



Seku News

A newsletter from the Office of the Vice-Chancellor

SOUTH EASTERN KENYA UNIVERSITY



Inside

SEKU makes it to UN publication

SEKU dons get top appointments

SEKU and County Government sign deal

Beekeeping research intensified to benefit local farmers

July - September 2018

Our Vision

To be a globally competitive centre of excellence
in teaching, research, innovation and service

Our Mission

To provide quality education through
teaching, research, extension, innovation and
entrepreneurship with emphasis on dry land
agriculture, natural resources and environmental
management

Core Values

Professionalism

Innovation

Integrity

Freedom of thought

Teamwork

Respect for conservation of environment

Our Motto

Arid to Green—Transforming Lives



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SekuNews is published as a
newsletter by the Office of
the Vice-Chancellor
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Editor's Note

Once again, the editorial team extend warm welcome to our readers to yet another issue of SekuNews.

As usual we are delighted to share with South Eastern Kenya University stakeholders the activities that have preoccupied the University fraternity in the past few months.

SEKU remains focused on community service and outreach as demonstrated by its pact with the County Government of Kitui to boost crop and livestock farming in the region, and the envisaged partnership with the African Development Bank.

In the academic and research fronts, the University continues to put out cutting-edge research, most of which is geared towards finding solutions to livelihood challenges among the rural communities. Findings presented here on honey production and water purification represent such community oriented research.

In the month of April, SEKU made a debut by sending two beauty queens, Sara Ndue and Lydia Sadera, to the Mr and Miss University Kenya pageantry.

In the same month, our undergraduate student of water technology, Simon Kalume, made a mark at this year's international ASALI conference in Moi University, Eldoret, impressing delegates with his presentation on harnessing indigenous knowledge for conflict resolution.

The expansion programme continues on the right path with construction works going on at the Kitui and Wote Campuses and the School of Humanities and Social Sciences at the Main Campus' main gate.

Our staff have remained on the ascendancy mode. Dean School of Health Sciences, Prof. Micheal Kiptoo, clinched a plum appointment as the chief executive officer of the giant Kenya Medical Training College, while assistant lecturer, Ms. Agnes Mulewa, was appointed chief officer in the County Government of Kitui.

SekuNews joins the rest of the University community in congratulating the duo.

Osir Otteng

Community service key on our agenda

This is yet another issue of our corporate newsletter, through which we share with our stakeholders what we are doing in various fronts as we strive towards the fulfillment of our mandate to provide quality education through teaching, research, extension, innovation and entrepreneurship.

We remain alive to the needs of our immediate community and the University's corporate obligation to play its role in enhancing livelihoods through research and collaboration in areas of agriculture, water and environmental conservation and will continue to engage relevant stakeholders with a view to achieving our targets thereon.

The multi-faceted memorandum of agreement that we have signed with the County Government of Kitui is only but one testimony to such commitment.

The pact opens the way for a structured collaboration on various thematic areas, including crop and livestock production, technical skills development, mineral exploitation, water resources management and environmental conservation.

I wish to thank the Government of Kitui County for taking this desirable step of investing in the livestock project, which will ensure enhanced livelihood for several families in this County.



We pledge our unflinching support and commitment to the success of this project, which fits well within our philosophy of transforming lives and improving the environment from arid to green through innovative teaching, research and community service.

Our demand-driven academic programmes, human development-focused research activities and community-minded collaborative arrangements remain geared towards achieving our over-arching mission to provide quality education, research and innovation.

Our doors remain open to constructive engagement with all stakeholders as we strive to achieve our vision to be a globally competitive centre of excellence in teaching, research, innovation and service.

Prof. Geoffrey M. Muluvi, PhD
Vice-Chancellor

Kitui Governor Visits SEKU

South Eastern Kenya University paid host to the Governor of Kitui County, Hon. Charity Ngilu, in the month of June, setting the stage for enhanced collaboration with the local government.



Hon. Ngilu is shown around the Textile Engineering Department

The Governor and her entourage were received by the Vice-Chancellor, Prof Geoffrey Muluvi, and his deputy in charge of finance, planning and development, Prof. Reuben Muasya, and several other senior staffers of the University.

The visit heralds a new chapter in the relationship between the University and the County Government, coming on the heels of exploratory meetings between senior officials of the two institutions aimed at charting out ways of spurring development and enhancing livelihoods in Kitui County and its neighboring areas.

Hon. Ngilu toured various facilities, including the School of Engineering's textile engineering, electrical and electronic engineering, and agricultural engineering laboratories.

She also visited the University's livestock farms and the Institute of Mining and Mineral processing, which has a great potential for unlocking the exploitation of the county's mineral wealth.

Prof. Muluvi told the Governor that SEKU is ready to develop and mount tailor-made short course for the county's residents, particularly the youth, at artisan level to give them skills in various technical fields.

"We are also ready to offer training to local residents on modern crop and livestock farming methods to help them maximise their profits and raise their livelihoods, said the Vice-Chancellor.

The Governor told senior officials in various units of her government to immediately start engagement with the University on how best to utilise its abundant resources for the benefit the local community.

"I am totally impressed by the University's huge potential to transform the lives of the people of our county. The facilities and expertise that abound in this university are enormous. We must exploit them for the benefit of the people of Kitui and the rest of this region," said Hon, Ngilu.



Hon. Ngilu admires SEKU's Toggenburg goats

SEKU and Kitui County Government sign deal on livestock production

South Eastern Kenya University and the Government of Kitui have signed an agreement to improve livestock farming in the county.

The deal, known as Kitui County-Seku Livestock Improvement Programme (KCSLIP), seeks to address food security challenges and promote sustainable livelihoods in Kitui as one of the arid and semi-arid areas of Kenya. The multi-million-shilling project was conceived following a series of consultations between the University and the County Government.

Lack of suitable livestock breeds for Kitui County is seen as a major challenge facing the farming communities despite the county's huge potential for livestock production given its vast rangelands, which provides opportunities for industrialization. This area has the capacity to provide employment to unemployed youths in the entire County.

To kick-start the five-year project, the Kitui Governor, Hon. Charity Ngilu and SEKU Vice-Chancellor, Prof. Geoffrey Muluvi, signed a memorandum of agreement in June at a brief ceremony held at the Governor's Office in Kitui town.

The project's overall goal is to boost the county's social-economic status by developing superior animal breeds for farmers by 2022.

It seeks to, among other things, develop suitable animal breeds for livestock farmers; establish sustainable sources of pasture and fodder crop production; build capacity of farmers on hands-on skills in livestock production techniques; increase farmer's income through utilization of appropriate techniques in livestock production; and contribute to environmental sustainability of cattle farming enterprises in the county.

According to a concept note developed by the two institutions, key beneficiaries of the project, which targets the farming communities of Kitui, include the over 1.5 million people living in the county's eight sub-counties. The project will also benefit the residents of other counties of Kenya who have interest in livestock production.

Farmers will benefit through: improved and superior animal breeds; sale of their animals as flying herd to the project; knowledge and skills in animal production technologies; sustainable sources of pasture and fodder for their livestock; increased household incomes through cattle farming enterprises; and increased access to market information.

On a pilot basis, SEKU has set aside about 2,261 acres of land for the project to cater for the initial operations which include: cattle and goat breeding, and flying herd system.



Hon. Ngilu (Left) and Prof. Muluvi sign the Memorandum of Agreement. Looking on is SEKU's Legal Officer, Ms. Robai Musilivi

SEKU dons get plum appointments

South Eastern Kenya University's status has received a major boost with the appointment of two of its staffers, Prof. Michael Kiptoo and Ms. Agnes Mulewa, to senior positions in the national and county governments respectively.

Prof. Kiptoo is now the director and chief executive officer of the giant Kenya Medical Training College (KEMTC). Until his appointment to the new position by the Minister for Health, Cecily Kariuki, in March this year, Prof. Kiptoo was the Dean, School of Health Sciences.

He took over the KEMTC mantle on March 1, 2018 in an acting capacity from Mr. Peter K. Tum, who is now the Ministry of Health's Principal Secretary.

Prof. Kiptoo was appointed associate professor in the school of Health Sciences where he was also appointed dean in 2015. He holds a doctorate and a Master of Science Degree in Immunology from Kenyatta University and is a member of the Kenya Society of Immunology.

An accomplished scholar and researcher of long standing, Prof Kiptoo is credited for the establishment of SEKU's School of Nursing, which is now up and running.

He takes into his new assignment a wealth of knowledge and experience in matters health. Prior to joining SEKU, Prof. Kiptoo served as a senior researcher for close to 15 years at the premier research body, Kenya Medical Research Institute (KEMRI), during which time he was also activity engaged in teaching, and supervision of post graduate students at university level.

Oh her part, Ms. Agnes Kawila Mulewa has been tapped to serve as a Chief Officer in the County Government of Kitui.

Until her new appointment in April this year, Ms. Mulewa was an assistant lecturer of Kiswahili in the School of Humanities and Social Sciences. She was also the Associate Dean of Students.

She was the brain behind SEKU students' sterling performance in co-curricular activities such as music and sports. In 2016, Ms. Mulewa, who is currently pursuing her PhD studies in Kiswahili, successfully organised the first ever national Kiswahili symposium to be hosted by SEKU.

In his release letters to Prof. Kiptoo and Ms. Mulewa, the Deputy Vic-Chancellor in charge of Administration and Human Resources Development, Prof. Francis Wachira, congratulated the two on their new appointments and wished them success in their new assignment.

They will be away on leave of absence for the period of their contracts.



Prof. Michael Kiptoo

Construction projects on course: A status update

South Eastern Kenya University is keeping in step with its development agenda. As a young institution, infrastructure development is key and the University has embarked on an ambitious plan to construct two satellite three campuses and one college. Below are the updates of the ongoing projects:

Kitui Town Campus

The Kitui Town Campus is located at the central business district of Kitui town on the second, third and fourth floors of John Ngonde Arcade.

The current student population is about 500, attending regular, part time weekend intensive and institution-based modes of study.

The construction of the Kitui Town campus is currently on course with 80 percent having been done and should be complete by end of the year.

Wote Campus

This campus is currently located on the second floor of Soi Plaza Building in Wote Town and has a student enrollment of 314. It offers regular and part time evening or weekend modes of study for all academic programmes.

It is, however, set to move to its purpose-built site once the ongoing construction of the ultra-modern tuition and office block on its 30-acre land is complete. The campus is expected to be ready by the end of this year.

College of Humanities and Social Sciences

Located at the Main Campus' main gate, the College of Humanities and Social Sciences is envisaged to house the current School of Education; School of Humanities and Social Sciences; and the School of Business and Economics.

The College is conveniently located to cater for those seeking part time education through weekend or evening classes as it is easily accessible from Kwa-Vonzza market. Works at the College are going on, offering hope that soon the College will open its door to the first batch of users.

The upcoming Wote Town Campus building



SEKU enjoys pride of place in UN publication

South Eastern Kenya University has made its way to the pages of the prestigious United Nations World Water Development Report, with a well-researched piece on water conservation appearing in the publication's 2018 edition.

The article titled "Nature-based water storage in dry rivers in Africa" advocates the use of alluvial aquifers to alleviate water insecurity that besets arid and semi-arid areas like Kitui County.

SEKU's Dr. Moses Mwangi (pictured) from the Department of Hydrology and Water Resources Management teamed up with other scientists from IHE Delft, Mekelle University, Dabane Water Workshops, Acacia Water, IVM of the Vrije Universiteit Amsterdam to make a pitch for alluvial aquifers.

The paper argues that beds of many ephemeral rivers and streams that crisscross the arid and semi-arid lands form shallow groundwater reservoirs, which are recharged every time the rivers flow. Communities can draw water from these alluvial aquifers during dry season, using a variety of simple techniques for their social and economic needs.

Yet, despite its high storage potential, this storage solution remains underutilised, particularly for productive purposes such as agriculture.

The highly valued UN World Water Development Report, published every three years, is a comprehensive review providing an authoritative picture of the state of the world's freshwater resources.

It offers best practices as well as in-depth theoretical analyses to help stimulate ideas and actions for better stewardship in the water sector. It is the only report of its kind, resulting from the collaboration and contributions of the 26 UN agencies, commissions, programmes, funds, secretariats and conventions that have a significant role in addressing global water concerns.

The article reports that the news media are full of talk of crises - in climate change, energy and food and troubled financial markets.

These crises and water resources management are inter-linked and, if unresolved, may lead to increased political insecurity and conflict. Water is required to meet our fundamental needs, raise living standards and sustain our planet's fragile ecosystems.



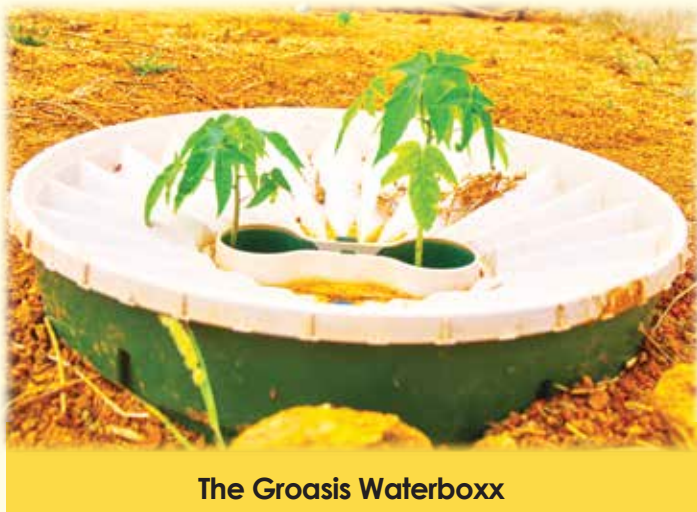
Dr. Moses Mwangi

Dr. Mwangi and colleagues argue that pressures on the resource come from a growing and mobile population, social, cultural changes and technological modifications, and economic development. Adding complexity and risk is climate change, with impacts on the resource and the sources of pressure on water. They, however, aver that these challenges are not unmanageable.

"The challenges, though substantial, are not insurmountable. Use of the alluvial aquifers in one such sustainable solution," concludes the paper.

Harvesting the skies to turn arid to green

SEKU demonstrated its commitment to transforming arid land to green at the 2018 ASALI Conference through the use of the Groasis Waterboxx, enabling the institution claim the topmost price for an innovation which best defined the occasion's theme and which was in line with Kenya's Vision 2030. The invention supports plants growth through use of dew, making it a suitable tool in the ASAL areas in provision of all-round water usable at households and in alleviating food insecurity. The technology was lauded as an environmentally appropriate one, which is socially beneficial and economically viable sustainable. The Groasis Waterboxx is designed to help grow crops using dew from the atmosphere. It is particularly useful in the arid areas, some of which are too dry for crops to survive.



The Groasis Waterboxx

Although water may be present in the ground, it is often too deep for small plants to develop root structures to reach. The Groasis technology employs biomimicry to solve the problem of growing plants in the dry areas, eroded areas, badlands and on rocks. It is a polypropylene bucket with a lid and a vertical tunnel in the middle for two plants. A wick allows water from inside the box to trickle into the ground via capillary action. The box's lid is covered by tiny papillae, which create a super-hydrophobic surface due to the lotus effect. The lid serves to funnel even the smallest amount of water down siphons into the box's central reservoir.

The product functions as a plant incubator, sheltering both a newly planted sampling and the ground around it from the heat of the sun, while providing water for the plant. The lid collects dew, which is then stored in the bucket.

Peter Etukutan, fourth-year Hydrology student and one of the innovators behind the Groasis Waterboxx



The water-filled reservoir releases small amounts (around 50ml per day) of water into the ground by a wick to water a plant and encourages the plant to develop a root structure. The box acts as a shield for the water in the upper ground, and this water then spreads down and out instead of being drawn to the surface and evaporated. The temperature and humidity beneath and inside the box are more stable night and day than without. The Groasis Waterboxx is about eight times cheaper than irrigation and has no energy nor maintenance costs. In the arid areas, it helps save the scarce groundwater and once a crop grows it can be reused to take care of the multiple problems in the arid areas that include desertification, sinking water tables and erosion. The innovation reduces water use in agriculture and trees. It uses 90% less water and the plants that are planted with it have a survival rate of over 90%, proving its utility as an alternative for drip irrigation. It is an organic way of growing, this the use of pesticides reduced to near-zero.

On the whole, dew collection is a possible supplementary source of water in arid areas. Its harvesting has been practiced by humanity as far back as ancient times, in areas where rainfall and groundwater resources are scarce. When there is any humidity in the air and a surface cool enough to provoke condensation, dew will form on the surface until the humidity is gone. The quantity from dew varies according to location but at times has been shown to constitute a significant proportion of normal rainfall. The dew water quality can be fairly good and of low costs especially for dew irrigation (\$1 per plant), giving its harvesting credence in turning the arid lands green. Its drawback includes the relatively small water quantities that can be harvested and, the variability in water collection which depends on seasons.

Report by Dr. Moses Mwangi, School of Environment, Water and Natural Resources

SEKU and AfDB pursuing collaboration for youth development projects

South Eastern Kenya University and the African Development Bank are working on a programme to uplift the youth. The Bank's sustainability specialist and head of human capital, youth and skills development department, Dr. Emmanuel Mutisya, said AfDB was ready to fund the first edition of Jobs for the youth in Africa (JfYA).

He urged SEKU to place its bid for the hosting of the project, which will include an ICT and innovation centre of excellence. He said the programme targets youth between the age of 15 and 35 years.

Dr. Mutisya was speaking at SEKU when he paid a courtesy call to the Vice-Chancellor, Prof. Geoffrey Muluvi, in the latter's office.

Prof. Muluvi said that SEKU has adequate infrastructure to host the programme noting that the University is well placed to ensure the programme does not only benefit the youth in Kitui County, but also those in the neighbouring counties of Machakos, Makueni, Kajiado, Taita Taveta and Embu .

He said that, in addition to the exiting computer laboratories, the University will establish additional laboratories in the upcoming School of Humanities and Social Sciences, and, Kitui and Makueni Campuses. Other projects Dr. Mutisya said will be funded by the bank are agri-business, entrepreneurship and community health.



From Left: Prof. Muluvi, Dr. Mutisya and SEKU DVC-ARSA Prof. Zipporah Ng'ang'a

Innovation SEKU Technologist develops remote controlled digital electronics trainer-board



The remote-controlled digital electronics trainer-board in the Physics laboratory

"After noting that we had few kits to train large numbers of students on how logic gates work, I have designed and implemented a digital electronics trainer board which is remote controlled."

These are the words of Mr. Vincent Mulwa, a technologist in the department of Physics and Electronics, who has come up with an innovative way of dealing with challenges of teaching large classes.

Mulwa says that the innovation will aid the department's technologists or lecturers to demonstrate to students how the logic gates function by the press of a key on a remote transmitter. There will be no need of connecting any wires manually because the logic level can be applied remotely.

"This means a whole class can collect data and make truth tables in one session while being introduced to electronic devices," says Mulwa.

"I feel it's in the best interest to start fabricating the board and take teaching and learning to the next level, technology wise.

"It will also reduce crowding of students in one board where most unwillingly miss the opportunity to take data by themselves," says he. The board, according to the technologist, will give all students in class an opportunity to experiment and collect data.

"It has been tested. It works perfectly," concludes Mulwa.

Budding SEKU scholar impresses delegates at ASALI conference

A A third year student of Seku was the toast of this year's ASALI conference held in April at Moi University.

Samson Kalume received a standing ovation when he presented a poster of his research into indigenous conflict resolutions mechanisms. The poster, entitled: "Vanishing Value of Indigenous Knowledge in Livelihoods Conflicts Resolution among the Giriama People of Kenya" was hailed as an ingenious way of harnessing indigenous knowledge to solve problems brought about by resource scarcity in society today.

Kalume says the illustrations were an offshoot of his Education and Extension in Water Resources Management unit that forms part of the Hydrology and Water Resources Management programme at SEKU. His study, he says, is based on his field research into the indigenous mechanisms of conflict resolution among the Giriama people.

In the study, Kalume set out to observe, and sample views and perceptions on indigenous mechanisms of conflict resolution with a view to establishing their relevance in the contemporary conflict resolution mechanisms. He used in-depth interviews and questionnaires to obtain data for his study, which was hailed by the delegates as incisive and thought-provoking.



Conference delegates inspect the Moi University dairy farm. INSET: Samson Kalume

Kalume says his motivation for this study is the continued use of local knowledge in preventing and managing conflicts among some communities, despite the promotion of the conventional means.

"Society is faced with a myriad of unending conflicts, which have continued to gain ground, making it appear as though conflict is an integral part of our life, especially with the ever shrinking socio-economic resource bases. The Giriama people survive conflicts through the use of locally developed knowledge to create and sustain harmony.

"The people have survived for centuries through practicing their indigenous conflict resolution mechanisms and ways of life that is friendly to the socio-economic and ecology of the area they inhabit. However, since the colonial period, the indigenous conflict resolution mechanisms have been neglected and over shadowed by western conflict resolution methods."

The study concludes that embracing the indigenous knowledge in conflicts resolution mechanisms can be a useful input for individuals and community as a whole in dispensing justice and sustaining peace. The guideline and sanctions therein are understood and respected by all in the society. The confidence built over time as found in the interactions with the Giriama community can be seen in adherence to suitable means of living in the milieu.

He attributes his success in the study and eventual presentation at the conference to the vital role and commitment of SEKU to nurturing students' talents and intellectual capacity in dealing with socio-economic problems in society.

"I believe this is one of the reasons why SEKU was declared the best at the Eldoret conference in terms of the conference theme interpretation and application. My special recognition goes to the University for the prevailing students mentoring spirit at the Department of Hydrology and Water Resources Management, aid Kalume, adds that the results can be seen not only in the outcomes of the Eldoret conference but also the continued links with students who have completed their courses." He concludes thus: "The local indigenous peace processes are endowed with valuable insights that can inform the rebuilding of social trust and restoration of the conditions for communal coexistence. There are important insights to be gained from such approaches which researchers, policy-makers and peacemakers can benefit from."

For once, something good about cell phones: Beekeeper extension and decision support using cell phones

(SEKU and Penn State University Collaborative Research)

Beekeeping is a major economic activity in Kitui County, where traditional beekeeping has been practiced for decades. This art has been passed from generation to the next mostly through apprenticeship. The beauty with beekeeping is that it utilizes free natural resources (bees, nectar and pollen), requires little capital investment (hives could be free or as cheap as KES500) and requires no land ownership (bees do not respect boundaries and can forage up to a radius of 3 – 5 kilometres!). However, like in most developing countries, small scale producers including beekeepers face an immense lack of extension, due to lack of infrastructure, funding, researchers and other resources. To complicate matters, beekeepers have no political 'clout'.

In the course of our interaction with beekeepers in far-flung rural areas we appreciate first-hand how difficult it is to reach the beekeepers. But again, we also noticed one key common feature with almost all beekeepers – their access to cell phones! The idea to use cell phones to aid in beekeeper extension and decision support was likely borne over a cup of delicious Kenyan tea, or during one of those long agonizing drives in rural Kitui or probably over a glass of the world famous Tusker! But it did turn out to be such an innovative idea. With a grant from 'Global Center for Food Systems Innovation' we are using cell phones to gather data from and communicate with beekeepers and employing Geographical Positioning System (GPS) and analysis and predictivemodelling. The aim of the project is to use new technology/tools (cell phones) to collect enough high quality data from beekeepers to provide recommendations and support decision making.

Geographical Information System (GIS) tools to aid in data In 2016 & 2017 we gathered data on hive occupation, absconding, honey and wax production and plants in bloom. In 2016 we had 440 records from 38 beekeepers and 537 records from 34 beekeepers. This data will be integrated with landscape and management practice data to allow understanding on how landscapes limit production and how beekeepers can get the most out of their bees. Land cover data will be used to evaluate relative floral quality and water index will be determined by measuring precipitation, relative water retention and relative distance to rivers or streams. One management practice we are investigating is the height at which hives are placed, and its effect on hive occupation, absconding. Honey production is also being studied.

Beekeepers participating in the project were rewarded with solar wax melters to process their bees wax in an environmentally friendly way. One beekeeper (Edwin from Tulia, Kabati) processed over 50 kg. of bee wax. Current market price is Kshs.600/kg, hence beekeepers are diversifying their incomes from a product that is largely thrown away due to lack of knowledge on value addition.

Preliminary results are exciting – we are able to detect effects of landscape on honey production. By the end of the study, we will determine how management practices interact with landscape to affect colony production and lastly and most importantly to transfer insights and knowledge back to participating beekeepers via cell phones!

Project Team: SEKU – Benjamin Muli, Patrick Kariuki, Eliud Muli and Janet Mwikali (Post graduate student) Penn State University – Christina Grozinger, Maryann Frazier (retired), Harland Patch, Eric Lonsdorf and Tyler Jones (Post graduate student)

Report by Dr. Eliud Muli, Dean, School of Pure and Applied Sciences



School children outside an M-Pesa shop

Mr SEKU debuts in and Miss University Kenya contest

For the first time since its inception, South Eastern Kenya University fronted representatives to Mr and Miss University Kenya pageantry.

The beauty contest which has been on for the last seven years, brings together students from both public and private universities across the country. It gives them an opportunity to showcase their different talents and creativity as well as espouse what they stand for on topical issues such as environment conservation. The winner of the contest gets an opportunity to represent Kenya in the Miss Africa Contest.

This year's contest attracted 27 participants from various universities. SEKU was represented by the reigning Miss SEKU, Sarah Mumbue Ndue, and the immediate former holder of the title, Lydia Seela Sadera. The duo gave a good account themselves putting SEKU in the national map as a powerhouse of beauty and brilliance.

Part of the contests initiatives for the year was planting 10,000 trees towards environmental conservation. Towards this good cause, the representatives from SEKU planted 300 different tree seedling species which are currently doing well. This was a commendable effort.

All the hard work and practice came to a close on 26th May, 2018 at the Carnivore Simba Saloon where the Mr and Miss University Kenya finalists put their foot forward for the coveted crowns as enthralled crowds cheered them on. SEKU's contestants were in for a pleasant surprise when the master of ceremonies announced the presence in the audience of their Vice-Chancellor, Prof. Geoffrey Muluvi accompanied by an entourage other senior staff of the University. Our own Sarah made it to the final stage of the night's contest.



TOP:Reigning Miss SEKU, Sarah Ndue.

LEFT: 2018 Mr & Miss University Kenya contestants parade at the Carnivore's Simba Saloon



SOUTH EASTERN KENYA UNIVERSITY

ACADEMIC PROGRAMMES



SCHOOL OF BUSINESS AND ECONOMICS

Master of Business Administration
Master of Arts in Economics
Bachelor of Business Management and Information Technology
Bachelor of Project Planning and Management
Bachelor of Commerce
Bachelor of Procurement and Supply Chain Management
Bachelor of Economics and Statistics
Bachelor of Economics
Diploma in Sales and Marketing
Diploma in Human Resources Management
Diploma in Purchasing and Supply Chain Management
Diploma in Business Management
Certificate in Supply Chain Management

SCHOOL OF PURE AND APPLIED SCIENCES

Doctor of Philosophy in Physics
Master of Science in Physics
Master of Science in Biodiversity Conservation and Management
Master of Science in Biotechnology
Master of Science in Biochemistry
Bachelor of Science in Mathematics
Bachelor of Science in Actuarial Science
Bachelor of Science in Statistics
Bachelor of Science in Biology
Bachelor of Science in Biochemistry and Molecular Biology
Bachelor of Science in Chemistry
Bachelor of Science in Physics
Bachelor of Science in Electronics
Diploma in Electronics

SCHOOL OF ENGINEERING AND TECHNOLOGY

Diploma in Mechanical Engineering (Production Engineering)
Diploma in Mechanical Engineering (Automotive Engineering)
Diploma in Mechanical Engineering (Power Electronics Engineering)
Diploma in Mechanical Engineering (Telecommunications Engineering)
Diploma in Fashion Design and Textile Technology
Certificate in Fashion Design and Garment Making

SCHOOL OF ENVIRONMENT, WATER AND NATURAL RESOURCES

Doctor of Philosophy in Climate Change and Agroforestry
Doctor of Philosophy in Environmental Management
Doctor of Philosophy in Watershed Management
Master of Science in Climate Change and Agroforestry
Master of Science in Environmental Management
Master of Science in Aquaculture
Master of Science in Integrated Water Resources Management
Master of Science in Mining and Mineral Exploration
Master of Science in Agrometeorology
Master of Science in Exploration Geo-Physics
Bachelor of Science in Forestry
Bachelor of Science in Environmental Conservation and Natural Resources Management
Bachelor of Science in Land Resources Management
Bachelor of Science in Environmental Management
Bachelor of Science in Agro-ecosystems and Environmental Management
Bachelor of Science in Applied Aquatic Sciences
Bachelor of Science in Hydrology and Water Resources Management
Bachelor of Science in Fisheries Management and Aquatic Technology
Bachelor of Science in Geology
Bachelor of Science in Meteorology
Diploma in Forestry
Certificate in Environmental Impact Assessment

SCHOOL OF EDUCATION, HUMANITIES AND SOCIAL SCIENCES

Doctor of Philosophy in Educational Administration and Planning
Master of Education in Kiswahili Methods
Master of Education
Master of Education in Early Childhood
Master of Arts in Sociology
Master of Arts in Religious Studies
Master of Arts in Gender and Development Studies
Master of Arts in Kiswahili
Master of Arts in Geography
Bachelor of Arts
Bachelor of Education (Arts)
Bachelor of Education (Science)
Bachelor of Education (Early Childhood)
Bachelor of Arts in Gender and Development Studies
Bachelor of Arts in Social Work
Diploma in Social Work

SCHOOL OF AGRICULTURE AND VETERINARY SCIENCES

Doctor of Philosophy Agricultural Resources Management
Doctor of Philosophy in Animal Science
Doctor of Philosophy in Agricultural Economics
Master of Science in Dryland Resources Management
Master of Science in Livestock Production Systems
Master of Science in Agronomy
Master of Science in Agricultural Economics
Master of Science in Rangeland Management
Master of Science in Comparative Mammalian Physiology
Master of Science in Reproductive Biology
Bachelor of Science in Agriculture
Bachelor of Science in Dryland Agriculture
Bachelor of Science in Horticulture
Bachelor of Science in Range Management
Bachelor of Science in Dryland Animal Science
Bachelor of Science in Food Nutrition and Dietetics
Bachelor of Science in Agribusiness Management and Entrepreneurship
Bachelor of Science in Agricultural Education and Extension
Diploma in Crop Protection
Diploma in Apiculture
Diploma in Rangeland Management
Diploma in Animal Health
Certificate in Animal Health and Husbandry
Certificate in Artificial Insemination and Fertility Management

SCHOOL OF NURSING SCIENCES AND PUBLIC HEALTH

Master of Science in Epidemiology
Master of Science in Public Health
Master of Science in International Health
Master of Science in Infectious disease diagnosis
Bachelor of Science in Public Health
Bachelor of Science in Population Health
Bachelor of Science in Medical Microbiology
Bachelor of Science in Nursing

SCHOOL OF INFORMATION, COMMUNICATION AND TECHNOLOGY

Master of Science in Information Systems
Bachelor of Science in Computer Science
Bachelor of Information Technology
Diploma in Computer Science
Diploma in Information Technology
Certificate in Information Technology
Certificate in Computer Applications

Main Campus

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