



KEFRI *Newsletter*

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KEFRI Director Dr. Jane Njuguna presented with the instruments of power by KEFRI Board Chairman Rtd.Gen. Samson Mwathethe

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Eco-Word Search Puzzle

E	N	O	I	T	A	T	S	E	R	O	F	E	R	T
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Agroforestry
Deforestation
Indigenous
Watershed

Biodiversity
Ecosystem
Mangroves

Climate
Forest
Nursery

Conservation
Habitat
Reforestation

Dr. Jane W. Njuguna Appointed First Female KEFRI Director



Dr. Jane Wangu Njuguna, Director KEFRI

Dr. Jane W. Njuguna was appointed first female KEFRI Director on 17th December 2024 ushering in a new era of transformative leadership. Her appointment marks a milestone not only for the Institute but also for women in forestry research, as she breaks barriers in advancing the forestry research agenda in the country.

Her appointment was announced by Hon. Aden Duale, Cabinet Secretary for Environment, Climate Change and Forestry. While handing over the instruments of power to Dr. Njuguna, KEFRI Board Chairman Rtd. Gen. Samson Mwathethe stated that the appointment was a reflection on the governments trust in her abilities. “Dr. Njuguna has diligently served the Institute for 36 years. Popularly referred to as tree doctor, her dedication to her work has resulted in this appointment,” he said.

Dr. Njuguna holds a PhD in Forest Mycology and Pathology from the Swedish University of Agricultural Sciences; a master's degree in Forest Science from the University of Melbourne and a Bachelor of Science in Botany and Zoology from

the University of Nairobi. She is a member of the Forestry Society of Kenya.

Her rise through KEFRI's ranks highlights her trailblazing spirit rising from Assistant Research Officer in 1991 to Senior Deputy Director Research & Development in April 2019. On 5th March 2018 Dr. Njuguna was appointed Ag. Director a position she held for 1 year 3 months. In August 2023 she was again appointed Ag. Director a position she held until her confirmation as the substantive Director.

As a passionate tree health researcher alongside her team, she established an Intergrated Pest Management (IPM) system which contributes to developing strategies for managing tree pests and diseases; encouraged the use of aerial seeding technology; developed the JazaMiti application and advocates for species to site matching.

In her inaugural address she extended her gratitude to God for the opportunity, and to the President and the CS for the appointment. She went on further to thank the Board of Directors for their support during her tenure as Ag. Director. “I am elated to have been appointed the first female Director in the history of the Institute. I am committed to deliver on KEFRI's mandate, foster strategic partnerships, enhance capacity building and engage communities in sustainable forestry practices to drive impactful environmental conservation,” she said.

Dr. Njuguna's confirmation as Director is more than a promotion it's a victory for women in leadership, for KEFRI, and for the future of sustainable forestry. Her vision blends scientific excellence with real world application, ensuring that KEFRI remains a global leader in forestry research and conservation. As she takes on this new role, Dr. Njuguna is poised to inspire the next generation of environmental stewards and build a legacy of sustainability and resilience for generations to come.

Signing of Performance Contract 2024/2025 Financial Year



The Cabinet Secretary Ministry of Environment, Climate Change, and Forestry, Hon. Aden Duale, officially signed the Performance Contract (PC) for Kenya Forestry Research Institute (KEFRI) for the 2024/2025 Financial Year on December 13, 2024, at the Ministry Headquarters. The signing took place between the CS and Board Directors Mr. Ntoros Ole Senteu and Ms. Hamara Ibrahim representing the Chairman of the KEFRI Board of Directors, Rtd. Gen. Samson Mwathethe.

The PC is strategically aligned with the Bottom-Up Economic and Transformation Agenda (BETA), which serves as the current Government's development framework. To ensure seamless implementation and accountability, the PC targets will be cascaded across all levels of KEFRI's leadership. This includes the Director, Senior Deputy Directors, Deputy Directors, Regional Directors, Assistant Regional Directors, and Heads of Departments, who will further engage their respective teams in fulfilling the outlined objectives.

During the signing, the CS emphasized the need for diligence, integrity, and transparency in the execution of the contract's commitments. He urged all KEFRI staff to uphold the highest standards of service delivery while safeguarding and responsibly utilizing national resources. The CS reiterated that success in the implementation of the PC would be measured by

tangible results at the end of the financial year, reinforcing accountability and efficiency within the Institute.

"I urge us to draw inspiration from our National Anthem, which calls for unity, justice, and service to our nation. As we embark on this journey, let our work reflect the values of integrity, diligence, and accountability, ensuring that the fruits of our labor contribute to Kenya's growth and prosperity," said Hon. Duale.

Through the successful implementation of the Performance Contract, the Institute will contribute to the national goal of sustainable development and ecological restoration, ensuring that Kenya's forestry sector remains a pillar of economic and environmental transformation. KEFRI remains committed to its mandate of advancing research and sustainable forestry practices, playing a crucial role in environmental conservation and climate resilience.



CS Duale Visits KEFRI Wajir Sub-centre

Hon. Aden Duale Cabinet Secretary Ministry of Environment, Climate Change and Forestry visited Wajir County for the Pastoral Leadership Summit held from 8th to 10th December 2024 at Wajir Girls High School. The summits' theme “Unlocking Policy and Financing Bottlenecks to Maximize Pastoralism Potential in Kenya”, provided an opportunity for stakeholders to showcase various technologies such as gums and resins, Melia propagation, non-forest products, and dryland seeds and seedlings.

While addressing participants at the summit, CS Duale urged the pastoralist communities to embrace tree growing in a bid to combat climate change and help reduce the perennial droughts they are faced with. “If we as a country can grow 15B trees as per the Presidential directive, then we can be assured of food security and equally reduce cases of banditry brought about by inadequate grazing land,” he said.

Dr. Jane Njuguna Ag. Director KEFRI, in her remarks reiterated KEFRI's commitment in contributing to the 15B tree planting target as set by the President. She added that the Institute will step up efforts in forestry research to ensure that there are suitable tree species for the ASALs.

Thereafter the CS visited the newly established KEFRI Wajir sub-centre where an open day was held. During his visit, he urged the Wajir County government to collaborate with KEFRI in addressing the challenges experienced by communities in the ASALs.



Wajir County residents examining products displayed during the open day at KEFRI Wajir sub-centre

KEFRI Signs Tripartite MOU with Kabarak University and Team Environment Kenya



Dr. David Langat Rift Valley Eco-Regional Director, KEFRI; Prof. Henry Kiplangat Vice Chancellor Kabarak University and Mr. Mathew Ochanda CEO TEK during the signing of the MoU

KEFRI, Kabarak University and Team Environment Kenya (TEK) on 16th December, 2024 signed a Tripartite Memorandum of Understanding (MoU), to address climate challenges and foster sustainability.

Dr. David Langat Rift Valley Eco-Regional Director, KEFRI; Mr. Mathew Ochanda CEO TEK and Prof. Henry Kiplangat Vice Chancellor Kabarak University represented their respective institutions during the signing ceremony.

The agreement sets forth several ambitious goals, including the conservation of threatened indigenous tree species through the establishment of a botanical garden at Kabarak University, and the production of 1 million seedlings annually through a large-capacity tree nursery. Furthermore, the partnership aims to build community capacity for climate resilience through education, training, and involvement in sustainable environmental practices. The collaboration also seeks to expand partnerships with key conservation stakeholders such as KFS, KWS, NEMA, among others.

This partnership signifies a unified effort to combat climate change while enhancing community resilience and empowering individuals to adopt sustainable practices. “As KEFRI, we are excited to embark on this transformative journey. This collaboration is a powerful reminder of what can be achieved when like-minded organizations work together toward a shared vision for a sustainable future” said Dr. Langat

KEFRI and Taita Taveta University Forge a New Partnership for Forest Sustainability and Conservation



Prof Fred Barasa Vice Chancellor Taita Taveta University (centre left) alongside Dr. Jane Njuguna Ag. Director KEFRI (centre right) and Senior management after the MoU signing

KEFRI Ag. Director Dr. Jane Njuguna and Taita Taveta University Vice Chancellor Prof. Fred Barasa on October 9th, 2024 at KEFRI headquarters Muguga, signed a Memorandum of Understanding marking a new chapter in environmental conservation and research collaboration between the two institutions.

The MoU seeks to create synergy focusing on resource mobilization, capacity building, and knowledge exchange. The agreement will enhance the rehabilitation of endangered species, promote environmental sustainability, and foster innovative research and technologies within the forestry sector.

“We are proud to partner with Taita Taveta University to spearhead projects that will not only conserve our forests but also create a sustainable future for generations to come, this will open up new avenues for research and expand international linkages,” said Dr. Njuguna.

Prof. Fred Barasa echoed similar sentiments, highlighting the importance of aligning research with real-world environmental challenges. “Our collaboration with KEFRI comes at a critical time when forest conservation is key to mitigating climate change. This partnership will enable us to mobilize resources and share our expertise with a

wider network of international partners,” he said. The collaboration focus areas will include the rehabilitation of endangered tree species, such as *Melia volkensii*, which plays a crucial role in Kenya’s forest ecosystem. The institutions aim to mobilize resources and technologies to restore this valuable species, which has been under threat due to over-exploitation and deforestation. As part of the initiative, the MoU will also explore training programs to equip students, researchers, and local communities with the skills necessary to engage in sustainable forestry.

The partnership will present opportunities for joint ventures in research, focusing on climate change mitigation, biodiversity conservation, and forest restoration. Through this partnership, KEFRI and Taita Taveta University will strengthen their international networks, sharing knowledge and expertise with global partners engaged in similar conservation efforts.

Enhancing Livelihoods Through Sustainable Utilization of Mathenge

KEFRI, in collaboration with the County Governments of Garissa and Tana River, successfully conducted an Entrepreneurship and Business Skills Training in Hola, Tana River County, on 31st October 2024. This initiative aimed to equip community groups with essential business acumen to develop sustainable enterprises by leveraging the utilization of *Prosopis juliflora*, commonly known as Mathenge.

The event was honored by the presence of the Environment and Natural Resources CEC Tana River County, Mr. Mathew Bwabuwaya, of Tana River County, who emphasized the significance of empowering local communities to harness available natural resources for economic growth and environmental conservation.

Subsequently, on 22nd November 2024, KEFRI, in collaboration with the Kenya Industrial Research

and Development Institute (KIRDI) and the County Governments of Garissa and Tana River, conducted an intensive two-day training under the 'Prosopis Juliflora Management Through Utilization for Decent Green Jobs and Socio-Economic Development' project.

Held at the North-Eastern National Polytechnic KIRDI Laboratory, this training focused on value addition techniques for *Prosopis juliflora*. Participants acquired skills in developing livestock feed formulations from Prosopis pods, as well as producing value-added products such as soaps, masks, and face scrubs.



CS Aden Duale listening to Mr. Samuel Kingori founder of Maisha Mathenge Enterprises as he explains fodder production from Mathenge pods

This initiative is part of a broader project funded by the Kingdom of the Netherlands through ILO Prospects in Kenya. The project seeks to empower communities in Garissa and Tana River counties who have been adversely affected by the spread of *Prosopis juliflora*. By creating green jobs and enhancing local livelihoods, the program not only fosters economic independence but also contributes to the conservation of natural ecosystems.

Through these strategic interventions, KEFRI and its partners are transforming challenges into opportunities, promoting sustainable resource utilization, and fostering resilient communities across the region.

KEFRI Celebrates ISO 9001:2015 and 14001:2015 Recertification



In December 2024, KEFRI achieved a significant milestone by successfully renewing its ISO 9001:2015 (Quality Management Systems) and ISO 14001:2015 (Environmental Management Systems) certifications. These certifications, awarded by the Kenya Bureau of Standards (KEBS), underscore the Institute's unwavering commitment to quality management and environmental stewardship.

Dr. Jane Njuguna Director KEFRI, highlighted that this recertification represents the Institute's dedication to fostering collaboration, safeguarding the environment, and upholding the highest standards in forestry research. She noted that the certifications have led to improved efficiency, better resource management, reduced waste, and enhanced service delivery.

Over the years, the Institute has dedicated itself to the sustainable management, conservation, and development of forests and allied natural resources, aligning its operations with international standards.

KEFRI's adherence to these international standards has significantly enhanced its reputation on both national and international platforms. The Institute remains the only state corporation in the Ministry of Environment, Climate Change and Forestry to hold both ISO certifications, underscoring its leadership in forestry research and environmental management.

Forest Conservation Trends in Kenya

AI-Driven Forest Conservation

In the lush forests of Ngong, a breakthrough technology is being used to combat illegal logging and deforestation. A Kenyan startup, M-Situ, is using artificial intelligence (AI) to monitor trees in real-time. The technology works by deploying devices on trees that detect changes in sounds and gases, which can indicate the presence of illegal loggers or fires. This system has already shown impressive results, with a 47% reduction in illegal logging within Ngong Forest alone.

The AI-powered devices capture data that helps authorities respond faster to threats, making it one of the most effective conservation tools in Kenya. By using technology to protect natural resources, M-Situ is setting a new standard for forest conservation not just in Kenya, but across Africa. This innovation could be a game-changer in the battle against deforestation, offering a high-tech solution to an age-old problem.



In addition to detecting threats, M-Situ's technology also contributes to forest restoration efforts. The AI system collects valuable data on tree health, helping conservationists identify areas that need reforestation or special care. By analyzing patterns in tree growth, soil moisture, and air quality, the system enables scientists to make informed decisions on where to plant new trees and how to improve forest conditions. This proactive approach ensures that Ngong Forest not only remains protected but also thrives for future generations.

Turning Agricultural Waste into Clean Energy



In Kenya, the reliance on firewood for cooking has long been a contributor to deforestation and air pollution. But GreenChar, a company founded by Tom Osborn, is changing this narrative. The company has developed a sustainable energy solution that turns agricultural waste into high-energy, smokeless charcoal briquettes. These briquettes offer a cleaner, more affordable alternative to traditional firewood, reducing the need for deforestation and improving air quality in homes.

What's even more remarkable is the impact GreenChar has had on communities. With over \$8.6 million in grants, the company has reached more than 40 million people, helping them transition to cleaner energy while reducing their carbon footprint. GreenChar is not just addressing Kenya's energy needs; it's also combating environmental degradation by promoting sustainable alternatives to traditional cooking methods.

As GreenChar continues to expand, its model serves as an inspiration for other nations facing similar challenges. By combining innovation with sustainability, the company is proving that economic growth and environmental conservation can go hand in hand. With ongoing investment in clean energy solutions, Kenya is paving the way for a future where communities no longer have to choose between affordability and sustainability—ensuring a healthier planet for generations to come.

KEFRI Participates in Migori County Agricultural Show

KEFRI Migori Sub-centre participated in the Migori County Agricultural Show from 3rd to 5th October, 2024. The theme of the 2024 show was “Promoting Climate Smart Agriculture and Trade Initiatives for Sustainable Economic Growth,” emphasizing the importance of adopting climate-smart initiatives in agriculture and trade for the purpose of sustainable economic growth.



Judges are informed about the various products on display

The Institute showcased its research findings and innovations in forestry, including research and development, tree seed species and production, information technology and agroforestry practices. The exhibits on display showcase practical applications of agroforestry systems to improve land productivity and sustainability, tree planting, nursery management, and soil conservation through different tree species.

The Sub-centre competed in various judgement categories and emerged position 1 in Theme interpretation; Best non-agricultural based statutory board stand; Best stand in research and development; Best stand embracing information technology and communication and position 2 in Best stand demonstrating the application of environmental quality standards and Best seed production and marketing stand.



Mazingira day



Standard Chartered Marathon 2024



Choir CSR Activities in Mombasa



END YEAR TEAM BUILDING

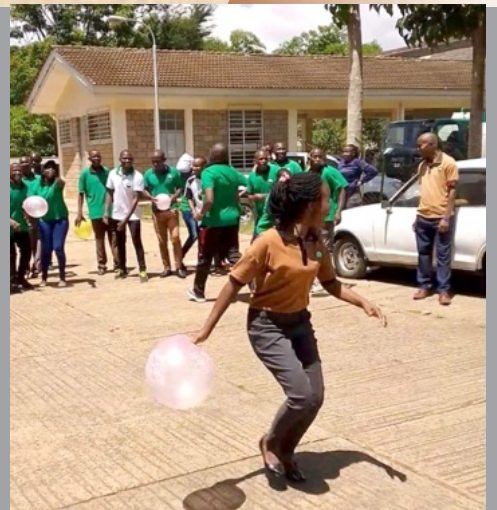
Headquarters



Kibwezi



Kitui



Graduations

Dick Ashira



Graduated with a Master of Business Administration from Kenyatta University and is a Human Resource Management Officer at KEFRI Headquarters.

Nicholas Kaila



Graduated with a Master of Science in Biodiversity and Natural Resource Management from the University of Nairobi and is a Research Scientist at Lake Victoria Basin Eco-region Research Programme (LVBERP) – Migori Sub-Centre.

Alice Adongo



Graduated with a Master of Science in Natural Resource Management from Egerton University and is a Senior Research Scientist at Rift Valley Eco-region Research Programme (RVERP) – Londiani.

Nixon Kilimo



Graduated with a Bachelor of Science in Analytical Chemistry from the University of Nairobi and is a Senior Laboratory Technologist at Coast Eco-region Research Programme (CERP) – Gede

Isacko Dokata



Graduated with a Master of Science in Environmental Science from Kenyatta University and is a Research Scientist at Rift Valley Eco-region Research Programme (RVERP) – Marigat-Sub Centre, Baringo.

Elizabeth Nyamache



Graduated with a Bachelor of Applied Biology from the Technical University of Kenya and is a Laboratory Technologist at Central Highlands Eco-region Research Programme (CHERP) – Muguga (Entomology Laboratory).

Deviniah Akinyi



Graduated with a Master of Science in Agricultural and Applied Economics from Egerton University and is a Research Scientist at Rift Valley Eco-region Research Programme (RVERP) – Londiani. University.

Mwaniki Musya



Graduated with a Bachelor's Degree in Biotechnology from the Technical University of Kenya and is a Laboratory Technologist at Central Highlands Eco-region Research Programme (CHERP) - Muguga (Biotechnology Laboratory).

Obed Sambula



Graduated with a Bachelor of Commerce in Procurement and Logistics from Kenyatta University and is an Assistant Supply Chain Management Officer at Coast Eco-region Research Programme (CERP) – Lamu Sub Centre.

Martin Kimani



Graduated with a Bachelor of Commerce in Finance from Kenyatta University and is an Accountant at KEFRI Headquarters (Cash Office Section).

Edith Wasike



Graduated with a Diploma in Human Resource Management from Jubilee College, Kitui and is an Administrative Assistant at the Main Registry at KEFRI Headquarters.

Staff Exit

P/No.	Name	Date of Exit	Mode of Exit
5978	Mary Kanyua	02/08/2024	Retirement
5575	Ancent Kiio Musau	09/08/2024	Retirement
6863	Hoster O. Owuor	06/08/2024	Retirement
6116	Samson Tobit	01/08/2024	Retirement
6147	Peter Kimani Muty	26/08/2024	Retirement
7036	Zaituni Chelangat	01/08/2024	Resignation
5938	Wallace Kariuki Waithanji	31/08/2024	Retirement
5946	David Kitur	11/10/2024	Retirement
6087	Elizabeth M. Waiganjo	27/09/2024	Retirement
5624	Mercy Wamukore Gichora	30/09/2024	Retirement
5887	Moses Muchiri Kagiri	15/09/2024	Retirement
7242	Judith Biaki Mochama	03/10/2024	Resignation
5938	Wallace K. Waithanji	30/09/2024	Retirement
6436	Peter K. Kungu	05/12/2024	Retirement
5603	Susan Gaceri Kiriinya	06/12/2024	Retirement
6202	Godfrey Daniel Odhiambo	18/12/2024	Retirement
6423	Phylis Cheruto Kiptoo	01/12/2024	Retirement
6271	Peter Miendo Sikhitiimi	01/12/2024	Retirement
6420	Charles Aguta Nyabuto	12/12/2024	Retirement
6209	Florence Oresia Malengwe	01/11/2024	Retirement
5218	Bernard Kimani Kigwa	01/11/2024	Retirement

Obituary

Shadrack Lubuin Leshan passed away on 25th December, 2024 through a fatal road accident in Lodwar, Turkana County. He was an employee of KEFRI at Turkana Forestry Sub-centre, Lodwar. Mr. Leshan will be dearly missed by KEFRI fraternity. He will be laid to rest on 11th January, 2025. May his soul rest in eternal peace.





End of year team building



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