagnostics of bacterial and viral diseases (data driven).

**d) Synthesize and publish lessons emerging out of the implementation of CARP+ and RECAP**

As part of documenting progress, personal reflections and sharing lessons of implementation from the students supported under CARP+ and RECAP projects, a total of 14 feature stories were produced and shared through RUFORUM publication channels. These included: socio - economic factors that influence adoption of clean seed potato (*Solanum tuberosum*) by small scale farmers in Ngoro, Kenya; enhancing pig production and marketing for smallholder farmers in northern Uganda (EPMSNU); go and serve the community" is my mantra as i give back after education; laying foundation for strengthening delivery of quality packed milk in northern Uganda; former RUFORUM Mastercard foundation scholar at Gulu University enhances community knowledge and uptake of indigenous micro-organisms (IMO) technology in Kitgum district, northern Uganda; and, Gulu University program curriculum is not merely academic but for community transformation.

**e) Develop the professional capacity of university and TVET staff to implement new and revised curricula and education models**

An entrepreneurship training targeting academic staff at University of eSwatini was undertaken for 35 staff as part of retooling and skills enhancement to support agribusiness incubation training at the University. The training focused on enhancing personal financial literacy, equipping staff with knowledge on preparation for retirement, growing personal income and personal investment as they support student enterprises growth. This is expected to boost staff perceptions and attitudes towards entrepreneurship for individuals and within the university.

**f) Finalize a book on agricultural tertiary education in Africa**

Progress on the book on agricultural tertiary education continues albeit at a slower pace than expected. The editors are working to provide the final manuscript during the course of this year. The book is expected to provide vital information to policy and decision leaders about the reforms and investments needed within the agricultural tertiary education sector and how higher education can and should contribute to the transformation of agriculture on the African continent.

Besides the targeted agricultural tertiary education in Africa book, a draft manuscript of the TAGDev stories of young Africans sowing Agri-entrepreneurship in African Universities has been developed. This book comprises eight chapters documenting the stories and experiences of TAGDev supported students at Gulu and Egerton University that are undergoing training as agricultural change makers.
g) **Explore opportunities for targeted support to strengthen lower levels of education value chains and for increasing youth employability**

As part of strengthening the educational value chain, RUFORUM supported the skills enhancement of 42 primary (28 male, 14 female) and 60 secondary school teachers (38 male, 22 female) in post conflict communities in eastern and northern Uganda. The teachers gained skills in enhancing and tracking academic performance, monitoring of course delivery and mentoring of female students. These efforts were aimed at improving academic performance and promoting retention of the girl child in school. Further, with the technical support from Gulu University, an agribusiness and value addition training for 36 producers and processors of Shea nut, honey, grain and groundnuts was undertaken for youth in Northern Uganda to increase product quality and catalyze business growth.

h) **Organize the third Young African Innovators competition**

Twenty (20) young African Entrepreneurs from West Africa were awarded prizes in December 2019 and already a number have commenced implementation of business projects. Some of the earlier cohorts have continued to shine in other competitive programmes.

- Mr. Anthony Owei, ePoultry emerged as a winner in the Entrepreneur Africa Prize for Agriculture held in Lagos-Nigeria.
- Mr. Michael Olusanya, Greenway International Foundation, manufacturers of custom-made reusable drinking straws has seen a 45% increase in sales with the US$2000 prize award from RUFORUM.
- Mr. Idoko Nnaedozie, SOLARFRITZ Nigeria has been able to set-up the production facility fit with a recycling plant installations that is able to recycle plastics, rice husks, sawdust into smokeless cooking pellets thereby diversifying their products portfolio; (i) solar coolers, (ii) solar dryers, and (iii) smokeless cooking pellets.
- Ms. Jatta, Suunka Transportation and Logistics Ltd, a young innovator from the Gambia has seen her dream turned into a reality. Her online mobile application for logistics coordination is now fully operational and active on google play (Taxi Man Driver).
- Mr. Ante Joseph (Maatah Nasah Ltd) has been able to expand his enterprise, constructed a lapping system technology for prototyping, secured probiotics and activators and signed a deal with CHC Agri-tech to supply meats for Shoprite in Abia and Imo State, Nigeria. As a result, the company has been able to realise a growth in revenue and is able to meet all the overall running costs including staff salaries. Mr. Ante has received two grant awards, and an Ambassadorial Award, building onto the RUFORUM Award. Mr. Joseph Ante (Nigeria) notes that “when you pitch and tell a judge that you were among the top 20 African Entrepreneurs they are like, I think this guy is doing quite well…” Thus, the Young African Entrepreneurs Competition is serving the rightful purpose as envisioned, a platform for young entrepreneurs that will enable them be exposed to the global business opportunities.

From Cohort II, Young African Entrepreneurs have continued to build a solid base for success. Ms. Nabuma Shamim, Community Dental and Reproductive Health has been recognised in the Forbes Africa 30 under 30 as the emerging young entrepreneurs and change agents for Africa (Ms. Shamim is the second lady standing in the picture).
Emerging lessons and issues

1. Timely completion of postgraduate studies is possible under conditions of supportive university administration, committed students and financial support/scholarship as well as provision of extra student support and enrichment services.

2. It is possible for universities to influence research, innovation and institutional transformation processes through multi–stakeholder collaborative projects. Private sector partners are willing to co-finance research and community outreach work when given an opportunity and a structured way of partnership.

3. The Community Action Research Programme is an appropriate tool to strengthen university-community linkages and potential to influence commodity value chains and economic development.

Flagship programme: RANCH: Regional Anchor Universities for Higher Agricultural Education

a) Support Universities to pursue partnerships with industry to spin out start-ups based on commercialisable research outputs and knowledge products

Within the CARP+ and RECAP framework universities are engaging with 61 private sector partners in technology development and valorization. In addition, five CARP+ students are being supported to commercialize results of their research under the Field Attachment Programme Award (FAPA-Business). These students are commercializing components of pineapple, cassava, baobab, sesame and ground nut value chains among others. This is part of RUFORUM’s commitment to advance the development of the innovation led bioeconomy.

b) Support establishment of Regional Anchor Universities

In addition to the Strengthening Higher Agricultural Education in Africa (SHAEA) initiative that is yet to be operationalized, the Meeting of African Ministers held on 5th December 2019 in Cape Coast, Ghana agreed to establish Regional Training Centres/Centres of Excellence in Science, Technology and Innovation. This will be in addition to the African Higher Education Centres of Excellence. The Secretariat is working with the member university governments to develop regional initiatives for operationalizing the Ministers’ decision.

Emerging lessons and issues

The advancement and success of this flagship will largely depend on the interventions by Member University governments. Secretariat and Member Universities should therefore continue to engage with their governments. A proper understanding and appreciation of Government administrative processes is essential both for reaching out to potential funders and for creating partnerships for support.
Flagship programme: CREATE-Cultivating Research and Teaching Excellence

a) Facilitate Academic Staff Development (ASD) through the Regional Academic Mobility (RAM) and Graduate Teaching Assistantship (GTA) programs

During the quarter, nine (4 Males and 5 Males) academic staff from six universities including University of Liberia (2), Mbarara University of Science and Technology (1), Botswana University of Agriculture and Natural Resources (2), University of Nigeria Nsukka (1), Njala University (1) and Université Evangélique en Afrique (2) were supported to undertake PhD studies. Cumulatively, 133 GTA (93 male, 40 female) from 37 Universities have been successfully placed in 25 universities. Two hundred and eighty nine (289), (217 male, 72 female) academic Staff from 35 Universities are still awaiting placement. See details in the implementation update here

GTA Participating Countries: Sending and Hosting as at 30th March 2020

To Deepen Early Career Engagement to Support Enrollment and Research Capacity for African Universities and enhance interconnectedness of African Universities, the Carnegie Corporation of New York has provided a two-year grant. The grant will support research for 40 Graduate Teaching Assistantships, 10 Post-Doctoral fellowships, and 10 Staff exchanges and mobilities within RUFORUM member universities.

b) Develop mechanisms for increasing the participation of Women in science, technology and innovation (ST&I) interventions in RUFORUM member universities

RUFORUM continues with the commitment to follow up the recommendations made by the Forum for Women Vice Chancellors in Africa and the 15th RUFORUM AGM Ministerial Policy Dialogue to increase
the pool of women scientists in African Universities and other research and development institutions. New fellowships and research grants initiatives have adopted the 50% opportunity for female applicants. This is the initial step towards capturing the female unique attributes in research and higher education. Efforts are also ongoing to mobilise resources to increase the pool of doctoral trained academic staff in African universities and research institutions, paying particular attention to increasing the pool of women scientists and training for fragile States (see also section below).

c) **Escalate doctoral training to increase the pool of science leaders in Africa**

During the quarter, eleven (11) PhD students (7 Male, 4 female) supported by RUFORUM and the Carnegie Corporation of New York (10) and the German Academic Exchange Service (DAAD) (3) completed studies at Jomo Kenyatta University of Agriculture and Technology (1), Lilongwe University of Agriculture and Natural Resources (LUANAR) (1), Makerere University (6), Stellenbosch University (2), and University of Port Harcourt (1).

Two hundred and seventy eight (278) PhD students (110 female, 168 male) are still undertaking studies and continue to be monitored through the RUFORUM Information Management System, grantee reports and field monitoring processes. The figure below shows the statistics of those under training

![Number of continuing PhD students under the different grants awarded by RUFORUM](image)

\[\text{Number of continuing PhD students under the different grants awarded by RUFORUM}\]

\[\text{Carnegie II Graduate Research Grants}\]
\[\text{Carnegie Post-Docs}\]
\[\text{Sentinel DAAD CARP+ Nurturing grants}\]

\[\text{Total} \quad \text{# Female}\]

\[\text{Carnegie II} \quad 79 \quad 27 \quad 38 \quad 52 \quad 27 \quad \text{Total} \]
\[\text{Graduate Research Grants} \quad 73 \quad \text{Total} \]
\[\text{Carnegie Post-Docs} \quad 20 \quad \text{Total} \]
\[\text{Sentinel} \quad 27 \quad \text{Total} \]
\[\text{DAAD} \quad 23 \quad \text{Total} \]
\[\text{CARP+} \quad 16 \quad \text{Total} \]
\[\text{Nurturing grants} \quad 7 \quad \text{Total} \]

\[d) \quad \text{Provide opportunities for postgraduate training for students from fragile States and other disadvantaged communities}\]

RUFORUM is presently supporting the training of 68 students (30 Male, 38 female) from conflict and post conflict countries of Burundi (1), Cameroon (2), Democratic Republic of Congo (1), Liberia (2), South Sudan (1), Somalia (1), Sudan (48) and Zimbabwe (12) to undertake Masters (67) and PhD studies (1) studies at Bindura University of Science Education (11), Gulu University (7), Egerton University (2), Peace University (12), University of Kordofan (12), University of Gezira (12) and University of Khartoum (12). Other students are being trained through the RUFORUM Entrepreneurship Challenge Program (RECAP) at the University of Burundi (Burundi), Catholic University of Bukavu (DR Congo), Haramaya University (Ethiopia) and University of Juba (South Sudan). This effort is supporting 200 students in enterprise development.
e) **Provide opportunities for Masters and PhD graduate students to share research findings, to obtain mentorship support, skills enhancement and to engage with scientists in the agricultural and education space**

In this quarter, four short skills enhancement trainings were undertaken including the training of eighty (80) students at Gulu University in communication, documentation and networking as well as a research proposals development and data analysis training (AMOS and STATA) for 43 students (17 females, 26 males). At Egerton University in Kenya two short skills enhancement trainings were conducted: (i) Financial Management and Financial literacy in partnership with Kenya Commercial Bank for 58 students (24 females, 34 males), and (ii) Communication and advocacy training with focus on documenting and profiling research projects and personal branding for 64 students (31 males, 33 females).

f) **Support the implementation of RUFORUM Post-Doctoral Fellowship Programme**

The Post-Doctoral fellowships programme is aimed at strengthening capacity of African universities and research institutions to meet the growing knowledge generation quest for transformation, wealth creation and development. During the quarter, six Masters (1 female, 5 Male) and seven undergraduate (3 female, 4 male) students attached to the Post-Doctoral fellowships at the University of Zimbabwe (2 Masters, 1 undergraduate) and University of Abomey-Calavi (6 masters, 4 undergraduate) completed studies. A total of forty two (42) PhD, 69 Masters and 19 undergraduates are undertaking studies under the 19 Post-Doctoral fellowships. The Post-Doctoral Fellows have generated several outputs including 21 peer reviewed publications focusing on; integrated weed management, agribusiness management, breeding for resistance against major crop pests, agricultural extension, and natural resources management. Some of the publications include; Translating natural language to SPARQL (Ochieng, 2020); and, Cowpea resistance to legume pod borer (Maruca vitrata Fabricius): genetic advances, challenges and future prospects (Sodedji et al., 2019). Some of the technologies, innovations and management practices generated include botanical fungicide (botanical extracts of neem and lantana) for controlling late blight of tomato in Zimbabwe; cowpea breeding programme at the University of Abomey-Calavi established for improvement of the crop; 14 bean accessions resistant to bruchids in Benin; GIS and Remote Sensing Based Land Suitability Assessment Map for Wheat Production in Zambia; Chatbot- a tool that is able to have a conversation with a farmer as it diagnoses his/her problem in Kenya; SPARQL Algorithm in Kenya; and, goat breeds resistant to diseases and especially to peste des petits ruminants in Democratic Republic of Congo.

The Secretariat is working with the Fellows to document the lessons learnt during this pioneering phase of the Fellowship programme. A new round of call for Fellowships will be issued in April 2020 under the recently approved Carnegie Corporation of New York supported grant.

**Emerging lessons and issues**

1. Continued monitoring of students’ progress is essential for the timely completion of doctorate studies under the different programmes. Cross-institutional mentorship and staff support will play an important role to strengthen both the research capacity of the PhD students, early career and young academics to become effective academic leaders in their institutions.

2. The GTA programme has the potential to increase continental and regional staff mobility. As a home-grown initiative it will promote south to south cooperation and joint academic offering over and above the graduate studies program for staff.
Flagship programme: K-HUB-Knowledge hub for university networking, partnership and advocacy

a) **Widen and enhance online and offline Information Technology (IT) platforms to facilitate and enhance systematic access to information through continuous analysis of user requirements**

The Secretariat has revamped its Information Management System (RIMS) to facilitate the K-Hub flagship to create, capture, organize, share and refine information and content across teams and geographic locations – thus increasing access to the latest, up-to-the-minute, evidence-based information and knowledge. The new RIMS (see figure below) is currently hosted with Amazon Web Services (AWS) and has additional modules focusing on project management, scholarships and the planning, monitoring and evaluation.

Online platforms including Social media platforms continue to be a publicity and information dissemination mechanism to reach out to RUFORUM stakeholders. Platforms such as Facebook-22,361 followers, Blog-10,845 followers and 654,520 hits, and Twitter-7,215 followers; RUFORUM website; and MCF@RUFORUM website provide a one-stop centre for updates on scholarship calls, grants and news. New project websites including the Forum for Women Vice Chancellors in Africa (FAWoVC) website were developed. The RUFORUM website registered 95% new visitors while the rest (5%) were returning visitors mainly from United States of America (57 %), Uganda (12 %), Germany (8 %), Japan (3.4 %), United Kingdom (3.2 %), China (2.6 %), Cayman Islands (1.5 %), Romania (1.06 %), Kenya (0.85 %) and Switzerland (0.64 %),

New visitors hits by country Jan–March 2020
The Secretariat published ten editions of the RUFORUM Weekly News digest, policy briefs and twenty six (26) storylines through the Blog:

i. Kerio Valley: A beautiful land with an amazing culture
ii. Experiences with Marakwet and Pokot Communities in Kerio Valley, Kenya
iii. Press Release: new appointments within the RUFORUM Network
iv. Press Release: first cohort of masters students supported by Mastercard foundation through TAGDev graduate at Gulu University
v. Press Release: RUFORUM admits 21 new Universities to join the Network
vi. Former RUFORUM mastercard foundation scholar at Gulu University enhances community knowledge and uptake of Indigenous Micro-organisms (IMO) technology in Kitgum district, northern Uganda.

vii. Cassava offers under exploited alternative livestock feeds to farmers in Kilifi and Taita Taveta Counties, Kenya
viii. Learning with and from smallholder cassava farmers of Kilifi and Taita Taveta counties, Kenya
ix. “Go and serve the community” is my mantra as I give back after education
x. The origin or language of a student should not hinder access to higher education: Uniqueness of MCF-RUFORUM scholarship
xi. Dr Symphorien Agbahoungba’s Post-Doctoral fellowship experience under RUFORUM and what it means for his career and Country Benin

xii. Dr. Gabriel Karubanga a Post-Doctoral Fellow shares his engagement at Makerere University
xiii. Generation of future science leader through mentorship and research: experience under the Carnegie Post-Doctoral fellowship

b) Facilitate universities to deliver relevant and practical training exploiting the latest electronic means to deliver and enhance the student learning experience

In collaboration with Mohammed VI Polytechnic University (UM6P), the Secretariat undertook a survey to identify possible courses for online content development and delivery. Six courses will be identified to serve as pilots for development of African tailored Masters courses to be delivered as massive open online courses (MOOCs).

c) The 16th RUFORUM AGM 2020 in Morocco

Progress has been made in the preparation of the 16th RUFORUM Annual General Meeting (AGM) 2020 in Morocco. In February 2020, a RUFORUM team led by Executive Secretary held joint meetings with OCP Morocco and Mohammed VI Polytechnic University (UM6P) in Ben Guerir. The meeting confirmed that the 16th AGM will be held 18th to 20th November 2020 at the Ben Guerir Mohammed VI Polytechnic University (UM6P) Campus. The RUFORUM 2020 AGM will provide opportunity for greater visibility of Morocco, UM6P and OCP in Africa; this is also in line with the OCP President aspiration to see African scholars meet, interact and share ideas for African Development. The AGM will help introduce RUFORUM to North Africa, especially providing opportunities to link Moroccan universities to other African universities.

It was further agreed that the focus of the AGM will lean towards university- private sector engagement. It will thus include interactive sessions with senior policy leaders and private sector leaders to leverage partnership and collaboration to support Africa’s Universities Agenda for Higher Agricultural Education, Science, Technology and Innovation (AHESTI).
The Regional Universities Forum for Capacity Building in Agriculture (RUFORUM) Secretariat continues to monitor the COVID-19 situation and its implication on the hosting of the 16th AGM in Morocco.

d) **Examine the knowledge priorities of the network stakeholders and the extent to which the RUFORUM knowledge products and services meet the objectives of the relevant RUFORUM strategies**

During the quarter, the Secretariat undertook analysis of the survey results on ICT Capacity and Knowledge priorities of the RUFORUM Network, which was administered in the past six months. A detailed report will be shared separately. Preliminary results however indicate that although most universities (70% of the respondents) have an ICT Strategic Plan in place and eLearning policy (55% of the respondents), only a few universities (as indicated by 36% of the respondents) provide incentives to staff for the use of eLearning in teaching. A follow-up survey will be undertaken to further examine the reach and impact of the RUFORUM knowledge products. Once finalized, the study will provide lessons to improve RUFORUM's knowledge management function.

**Emerging lessons and issues**

RUFORUM online platforms including the Online Impact Portal and database, higher agricultural education capacity indicators (HAECI) portal, Management Information System (MIS), knowledge repository, website and blog, and digital communication and social media platforms are a strong outreach tool not only on the African Continent and the member universities but for different stakeholders across the globe. They should therefore be structured both as a research and activity dissemination as well as publicity instrument.

**Flagship programme: PROGRAM SUPPORT – Technical, administrative and logistical support**

a) **Convene the 15th RUFORUM Annual General Meeting (AGM), meetings of the Board and its committees- the Finance and Administration Committee, International Advisory Panel (IAP), Technical Committee (TC) and the Committee of Principals and Deans to guide the network to fulfil its corporate mission**

During the quarter, the Secretariat continued to publish storylines emerging from the 15th RUFORUM Annual General Meeting held 2-6 December 2019 at the University of Cape Coast, Ghana. Amongst these included;

i. [Country Statements and Ministerial Communique from the Ministerial Policy Dialogue Round Table held during the 19th RUFORUM Annual General Meeting in Ghana](#)
ii. [Lessons and innovations shared by RUFORUM Principal Investigators during the 15th Annual General Meeting in Cape Coast-Ghana](#)
iii. [Stakeholders in Agriculture, Education, Science, Technology and Innovation discuss Universities’ Contribution to Continental Agenda 2063](#)
iv. [The Outcomes of the Official Opening of the 15th RUFORUM Annual General Meeting at the University Cape Coast, Ghana](#)
v. [15th RUFORUM Business Meeting at the University of Cape Coast in Ghana](#)
vi. [How the University of Cape Coast and the Regional Universities Forum for Capacity Building in Agriculture wrapped up the 15th RUFORUM Annual General Meeting](#)

vii. [Lessons and innovations shared by RUFORUM Principal Investigators during the 15th Annual General Meeting in Cape Coast-Ghana](#)
b) **Support hosting of the 3rd Meeting of the Forum for Women Vice Chancellors in Africa (FAWoVC)**

The FAWoVC 3rd symposium held from 2-6 December 2019 alongside the 15th RUFORUM AGM in Cape Coast, Ghana provided a platform for female leaders of higher education and other sectors in Africa to deliberate on gender equality in higher education and women’s empowerment. A total of 46 (37 female, 9 male) participants attended the symposium sessions. As a part of the symposium a mentorship interactive session was organised on 6th December, 2019 and attended by 86 (50 female, 36 male) upcoming scientists. In partnership with RUFORUM, sessions were also organised for emerging scientists (Post-doctoral Fellows, Masters and PhD students, and recently recruited academic staff) on: project management, scientific data management, and proposal development, scientific writing and presentation.

The symposium came up with key action points and a roadmap for strengthening and increasing the pool of women scientists in African Universities and other research and development institutions in Africa. The symposium organised by FAWoVC is part of the project implemented by Busitema University, Uganda on Strengthening Capacity of the Forum for Women Vice Chancellors in Africa to promote gender inclusive participation in science, technology and innovation, funded by the Islamic Development Bank (IsDB) and the Regional Universities Forum for Capacity Building in Agriculture (RUFORUM).


c) **Establish strategic partnerships - strategic alliances with other organizations to create a sense of common values and mission**

During the quarter, the Secretariat renewed and/or formalized partnership with three institutions; Global Open Data for Agriculture and Nutrition (GODAN), Education Sub Saharan Africa (ESSA) and Association of Public and Land Grant Universities (APLU). GODAN and RUFORUM are currently developing a system and tools for collecting and storing open data for agriculture and nutrition research in African universities and deployment and distribution of open source remote sensing and Geographical Information Systems Software for research and graduate training. In addition, the two institutions will strengthen entrepreneurship capacity development across Africa. RUFORUM and ESSA are currently exploring approaches for documenting best practices in scholarship management and open data for management of African universities with the aim of providing evidence for best practice scholarship administration for and in Africa. RUFORUM and APLU will benefit from the expertise of universities in the respective continents to develop new technologies and innovations to transform the agricultural sector and higher education especially in Africa.


A new Letter of Agreement focusing on **Capacity development for young family farmers and graduate students on agricultural innovations for family farmers in Eastern and southern Africa** was signed with FAO. The LOA falls under the general Memorandum of Understanding between RUFORUM and FAO.

d) **Seek Partnerships to implement the December 2019 Ghana Ministerial decisions**
On 5\textsuperscript{th} December 2019, African Ministers of Agriculture, Education and Training, Finance, Science, Technology and Innovation met in Cape Coast, Ghana and agreed on key actions to support implementation of Africa’s Universities Agenda for Higher Agricultural Education, Science, Technology and Innovation (AHESTI) in line with the continental frameworks enshrined in Agenda 2063, especially STISA 2024 and CAADP, and decisions of of the Committee of 10 African Heads of State Championing Education, Science, Technology and Innovation Development in the Continent (See \textbf{C10 Action work plan for RUFORUM}). The RUFORUM Secretariat has initiated discussions with member universities Governments and funding agencies to take the deliberations forward. At the initial phase, the Arab Bank for Economic Development in Africa (BADEA) has committed to fund Feasibility studies for implementation of the continental initiative to Strengthening Africa’s Science, Technology and Innovation for Entrepreneurship Capacity for Agriculture and Economic Development (SASTIE). The first pilot study is already ongoing in Uganda and it is hoped to be expanded to Zambia (see \textbf{Call for expression of interest for the Uganda Feasibility Study} and \textbf{Terms of Reference}). The Government of Zimbabwe has also confirmed interest to participate in the initiative.

The Secretariat continues to reach out for potential partnership with agencies such as the OCP Group-Morocco, OPEC Group and the African Development Education Programme.

e) \textbf{Support University research teams to prepare and submit at least 30 proposals to support university-level activities}

The Secretariat supported Member universities to submit eight (8) University led proposals to Erasmus+ Capacity Building in Higher Education 2020. The proposals focused on strengthening climate change adaptation and mitigation, agribusiness development and entrepreneurship, agriculture and rural innovation, plant breeding and biotechnology, and value chain approach to agricultural education in Africa. Results are expected possibly second half of 2020.

f) \textbf{Undertake STI country case studies in six countries: Liberia, Mali, Sierra Leone, Mozambique, Sudan and Uganda}

Results of the country case studies undertaken in Mali, Mozambique, Sudan and Uganda were shared with the Forum for Women Vice Chancellors in Africa Symposium during the 15\textsuperscript{th} RUFORUM AGM. These will be synthesized into a comprehensive report to act as a baseline for the interventions to be undertaken under the gender-based assessment of the science, technology and innovation higher education ecosystem. Findings from the Sudan case study have been used to inform additional engagements between RUFORUM, member universities in Sudan and the policy makers in Sudan.

The STI country study for Sierra Leone is expected to be done during the next quarter.

\textbf{g) Finalize the second RUFORUM tracer study}

The Secretariat continued to undertake the tracer study to establish the contribution of RUFORUM supported graduates to agricultural transformation in the respective countries of their deployment. Preliminary results from 203 Alumni (129 Male, 74 female) indicate that 77 \% of Alumni are employed with 64 \% working full time, 70\% returning to country of origin, and the majority working with private universities (39 \%). The full report will be made available during the next reporting period.
**Emerging issue**
The outbreak of the COVID-19 will grossly affect operations of RUFORUM and its Member Universities as well as other sectors of the economy. We have already had to adjust most of our scheduled activities and are strengthening our online platforms for communication. It is emerging that the format of higher education offering will perhaps see significant changes and more online offering and presence based on the staff and students experiences during this period.

**Planned activities for the period April-June 2020**

Activities under the RUFORUM operational plan-2018-2022 of RUFORUM Vision 2030 flagship programmes will continue. Specific focus will be made to:

1. Recruit students to undertake Masters studies at Gulu and Egerton Universities under funding support from the Mastercard Foundation
2. Facilitate the feasibility study for the Youth Employment Entrepreneurship and Agro innovations Development in Uganda
3. Finalize the RUFORUM Tracer Study
4. Work with University Mohammed the 6th Polytechnique to develop six (6) online Masters programmes to be delivered as MOOCs
5. Work with Member Universities and Member States to develop proposals/frameworks for implementing decisions of the Ghana 05 December 2019 Ministerial meeting
6. Plan for the 16th RUFORUM Annual General Meeting