

REPORT ON PROCEEDINGS OF KENYA'S HIGH-LEVEL FORUM ON ACCESS AND BENEFIT SHARING ARISING FROM SUSTAINABLE UTILIZATION OF INDIGENOUS KNOWLEDGE AND GENETIC RESOURCES



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“Theme: Kenya's Journey towards Unlocking a New Subsector of the Economy: Harnessing Indigenous Knowledge and Associated Genetic Resources for Sustainable Development”

UNLOCKING HIDDEN WEALTH IN KENYA

#HiddenWealthInKe





**KENYA'S HIGH-LEVEL FORUM ON ACCESS AND BENEFIT SHARING
ARISING FROM SUSTAINABLE UTILIZATION OF INDIGENOUS
KNOWLEDGE AND GENETIC RESOURCES**

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REPUBLIC OF KENYA



Ministry of Sports,
Culture & Heritage



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REPUBLIC OF KENYA

MINISTRY OF ENVIRONMENT AND FORESTRY



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CAPACITY
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L'INITIATIVE DE
RENFORCEMENT
DES CAPACITES
POUR L'APA



MINISTRY OF TOURISM & WILDLIFE

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- Government of Kenya
- Ministry of Sports, Culture and Heritage
- National Museums of Kenya's Natural Products Industry (NPI) Programme
- Natural Products Industry
- National, Vision 2030
- The BIG 4 - Empowering The Nation
- Ministry of Environment and Forestry
- Wildlife Research and Training Institute
- Kenya Forestry Research Institute (KEFRI)
- The Chandaria Foundation
- GIZ-GmbH, ABS Capacity Development Initiative
- Ministry of Tourism and Wildlife

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ABBREVIATIONS AND ACRONYMS

ABS	Access and Benefit Sharing
AIVs	African Indigenous Vegetables
ARIPO	African Regional Intellectual Property Organization
AU	African Union
BCP	Bio Cultural Protocol
CS	Cabinet Secretary
CBD	Convention on Biological Diversity
CBO	Community-Based Organization
CE	Cultural Expressions
CECM	County Executive Committee Member
CEO	Chief Executive officer
CIDP	County Integrated Development Program
CITES	Convention on International Trade in Endangered Species
CoG	Council of Governors
CoK	Constitution of Kenya
CoP	Conference of Parties
CTM & DR	Centre for Traditional and Drug Research
EMCA	Environmental Management and Coordination Act
GDP	Gross Domestic Product
GR	Genetic Resource
IK	Indigenous Knowledge
IKaCE	Indigenous Knowledge Associated Cultural Expressions
IKaGR	Indigenous Knowledge Associated Genetic Resources
ILO	International Labour Organization
IP	Intellectual Property

IPLC	Indigenous Peoples and Local Communities
IPRs	Intellectual Property Rights
ITPGRFA	International Treaty on Plant Genetic Resources for Food and Agriculture
JKUAT	Jomo Kenyatta University of Agriculture and Technology
KEBS	Kenya Bureau of Standards
KEFRI	Kenya Forestry Research Institute
KEMRI	Kenya Medical Research Institute
KFS	Kenya Forest Service
KIPI	Kenya Industrial Property Institute
KNATCOM	Kenya National Commission for UNESCO
KeNIA	Kenya National Innovation Agency
KRA	Kenya Revenue Authority
KU	Kenyatta University
KWS	Kenya Wildlife Service
LINKS	Local and Indigenous Knowledge systems
MAT	Mutually Agreed Terms
MIK	Medical Indigenous Knowledge
MOSCH	Ministry of Sports, Culture and Heritage
MSME	Micro, Small and Medium Enterprises
MTP	Medium Term Plan
NACOSTI	National Commission for Science and Innovation
NARSC	National Research Steering Committee
NBSAP	National Bio-diversity Strategy Action Plan
NEMA	National Environment Management Authority
NMK	National Museums of Kenya
NPI	Natural Products Industry
NRF	National Research Fund

OPDP	Ogiek Peoples Development Programme
PIC	Prior Informed Consent
PPB	Pharmacy and Poisons Board
PS	Principal Secretary
RC	Research Consortia
R&D	Research and Development
REPS	Research Priorities Delivery Secretariat
SDGs	Sustainable Development Goals
SMEs	Small and Medium Enterprises
SOP	Standard Operating Procedures
STI	Science Technology and Innovation
SWG_s	Sector Working Groups
TAM	Traditional and Alternative Medicine
TCE	Traditional Cultural Expressions
THPs	Traditional Health Practitioners
TK	Traditional Knowledge
TAM	Traditional Alternative Medicine
TM	Traditional Medicine
UEBT	Union of Ethical Bio-Trade
UNDP	United Nations Development Programme
UNEA	United Nations Environment Assembly
UNEP	United Nations Environment Programme
UNESCO	United Nations Educational, Scientific and Cultural Organization
USD	United States Dollar
WHO	World Health Organization
WIPO	World Intellectual Property Organization
WRTI	Wildlife Research and Training Institute

FOREWORD



The Ministry of Sports, Culture and Heritage, on behalf of the Government of the Republic of Kenya, hosted the High-Level Forum on Access and Benefit Sharing (ABS) Arising from Sustainable Utilization of Indigenous Knowledge and associated Genetic Resources. The theme of the high-level forum was “Kenya's Journey towards Unlocking a New Subsector of the Economy: Harnessing Indigenous Knowledge and Associated Genetic Resources for Sustainable Development”.

The high-level forum provides a unique opportunity for not only sharing experiences and lessons learned in our different jurisdictions

but consciously threads together the different nodes in the indigenous knowledge and associated genetic resources value chain to unlock this new sub-sector of the economy. It is notable that, globally, the creative economy, which includes the creativity arising from indigenous knowledge and genetic resources, is valued at USD 2.25 trillion and accounts for about 30 million jobs dating back to 2013. Multiple forecasts predict that the creative economy could represent 10% of global GDP before 2030. Similarly, in Kenya, the sector is the mainstay for many, averaging 5.3% of the country's GDP, as we target to double this number after this high-level forum.

However, there still remain key challenges including lack of full recognition of the vast socio-economic potential of indigenous knowledge intellectual assets and associated genetic resources, attendant misappropriation of these assets, lack of appropriate enablers and business models as well as unclear benefit-sharing plans thereby curtailing the harnessing of this sub-sector.

To address these challenges and fully harness this emerging sub-sector, a number of international and regional instruments have been put in place. These include: Convention on Biological Diversity (CBD), Cartagena Protocol, Nagoya Protocol, WIPO Treaties, CITES, UNESCO, ILO and various regional agreements such as ARIPO.

Guided by these international instruments, Kenya, through relevant Ministries and connected entities, has made definite strides to create the required ecosystem for harnessing this new sub-sector through formulation of enabling policy, legal, regulatory and administrative frameworks as the critical foundational steps in the country's ABS journey.

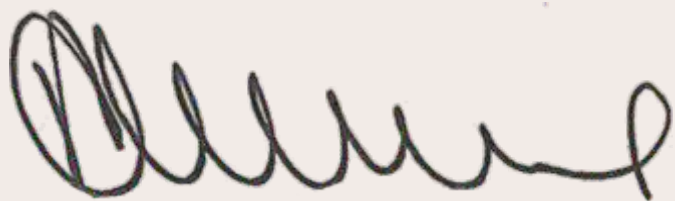
The enactment of "Protection of Traditional Knowledge and Cultural Expressions Act 2016 (TK & CE Act 2016), as amended in 2018, paved the way for identifying, prioritizing, protecting and promoting indigenous knowledge associated assets with clear provision for equitable sharing of resultant benefits between providers and users of these key resources.

The Ministry is in the process of operationalizing the TK & CE Act 2016, and to this effect, a multi-agency taskforce was gazetted to undertake this assignment. As the operationalization is ongoing, a pilot programme on indigenous knowledge documentation and digitization will be rolled out in thirteen counties to establish community and county digital registers and a national digital repository of indigenous knowledge associated assets in line with the TK & CE Act 2016. These digital registers and national repository will serve as platforms for negotiations on access and benefit sharing between resource providers and users.

Further, the platforms will also be critical in initiating value-addition programmes on indigenous knowledge associated assets. This will significantly contribute to the protection, promotion and development of such assets for the market place and trigger business in this sub-sector. The unlocking of IKaGR as a new sub-sector will contribute to the attainment of double-digit GDP in terms of new job opportunities, wealth creation, increased household incomes as well as enhance the livelihoods of our citizens.

I am optimistic that the resolutions contained in the communique emerging from the high-level deliberations will provide a clear roadmap for implementing the action points necessary to unlock the indigenous knowledge and associated genetic resources as a new sub-sector of our economy.

In conclusion, I would like to re-affirm the Government's commitment to harnessing this emerging sub-sector of the economy in collaboration with all the stakeholders. Finally, I express my sincere gratitude to everyone who played a role in organising, supporting and participating in the successful high-level forum.



Amb. (Dr.) Amina C. Mohamed, EGH, CAV

Cabinet Secretary, Ministry of Sports, Culture & Heritage

PREFACE



The State Department for Culture and Heritage took particular pride in hosting this unique and important high-level forum on exploring the vast potential of our indigenous knowledge and associated genetic resources. The State Department is keen to position culture as a centerpiece of our civilization and a key asset for socio-economic development as stipulated in the Constitution of Kenya.

The overall objective of the high-level forum was to offer a unique opportunity for national discourse on modalities of harnessing indigenous knowledge and associated genetic resources (IKaGR) as a new growth area of Kenya's economy.

The high-level forum aimed at achieving a number of objectives ranging from discussions on policy, legal and administrative landscape required for harnessing the IKaGR sub-sector in Kenya to exploring IKaGR as intellectual assets for market-oriented innovations through research and development whilst considering establishment of effective governance structures at county and community levels as platforms for access and equitable benefit sharing. The forum also considered mechanisms of promoting the future of IKaGR sub-sector in Kenya by empowering young champions for culture to ensure inter-generational equity and perpetuity.

The key outputs from the high-level forum included a commitment to an enabling policy, legal and regulatory framework for harnessing the IKaGR sub-sector; strategic partnerships required to operationalize the IKaGR value chain; a commitment to a national valorization strategy. Other key outputs included a commitment to initiate indigenous knowledge county digital registers and national repository as platforms for determining ownership, negotiating grant of access rights to IKaGR whilst providing for prior art for intellectual property protection; and a commitment to establish an Indigenous Knowledge Trust Fund to support initiatives on opening up the IKaGR sub-sector. The need to mainstream indigenous knowledge and associated genetic resources in formal and informal learning institutions to stem negative stereotypes and perceptions about our culture whilst entrenching and promoting the future of IKaGR sub-sector was also highlighted as a key output.

The high-level forum brought together key stakeholders including representatives from Office of the Attorney General, national government line ministries and agencies, county governments, academic and research institutions, indigenous peoples and local communities, young-champions-for-culture, development partners and the private sector.

The success of the high-level forum benefited from various strategies that had been put in place by the Ministry. Specifically, the Ministry constituted a multi-agency secretariat tasked with the responsibility of overseeing the whole process including the development of a detailed concept note for the forum. In addition, the secretariat identified four thematic areas revolving around the whole value chain of the IKaGR sub-sector and developed guiding notes for the Chairs and Panelists to manage various themes and topics.

The mode of delivery during the five (5) day high-level forum involved plenary and online (virtual) presentations from policy makers, regulators, indigenous peoples and local communities, young champions for culture, researchers and private sector; fishbowl discussions; spoken word (poems); and field excursions on practical engagement with the Waata community in Arabuko Sokoke Forest, Kilifi County. An able team of rapporteurs was also identified to capture the daily proceedings that informed the report. A multi-agency team was constituted to synthesize the forum outcomes and prepare the high-level forum report for dissemination with key resolutions and clear roadmap towards unlocking the IKaGR sub-sector as a new growth area of the economy.

Once again, the State Department is enthusiastic about the prospect of the emerging and new growth area of the economy and look forward to successful and productive unfolding partnerships.



Josephtha Mukobe (Ms.), CBS

Principal Secretary, State Department for Culture and Heritage

ACKNOWLEDGEMENTS

The National Museums of Kenya acknowledges the active participation of multiple and diverse stakeholders who contributed significantly to the success of the high-level forum on access and sharing of benefits arising from sustainable utilization of indigenous knowledge and associated genetic resources (IKaGR). Their consensus on the theme of the high-level forum that is to develop the IKaGR as a new growth area of the economy is gratefully noted.

Of particular note is the prominent role played by representatives from the Office of the Attorney General, National Treasury and Planning, Ministry of Health, Ministry of Tourism and Wildlife, Ministry of Environment and Forestry, State Department for Industrialization and State Department for Agricultural Research. Equally prominent was the role played by WRTI, NMK, DoC, NACOSTI, KEMRI, KIENA, NRF, NEMA, KEFRI, KIPI, KEPHIS, KNATCOM, KEBS, PPB, JKUAT, Pwani University, KAM, ABS Capacity Development Initiative, UNDP and UEBT participants. Further, the conspicuous role played by county government officials of Kilifi, Narok, Marsabit and Kakamega, leaders and representatives of bio-cultural protocols of the Ogiek, Endorois, The Maa Unity Forum amongst others, the young champions from Elgeyo Marakwet, Makueni, Murang'a, Nakuru and Siaya counties is highly commendable.

The kind and generous support extended by The Chandaria Foundation towards meeting some of the costs related to the participation of young champions of culture is gratefully recognized and appreciated. Equally, the financial and logistical support provided by the GIZ-GmbH through the ABS Capacity Development Initiative to enable the participation of indigenous peoples and local communities is remarkably acknowledged and applauded. The NMK's Natural Products Industry (NPI) Programme is particularly commended for leading and hosting the multi-agency planning secretariat as well as providing financial support for the successful holding of this high-level forum. The generous co-financing extended by the parent Ministry through the State Department for Culture and Heritage is equally applauded.

The multi-agency secretariat comprising NMK, DoC, Ministry of Tourism & Wildlife, Ministry of Environment & Forestry, NACOSTI, NEMA, WRTI and KEFRI are gratefully thanked for the leadership and hands-on organization of the high-level forum. Equally, the representatives of NMK, WRTI, State Department of Planning, KEFRI, Kakamega County Technical Committee on Access and Benefits Sharing and Indigenous Livelihood Enhancement Partners (ILEPA) are particularly appreciated for painstakingly preparing the comprehensive high-level forum draft report.

The exceptional role of the parent Ministry as the primary host of the high-level forum is acknowledged and applauded. Finally, the NMK, on behalf of the Ministry, is optimistic that the key resolutions adopted at the high-level forum will provide a road map towards the full realization of the IKaGR as a new growth area of the economy.



Mr. Stanvas Ongalo
Ag. Director General, National Museums of Kenya

EXECUTIVE SUMMARY

The Ministry of Sports, Culture and Heritage through the National Museums of Kenya's Natural Products Industry (NPI) Programme hosted a five-day high-level forum themed “Kenya's Journey towards Unlocking a New Sub-sector of the Economy: Harnessing Indigenous Knowledge and Associated Genetic Resources for Sustainable Development”.

The main objective of this high-level forum was to discuss the modalities of opening up the indigenous knowledge and associated genetic resources (IKaGR) sub-sector as a new growth area of the economy. Indeed, the participants took particular note of the fact that, globally, the value and market of the creative economy that includes the creativity arising from IKaGR is quite colossal and rapidly growing. The forum focussed on the need for creating enabling policy, legal and administrative frameworks tailor-made to spur innovations through research and development, manufacturing, marketing and critical partnerships and targeted investment necessary for harnessing the potential presented by IKaGR. With the enablers in place, the IKaGR will be unlocked as a new sub-sector contributing to the attainment of double-digit GDP in terms of new job opportunities, wealth creation, increased household incomes as well as enhancing recognition of the role of culture as a centrepiece for civilization and a strategic asset for sustainable socio-economic development.

The high-level forum report is structured in chapter form. Chapter one focuses on the introductory background and rationalizes the purpose of the forum by laying out the objectives and expected outputs. It also spells out the methodology deployed to organize and run the meeting and finally identifies all the key stakeholders and their respective roles in the IKaGR value chain. Chapters two through to five focus on four themes with a wide range of topics presented by experts in the subject areas. Finally, chapter six spells out the key resolutions and maps the way forward through a number of recommendations.

A brief overview of the thematic areas and key resolutions is hereby presented. Theme 1 titled “The regulatory framework in Kenya: Is it an enabler or an impediment? Making it work for the indigenous knowledge (IK) & genetic resources (GR) sub-sector”, sought to provide Kenya's current policy, legal and administrative landscape as it applies to the IKaGR sub-sector whilst identifying gaps and opportunities and highlighting experiences and lessons learnt. The theme also highlighted licensing and permitting as key tools for harnessing the IKaGR sub-sector. It was clear from the deliberations that awareness on the enormous potential of Kenya's IKaGR sub-sector remains low at national, county and community levels. It was also noted that the sub-sector remains untapped in spite of the progress made in the legal arena as reflected in the 13 domestic legislations under various line ministries guided by many multi-lateral and bilateral agreements. One challenge is that many laws lack supporting policies and regulations to give them effect. In addition, the current frameworks lack certainty and clarity thereby hampering maximization of benefits from IKaGR sub-sector. It is recommended to review and harmonize the policy, legal and administrative frameworks and procedures to incorporate emerging issues such as digital trade, digital sequence information, synthetic biology and intellectual property as well as integrate commercial aspects. Equally, a clear ABS legal framework with attendant guidelines and incentives will address the lack of a coordinated licensing and permitting process thereby facilitate grant of access rights and benefit sharing.

Theme 2 titled “Indigenous knowledge and genetic resources as intellectual assets for market-oriented innovations and equitable benefit sharing” focused on valorization of IKaGR intellectual assets for the marketplace by promoting innovation through research and development and enhancing market access by formulating appropriate product standards and enabling regulation. The theme also considered IKaGR product value chains and benefit sharing models and highlighted the imperative need for targeted investment to harness the IKaGR sub-sector. Some key observations highlighted by the speakers included a recognition of minimal valorization of the IKaGR resources despite their enormous potential, low R&D funding, lack of understanding of product value chains and markets, a lack of regulations, guidelines, procedures and standards on various products and practices on locally derived IKaGR thereby limiting consumer acceptability and wider market access. It was recommended that a national valorization strategy be formulated and promoted. Further, a vibrant R&D critical mass of actors with focus on this sub-sector, enhanced financial resource allocation at all government levels and mobilization of private capital to support value chains including development of IKaGR product standards and marketing processes will spur growth of the sub-sector.

Theme 3 titled “Effective governance structures at the community and county levels as drivers of access & benefit sharing arising from sustainable use of indigenous knowledge and genetic resources” addressed the need for capacity building and establishment of effective governance structures at the community and county levels to enable robust management of IKaGR-based intellectual assets for equitable sharing of benefits.

Lack of regulatory framework including procedures and guidelines for access of IKaGR, inability of counties and local communities to map IKaGR assets within their jurisdictions and failure of counties to prioritize the IKaGR sub-sector in the county integrated development plans compounded by lack of awareness of the value of IKaGR assets were identified as major challenges besetting the sub-sector.

It was noted that the involvement of local communities as resource owners/holders in decision-making especially on matters that involve access to IKaGR, negotiating grant of access rights through signing prior informed consent and mutually agreed terms agreements culminating in equitable sharing of benefits with users was a crucial priority. It was further noted that establishment of clear governance structures at county and community levels will promote business in this sub-sector. To achieve this, the national government is obligated under the Nagoya Protocol on access and benefit sharing to build capacity in terms of human capital of county governments. County governments are in turn obligated to support local community initiatives by developing enabling county policies, legislations and guidelines to maximize benefits arising from sustainable utilization and commercialization of IKaGR intellectual assets. It was resolved that documentation, protection and promotion of IKaGR through establishment of digital repositories at national, county and local community levels as stipulated in the TK & CE Act 2016 will ease access, provide clarity on ownership and prior art in intellectual property protection thereby curb misappropriation and spur innovation, home-grown product development and business opportunities in the IKaGR sub-sector.

Theme 4 titled “Shaping the future of indigenous knowledge and genetic resources in Kenya: Empowering young champions for culture” provided a context within which young Kenyans from different backgrounds can be galvanized, to not only champion for IKaGR sub-sector as a new growth area of the economy, but be real players in the IKaGR value chain.

By building their capacities, the young champions will gain meaningful participation in documentation, preservation and value addition of IKaGR intellectual assets thereby be part of the ownership of the emerging sub-sector and guarantee its sustainability while assuring intergeneration equity and perpetuity. The champions asserted that the young-champions-for-culture initiative presents an opportunity for using creative art to transform society through documentation, communication and transmission of IKaCE of our diverse cultures and reverse the negative stereotypes. To enhance the role of young champions in the emerging IKaGR sub-sector, it was resolved that institutional linkages between the youth, community, county, national and private sector actors in IKaGR value chain be strengthened to ensure effective engagement and representation of youth making them the face of the Natural Product Industry. Further, a National Indigenous Knowledge Trust Fund be established to build capacity and support various aspects of IKaGR involving the youths.

To offer the high-level forum participants first-hand experience with a practical example of a partnership between resource providers and users requiring an access and benefit-sharing plan based on prior informed consent (PIC) and mutually agreed terms (MAT), an excursion to Gede, Arabuko Sokoke village in Kilifi County was conducted. The participants visited the Waata community to witness

a case study on the use of *Abrus precatorius* (locally known as Mturi turi) seed as a natural contraceptive and learn from the on-going partnership between the local community and Kilifi county government, on one hand, as resource providers, and the NMK-NPI, MMK-IPR and KEMRI, on the other, as users. One of the key lessons from this excursion was the continued trust and optimism in the prospects of the partnership as expressed by the Waata community and Kilifi county government. However, it was noted that public disclosure of technical know-how on Mturi turi and proprietary rights thereof prior to finalization of the protection process was a grave concern.

In conclusion, the participants had an adequate opportunity to deliberate on the specified themes and a range of topics proposing a number of key resolutions on the way forward and outlining the stakeholders and their respective roles as spelled out in a communique that is part of this report.



Dr. Evans Taracha

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CHAPTERS

CHAPTER ONE

INTRODUCTION

1.1. Background

Sustainable utilization of cultural and natural resources is key to industrialization and economic growth of any country. Globally, the creative economy, which includes the creativity arising from indigenous knowledge and associated genetic resources (IKaGR), is valued at USD 2.25 trillion and accounts for about 30 million jobs dating back to 2013. Multiple forecasts predict that the creative economy could represent ten per-cent (10%) of the global Gross Domestic Product (GDP) before 2030. In this regard, deliberate and focused investments in the utilization of cultural and natural resources will generate valuable assets that will contribute to the marked growth of the national economy and increase the country's GDP.

Kenya is endowed with an abundance of natural resources including plants with high medicinal, cosmetic and nutritional value that is not fully utilized locally. In addition, Kenya's unique cultural heritage that is handed down through generations by cultural transmissions makes the country a perfect destination for archaeologists, cultural anthropologists and international tourists. Today, formal education systems have disrupted the practical everyday life aspects of indigenous knowledge and ways of learning, replacing them with abstract knowledge and academic ways of learning. Consequently, there is a grave risk of losing indigenous knowledge and, along with it, valuable knowledge about ways of living sustainably. Therefore, deliberate efforts need to be made to tap into the IKaGR of our cultural heritage and create awareness of the value of such key resources particularly their potential contribution to sustainable development.



The Constitution of Kenya 2010 recognizes the role of culture, indigenous knowledge, science, and protection and utilization of biodiversity in national development. Kenya is making steady progress in terms of domesticating the Nagoya Protocol on fair and equitable sharing of benefits arising from authorized access and sustainable utilization of TK and associated GR. The domestication of the Nagoya Protocol along with the implementation of the different relevant national legislations will significantly impact the harnessing of the IKaGR sub-sector in terms of creating the enabling environment to facilitate valorization (value-addition) of IKaGR for the marketplace.

Notably, the Government of Kenya has enacted a legislation termed Protection of Traditional Knowledge and Cultural Expressions Act 2016 (TK & CE Act 2016). The enactment of the TK & CE Act 2016 paved the way for identifying, protecting and prioritizing TK and associated GR earmarked for valorization for the marketplace. To operationalize the TK & CE Act 2016, the Ministry of Sports, Culture and Heritage constituted and gazetted an inter-agency National Taskforce in 2021 to develop rules and regulations to operationalize the TK & CE Act 2016 that will promote innovation and generate intellectual assets for the market place.

Further, the Ministry of Sports, Culture and Heritage has initiated a roll-out of the documentation and digitization of IKaGR as a pilot programme in thirteen (13) counties to establish community and county digital registers and a national repository for IKaGR in line with the TK & CE Act 2016. In addition, to promote home-grown innovations that will lead to development and manufacture of niche products that meet national and international standards, the Government is implementing the Natural Products Industry (NPI) Programme, which is a flagship project of the Kenya Vision 2030. The NPI Programme, which is premised on allowing indigenous knowledge systems drive market-oriented innovations, aims at building a vibrant natural products industry through development and exploitation of an interface between indigenous knowledge, on one hand, and modern science, technology and business, on the other, under an enabling policy, legal and regulatory environment.

In view of the foregoing, the Ministry of Sports, Culture and Heritage through the NPI Programme within the National Museums of Kenya (NMK) convened a high-level forum to showcase Kenya's journey on access and benefit sharing (ABS) arising from sustainable utilization of TK and associated GR. The high-level forum offered a unique opportunity for national discourse on harnessing IKaGR as a new growth area of Kenya's economy and placing culture as a centrepiece of civilization and socio-economic development. When fully realized, this new sub-sector will contribute immensely to the attainment of the Kenya Vision 2030 development goals and the "Big Four" Agenda particularly the food security and enhanced nutrition, universal health and manufacturing pillars as well as contributing to establishment of cottage industries in counties based on county-unique prioritized and documented TK-based intellectual assets and products.

1.2. Objectives

The overall objective of the high-level forum was to offer a unique opportunity for national discourse on modalities for harnessing indigenous knowledge associated genetic resources as a new growth area of Kenya's economy and placing culture as a centre-piece of civilization and socio-economic development.

The specific objectives were to:

- i. To discuss the policy, legal & administrative landscape for the indigenous knowledge associated genetic resources sub-sector in Kenya;
- ii. To explore indigenous knowledge and genetic resources as intellectual assets for market-oriented innovations and equitable benefit sharing;
- iii. To establish effective governance structures at county & community levels as platforms for access and benefit sharing; and
- iv. To promote the future of indigenous knowledge and genetic resources in Kenya by empowering young champions for culture.

1.3. Expected Outputs

It is expected that the recommendations from the high-level forum will trigger broad-based discussions on:

- i. Commitment to the need for an enabling legal and policy framework to spur investment in the indigenous knowledge and genetic resources sub-sector achieved;
- ii. Public and private partnerships aimed at harnessing the indigenous knowledge and genetic resources sub-sector enhanced;

- iii. Indigenous knowledge and genetic resources brand ambassadors created to promote local content;
- iv. A national valorization team on indigenous knowledge and genetic resources established;
- v. Resource mobilization from Government of Kenya funding and development partners to support indigenous knowledge and genetic resources sub-sector mainstreamed;
- vi. Commitment to incorporate indigenous knowledge and genetic resources in formal and informal learning institutions;
- vii. Commitment to initiate indigenous knowledge county digital registries and national repository for protection and spurring of socio-economic development;
- viii. Commitment to strengthen the intellectual property policy framework that is well coordinated and responsive to changing needs of the scientific and technological sector taking consideration of indigenous knowledge and genetic resources; and
- ix. The country's rich indigenous knowledge and genetic resources showcased.

1.4. Methodology

The success of the high-level forum benefited from various strategies that had been put in place by the Ministry of Sports, Culture and Heritage. Specifically, the Ministry constituted an inter-agency secretariat tasked with the responsibility of overseeing the whole process including the development of a detailed concept note for the forum. In addition, the inter-agency secretariat identified five (5) thematic areas revolving around the whole value chain of the TKaGR sub-sector and developed guiding notes for the Chairs and Panelists to manage various themes and topics.

The mode of delivery during the five (5) day high-level forum involved plenary and online (virtual) presentations from policy makers, regulators, indigenous peoples and local communities, young champions for culture, researchers and private sector; fishbowl discussions; spoken word (poems); and field excursions on practical engagement with the Waata community in Arabuko Sokoke Forest, Kilifi County. An able team of rapporteurs were also identified to capture the daily proceedings that informed the report. An inter-agency team was constituted to synthesize the forum outcomes and prepare the high-level forum report for dissemination with key resolutions and clear roadmap towards unlocking the TK and GR sub-sector as a new growth area of the economy.

1.5. Target Stakeholders

The high-level forum targeted all the stakeholders of the TKaGR value chain. These include:

- i. Indigenous peoples and local communities who are the holders of indigenous knowledge and traditionally accumulated skills;
- ii. Academia, universities and research institutions who provide scientific interrogation and innovation;
- iii. The business community who are key for incubation and commercialization of the scientifically validated indigenous knowledge intellectual assets;
- iv. The youth who serve as champions of culture and hence will ensure sustainability;
- v. National and county government representatives who provide oversight, policy, legal, regulatory and administrative measures: and
- vi. International development partners who offer support and oversight in ensuring best practices.



CS. Amb. Amina Mohamed addressing the ABS High-Level Forum during the opening ceremony

1.6. Remarks by some of the high-level participants during the opening ceremony

Attorney General's Representative: Ms. Catherine Bunyassi Kahuria – Senior State Counsel, Office of the Attorney General & Department of Justice

Ms. Catherine Bunyassi appreciated Kenya's journey since 2006 when a committee was constituted to come up with a policy to address issues of copyrighting, Intellectual Property rights on matters IK and GR. She noted that the enactment of TK & CE Act, 2016 fulfilled the Constitutional provisions of Article 11 on Culture, Article 40(5) on Intellectual Property (IP) and Article 69 on obligations in respect to Environment.



Senior State Counsel, OAG/DoJ, Ms. Catherine Bunyassi Kahuria Representing the Hon. Attorney General during the ABS High-Level Forum.

Although she commended the Ministry of Sports, Culture and Heritage in spearheading the implementation of the TK & CE Act, 2016, she noted that there have been several petitions from local communities for instance, the Maa Unity of Professionals on the access and benefit sharing arising from their indigenous knowledge (IK). Ms. Bunyassi appreciated their concern and reiterated the need for local communities to benefit from their culture in terms of all protocols Kenya has signed and ratified be it non-monetary or monetary benefits.



CAS, MoH. Dr. Rashid Aman making remarks during the ABS High-Level Forum

**Dr. Rashid Aman, Chief Administrative Secretary,
Ministry of Health**

Dr. Rashid Aman felt honored and delighted to be part of the discourse on Traditional Knowledge (TK) and Genetic Resources (GR). He began by thanking the Cabinet Secretary (CS), Ministry of Sports, Culture and Heritage for the concerted efforts in fully embracing the new developments in the emerging sub-sector of harnessing TK and associated GR.

He called on the Ministry of Sports, Culture and Heritage to seriously look at how to re-orient the mandate of the National Museums of Kenya (NMK). He argued that the NMK agenda will be best served if it is repositioned as a competent institution to serve as a national repository on indigenous knowledge, both tangible and intangible.

***Amb. Simon Nabukwesi, Principal Secretary, State
Department for University Education and Research***



Amb. Simon Nabukwesi, PS, State Department for University Education and Research contributing to discussions during the ABS High-Level Forum

The PS was glad to note the presence of the Director General of National Commission for Science, Technology and Innovation (NACOSTI) together with the Chief Executive Officer (CEO), National Research Fund (NRF) during the high-level forum on TK and GR. This is because of the need to see how these institutions can integrate and work with Ministry of Sports, Culture and Heritage (MOSCH) in addressing the issues of TK and GR in order to preserve the flora and fauna that is rapidly getting extinct and being urgently replaced by exotic products.

The PS commended the Cabinet Secretary for taking leadership in this new emerging growth area of economy and noted that the forum marked the beginning of what needs to be done to put in place mechanisms in the interest of the nation and humanity.

Principal Secretary's Representative:
Mr. Waweru Kamau, Director, Social and Governance, State Department for Planning.

Mr. Waweru Kamau acknowledged that the high-level forum was timely especially in light of the national planning agenda since the government was embarking on the preparation of the Fourth Medium Term Plan (MTP IV). In addition, he underscored that the desire for Kenya to ultimately become a knowledge-based economy was envisaged in the Kenya Vision 2030. He reported that a review of the existing policies in Kenya that was undertaken by the State Department for Planning showed that whereas there is no vacuum in the policy, legal and institutional landscape for knowledge management practices and promotion of indigenous people and the resources thereof, some gaps still existed.



Mr. Waweru Kamau, Director, Social & Governance, Representing PS, State Department for Planning, moderating a session during the ABS High-Level Forum

It is against this background that the State Department for Planning in collaboration with various stakeholders developed the Knowledge Management Policy for Kenya which was reported as being at an advanced stage of finalization. He highlighted the recommended policy provisions. Key among them include, promotion of research, innovation and technology for innovative initiatives and adoption of appropriate technologies, strengthening of existing knowledge sharing networks and communities of practice, and protection and commercialization of knowledge. He further reported that the policy proposes an institutional and administrative landscape involving all stakeholders to guide the implementation of the policy in various sectors.

Whilst highlighting the overall goal of the policy titled “To enhance entrenchment of knowledge management for socio-economic development in Kenya”, he proposed the need to establish a comprehensive policy and institutional framework to guide the country's efforts in managing and harnessing indigenous knowledge and genetic resources for sustainable development.



Mr. Cyrus Mageria, Director, Multilateral Environmental Agreements, Ministry of Environment and Forestry, moderating a session and contributing to deliberations during the ABS High-Level Forum.



Dr. Evangeline Njoka, CEO, Kenya National Commission for UNESCO (KNATCOM) making a presentation during ABS High-Level Forum.

Principal Secretary's Representative: Mr. Cyrus Mageria, Director of Multilateral Environmental Agreements, Ministry of Environment and Forestry.

Mr. Cyrus Mageria was glad to be part of the discussion as it is in line with their Ministry's mandate. He noted that if Kenya could harness TK and GR, this would move the country to the next level in terms of ensuring that our resources are sustainably utilized for the benefit of all generations. He reiterated the fact that issues that were being discussed on matters ABS were very critical and important to the Ministry of Environment and Forestry and he believed that collectively, a workable programme can be developed so that even our resource providers can benefit from being custodians of the resources. In addition, he noted that as we move towards industrialization, it's important to come up with measures and means that will protect and ensure that the resources are sustainably utilized for intergenerational equity as far as natural resources are concerned are achieved.

Dr. Evangeline Njoka, Chief Executive Officer, Kenya National Commission for UNESCO (KNATCOM)

Dr. Njoka began by thanking the organizers of the forum as it resonated well with their mandate of promoting the conservation and preservation of culture and therefore are very critical stakeholders as they work with various local communities. She noted that communities have raised issues concerning TK and GR and therefore are better placed to contribute on the best practices of UNESCO in dealing with them.

Drawing on a number of programmes that UNESCO and KNATCOM are involved in, Dr. Njoka recognized the role of Natural Science Frameworks & Designations in promoting protection of indigenous knowledge and genetic resources as well as access benefit sharing. Among these include Local and Indigenous Knowledge Systems (LINKS) Programme which promotes inclusion in global climate science and policy processes.

LINKS has been influential in ensuring that local and indigenous knowledge holders and their knowledge are included in contemporary science-policy-society fora on issues such as biodiversity assessment and management.

Dr. Njoka highlighted that Kenya has seven natural and cultural sites designated as UNESCO World Heritage Sites. These sites have great potential to contribute to the improvement of livelihoods of local communities living around them if managed well. They can become hubs for production of unique branded cultural products based on community diverse cultural expressions and associated genetic resources thus contributing to sustainable development.

She affirmed that safeguarding the diversity of languages is crucial to protecting both cultural and biological diversity as evident in the contribution that Indigenous knowledge can make towards climate action, biodiversity, food security, health, land and water management as well as resolving conflict among local communities to promote peace. An example is, during the pandemic, many people in Kenya, treated COVID 19 symptoms at home using indigenous and traditional knowledge and plants for treating flu (Dawa).

Taking note of the remarks made by the CS, highlighting that the Ministry is rolling out a programme on IK Documentation and Digitization in line with the TK&CE Act 2016, Dr. Njoka appreciated the huge potential for partnership that exists between MOSCH and KNATCOM.



Ms. Elizabeth Lolchoki, County Secretary, Narok County Government making a presentation and contributing to discussions during ABS High-Level Forum.

Ms. Elizabeth Lolchoki, County Secretary, Narok County Government.

On behalf of all the county governments, the representative from Narok County Government, indicated that counties across the country have a lot to offer on matters culture and were fully in support of the initiative of harnessing sustainable utilization of TK and GR as a new growth area of the economy. She was also optimistic that most counties have a lot of hidden wealth that can benefit from value addition on natural resources and generation of natural products. She called on the national government and other stakeholders to support sustainable utilization and commercialization of TK and associated GR resources.

Mr. Geoffrey Omedo, Portfolio Analyst, United Nations Development Programme (UNDP) - Kenya.

On behalf of UNDP Resident Representative in Kenya, Mr. Omedo appreciated the CS for the good work she did during her tenure at UNEP and good work she is doing for the country. He appreciated the great partnership the Government of Kenya has with the UN System especially UNDP. He underscored the five areas that UNDP has been able to work with the Government:

1. Strengthening capacity for key relevant staff of both national and county governments;
2. Assisted the Government of Kenya (GoK) to come up with the Country Position on implementation of the Nagoya Protocol - COP mop 3 (Country Position Digital Sequence, Country Interim Report);
3. Supported the 10th Anniversary celebrations of Nagoya Protocol;
4. Worked with different partners to define and prepare a draft legal framework on Access and Benefit Sharing; and
5. Supported NACOSTI and partners to develop the national guidelines on intellectual property rights policy on research and development



Mr. Geoffrey Omedo, Portfolio Analyst, UNDP – Kenya making a presentation and leading discussions during ABS High-Level Forum.

He recommended the need to establish robust governance structures that will bring the local communities, counties and national government together.

Dr. Hartmut Meyer, Team Leader, GIZ-GmbH ABS Capacity Development Initiative.

Dr. Meyer began by noting that the ABS forum was a unique and an important event as high-level representatives from key ministries of the Government of Kenya were in attendance. He further noted that the government officials are actively promoting the use of traditional knowledge (TK) of Indigenous Peoples and Local Communities (IPLCs) of Kenya especially in the context of developing high value products such as medicines.



Dr. Hartmut Meyer, Team Leader, GIZ-GmbH ABS Capacity Development Initiative making a presentation and leading discussions during ABS High-Level Forum.

He underscored the fact that Natural Products Industry (NPI) is a flagship project under the Kenya Vision 2030 that works, amongst others on research and development (R&D) of COVID-19 medicines based on plant-based ingredients and IK. He added that NPI activities are in line with the World Health Organization (WHO) Strategy for Africa region on the role of traditional medicines in enhancing health system.

He recognized that ABS initiative in Kenya has hitherto undertaken the following:

1. Supporting the country in development of a national online permitting system akin to the one-stop shop approach;
2. Supporting a pilot project on ABS capacity building in three counties; Kakamega, Baringo and Laikipia; and
3. Supporting capacities of IPLCs in governance structures (e.g. bio-cultural protocols), participation in international meetings and ABS contract negotiations and awareness creation.



Mr. Morara Matunda, Head of Human Resource Representing Dr. Manu Chandaria, The Chandaria Foundation making remarks during ABS High-Level Forum.

The Chandaria Foundation Representative: Mr. Morara Matunda, Head of Human Resource.

Mr. Matunda, speaking on behalf of The Chandaria Foundation began by passing apologies from Dr. Manu Chandaria who had expressed a desire to personally participate in this forum. He applauded the decision by government to hold the high-level forum that provided a unique opportunity for the country to sustainably utilize TK and associated GR. Noting that The Chandaria Foundation has set up an incubation Centre at Kenyatta University (KU) for start-up initiatives, he pledged to support projects that can benefit from this facility. He concluded by looking forward to the outcomes of the high-level forum to explore possible partnerships.

Mr. Ranjit Krishna- Private Sector

Mr. Krishna was pleased to attend the high-level forum to explore the opportunities that the private sector can be able to tap in terms of how to build and commercialize the enormous natural resources that Kenya has in a sustainable manner. While expressing interest of the investors in exploring the natural bio-resources of Kenya that could be used to develop commercially viable products in a responsible manner, his expectation from the high-level forum is to gain relevant information and contacts to enable the investors start the process of engagement.



Mr. Ranjit Krishna- Private Sector, Asia Star Global making remarks during ABS High-Level Forum.

He made the following observations:

1. There needs to be a concerted, systematic and regular "out-reach program" that brings to the national dialogue a steady stream of both internal and external industry players and prospective investors. Such prospective investors and corporate players should be an integral part of this national conversation from the very beginning, so that they are partners in formulation of policy, process and commercialization.
2. There was a great deal spoken about a single-window facility. While that is certainly important to have, that in itself is inadequate. There should also be focus in ensuring a "single nodal agency" that will be the first point of contact for all commercial entities and will thereafter inform, support and shepherd investors/said commercial entities through the regulatory system and ensure the interests of all stakeholders are protected.
3. Far more investment needs to be made from the Government in identifying, researching and developing the bio resources of Kenya. At the moment information and actionable knowledge about the medicinal properties of native flora appears to be at a nascent stage.
4. From an investor's point of view, despite several presentations from different agencies on the first two days regarding ownership, patents, copyrights etc, there is a lack of clarity about ownership of IP.
5. It is noted that communities are holders of indigenous knowledge and agencies and or scientists seeking to explore it will need clear structures for engagement to access these resources.

The key questions are?

- Who plays the biggest role, who represents each of them and how are they to be compensated?
 - How do we know that we are speaking to the right representatives/ the appropriate counter-party?
 - How do we ensure that we are speaking to and have the concurrence of the entire community?
 - How do we protect ourselves, in the years to come, against the possibility of challenges in Court by dissenting voices in the communities, with regards to the agreement we sign with them?
6. Investors ultimately seek a clear and just law that is transparent and fair to all and one that remains internally consistent over time. He recognized the necessity of clarity and certainty of the laws.

CHAPTER TWO

THEME 1: THE REGULATORY FRAMEWORK IN KENYA: IS IT AN ENABLER OR AN IMPEDIMENT? MAKING IT WORK FOR THE INDIGENOUS KNOWLEDGE (IK) & GENETIC RESOURCES (GR) SUB-SECTOR

The main issue was to understand the existing regulatory framework in relation to the TK and Genetic resources sub-sector in the country. Further, the theme sought to establish if the existing regulatory mechanism is an enabler in unlocking the existing potential in the country's TK and GR wealth as a new sector of the economy. The theme was divided into three topics which brought on board various key speakers representing key line ministries and sub-sectors.

2.1 Topic 1: Current policy, legal & administrative landscape for harnessing IK & GR sub-sector in Kenya

Chair: Mr. Waweru Kamau, Director, Social and Governance, on behalf of Mr. Joel Saitoti Torome, CBS, PS, State Department for Planning, The National Treasury and Planning.

Contributors:

1. Ms. Josephtha Mukobe, CBS, PS, State Department for Culture and Heritage
2. Amb. Simon Nabukwesi, PS, State Department for University Education and Research
3. Mr. Cyrus Mageria, Director, Multilateral Environmental Agreements, Representing PS Ministry of Environment and Forestry
4. Ms. Catherine Bunyasi, Senior Counsel, Representing the Office of the Attorney General





Key highlights of the presentations

Kenya is endowed with vast resources on traditional knowledge and genetic resources. Undoubtedly, this sub-sector holds key potential on the country's economic growth. It is important to understand the key elements required to unlock this new sub-sector of the economy in the country. One of the keys to unlocking include understanding the existing legal and regulatory frameworks that will significantly contribute to realization of this sub-sector.

Presentations were made by key ministries responsible for management of indigenous knowledge and genetic resources on the status of the legal and policy framework required to unlock the existing potential in this sub-sector. It was realized that the country has ratified a number of multilateral environmental agreements, including various legislative and policy frameworks that are implemented by relevant institutions. The varied legislative frameworks, multiple regulatory institutions, lack of clear coordination mechanisms between the national government and county governments were cited by various speakers as impediments towards realization of the potential presented by this sub-sector.

The speakers highlighted efforts being undertaken to create enablers to realize the potential existing within the sub-sector. The Ministry of Sports, Culture and Heritage has established a multi-sectoral taskforce to develop regulations and areas for amendments to operationalize the TK & CE Act 2016. The Ministry used the opportunity to call upon participants to propose areas for possible improvement of the Act. In addition, the Ministry is planning to pilot documentation and digitization of indigenous knowledge associated intellectual assets in 13 counties leading to the establishment of IK digital registers that will open up new frontiers and generate wealth arising from the country's TK and associated assets. The Ministry of Environment and Forestry has initiated capacity building targeting various stakeholders on ABS and has also developed National Biodiversity Strategy Action Plan (NBSAP) which captures the TK & ABS issues.

It was noted that partnership and collaboration on resource mobilization among key stakeholders is crucial to harnessing this sub-sector. Further, it was recommended that the Ministry of Sports, Culture and Heritage work closely with the Ministry of Education specifically KeNIA, NACOSTI, NRF, universities and research institutions in order to valorize the TK and GR for the market place. Furthermore, there is need to mainstream aspects of TK & GR within the key sectors of the economy. There is also need to streamline permitting and licensing including digitization at all levels of Government for ease of doing business. Prioritization of TK & GR in the Fourth Medium Term Plan (MTP IV) and County Integrated Development Plans (CIDPs) is key to ensuring adequate resources are allocated to the sub-sector. To enhance service delivery, speakers alluded to the need to strengthen existing institutions and explore possibility for a competent authority on matters of TK & GR.

Key Discussion Points

- i. In order for the economic potential of IKaGR sub-sector to be fully realised, there is need to build capacities of the counties and local communities. The effective implementation of the TK & CE Act 2016 and related legislations by the county governments will facilitate the realization of this sub-sector.
- ii. There is need to review and harmonize the existing regulatory framework that relate to the TK & GR sub-sector for ease of doing business and optimizing benefits.
- iii. There is need to review the existing institutional arrangements that support the TK&GR sub-sector with the view of strengthening their capacity to deliver on their mandate including exploring the possibility of establishing a competent authority.
- iv. The CS, Ministry of Sports, Culture and Heritage to consider initiating dialogue with counties through the Council of Governors (CoG) and Inter-Governmental Technical Relations Committee (IGTRC) for realization of the TK and GR sub-sector of the economy.
- v. Ministry of Sports, Culture and Heritage to develop a valorization strategy in collaboration with various stakeholders including relevant national government institutions, county governments, local community representatives, academia / research institutions, development partners and the private sector.

- vi. There is need for the sub-sector to sensitize the policy makers on the existing potential of the hidden wealth, which if explored effectively, will generate income for the whole economy.
- vii. All interventions geared towards harnessing the TKaGR sub-sector should consider community land rights.
- viii. There is need to have a sustainable resource mobilization strategy for TK and GR sub-sector at all levels of government. Prioritization of TK & GR in the Fourth Medium Term Plan (MTP IV) and County Integrated Development Plans (CIDPs) is key to ensuring adequate resources are allocated to the sub-sector.
- ix. It was realised that there are some inventories of TK intellectual assets both at national and county levels which are not regularised within the TK & CE Act 2016. There is need to incorporate data in these inventories in the TK digital registers and national repository when they are established for protection and promotion to maximize benefits.
- x. Lack of proper mentorship programmes for the youth was cited as a major challenge on the preservation of culture, TK and CE in the country. Therefore, there is need to create robust programmes at all levels in order to preserve, safeguard, and promote culture, TK and CE.

2.2 Topic 2: What gaps & opportunities exist in Kenya's policy & legal framework to spur the IK & GR sub-sector? Experiences/lessons learnt

Chair: Mr. Joseph Mutuku Mbeva, Director, Directorate of Field Services, Ministry of Industrialization, Trade and Enterprise Development.

Contributors:

1. Mr. Mukonyi Kabaka Watai, OGW, Representing Secretary, Wildlife
2. Prof. Gideon Nyamasyo, Expert in ABS Matters
3. Dr. Evans Taracha, Coordinator NPI





Key Highlights of the Presentations

The speakers showcased the country's potential in TK & GR sub-sector as a new growth area of the economy. There is increasing trend on consumer preference for natural products globally. The existing data from Kenya Revenue Authority (KRA) shows that the country imports huge quantities of natural products demonstrating the existing huge demand for these products. To unearth this hidden wealth, there is need to come up with homegrown solutions in terms of enabling policy, investment in R&D and enhancing market access, both locally and internationally.

There are countries such as China, India and Brazil which have put enabling mechanisms in place leading to the harnessing of this sub-sector and provide good examples to benchmark with for best practice.

An effective legal framework that promotes R&D is key to value addition initiatives as it will contribute in attracting business in the TK & GR sub-sector ultimately leading to conservation, sustainable utilization, wealth creation and livelihood improvement. The country is obligated to various international commitments and has ratified a number of multilateral environmental agreements. Further, despite the fact that the country has legislated over 13 laws regulating the TK & GR sub-sector, the country still has challenges on enforcement and compliance in this sub-sector.

The speakers presented a wide range of experience resulting from practical implication of the existing laws in relation to the subject matter. Legal frameworks that provide certainty and clarity coupled with transparency with clear procedures is a trigger to realizing benefits in the TK & GR sub-sector. It was realized that most of the existing laws lacked policies and guidelines for their effective implementation. For example, in the wildlife sector, it was noted that in as much as there is a policy, the regulations pertaining to the wildlife sector do not exist. The TK & CE Act 2016 also lacks regulations, guidelines and procedures.

The existing ABS Regulations 2006 and Environmental Management & Coordination Act (EMCA) 1999 were drafted before the promulgation of the Constitution 2010 and prior to the Nagoya Protocol. The Nagoya protocol requires parties to develop appropriate domestic measures and procedures to guide both users and providers on roles and responsibilities and grant of user rights. Lack of a clear framework on ownership and roles and responsibilities and grant of user rights on TK & GR was noted as a major gap. For example, on the aspect of licensing and permitting there were disparities. With regards to access and utilization of TK & GR resources, various licensing and permitting processes are required. This gap has not been streamlined between the national and county governments. Further, various county governments are making different laws on access and utilization of TK & GR within their jurisdiction.

The bio-trade required different licenses for example ABS requirement, licenses under wildlife service, licenses under forestry, licenses under Counties and licenses under Kenya fisheries services. This multiple approval system poses a major challenge to creating an enabling business environment in this sub-sector.

The speakers further presented various practical examples that have informed the current gaps in existing laws and proposed areas of improvement. The NPI presented the COVID 19 project, the natural contraceptive (locally known as Mturi turi) and capacity building on IK documentation, preservation and application. The COVID- 19 project is funded by the Government of Kenya and focusses on utilizing local communities' indigenous knowledge and the associated GR. Mturi turi project is also funded by the Government of Kenya with focus on Waata community's ways of life in family planning. These two projects required Prior Informed Consent (PIC) and Mutually Agreed Terms (MAT) between provider and users of the resources. As per the existing legal framework, one is required to have approvals from relevant agencies, county governments and local communities.

The key challenge was that there were no structures at the county government and local community levels to guide the process of negotiation leading to PIC and MAT. In respect to capacity building, there were very low levels of awareness on TK&CE Act 2016 at the county level and mechanisms of its implementation had not been established.

The Ministry of Tourism and Wildlife is in charge of grant of user rights under Wildlife Act 2013. The wildlife bio-diversity sub-sector contributes about 10% of the country's GDP in form of tourism and 9% with regards to informal sector employment. There are various types of businesses arising from utilization of wildlife ranging from service industry, filming, research and development and now the focus is on diversification of products targeting different market channels which require different legal frameworks.

Resource misappropriation, illegal wildlife trade for various uses and weak legal framework for enforcement and compliance remain a challenge in streamlining business in wildlife sub-sector. The Ministry showcased various bio-piracy cases and litigation highlighting the existing gaps. In addition, a great deal has been learnt from the soda-lakes projects funded through KWS demonstrating practical ways of implementation of the ABS mechanism thereby informing policy and legislative process. Under this project, we have model ABS agreements and ABS-based management plans which are being up-scaled in various counties within Kenya and other countries.

The strategic management of intellectual property issues in an access and benefit-sharing (ABS) agreement can influence the degree to which providers and users of genetic resources and associated indigenous knowledge can achieve their goals and serve their mutual interests. The IP legal framework in the country has not been adequately tailor-made to trigger benefits arising from the IKaGR sub-sector. The IK registers and digital repository which play major role in protection of IK related IP are key tools for business transaction at county level have not been established as per the law. Also, emerging issues of digital trade are not regulated under the existing legislations and cause a major threat of optimizing benefits to the providers. Finally, another challenge relates to the failure of research institutions and universities to realign their IP policies with existing ABS laws.

Key Discussion Points

- i. The Ministry of Sports, Culture and Heritage to develop a policy framework that is explicit in defining the key nodes in the indigenous knowledge and genetic resources value chain and specify mechanisms and incentives needed to mobilize the requisite investment to operationalize the value chain. This will include operationalization of the TK & CE Act 2016 and setting up administrative mechanisms to manage TK associated assets.
- ii. The Office of the Attorney General to consider putting in place mechanisms to harmonize the existing legislations on IK and GR sub-sector to facilitate business and attract investment. It was noted that contradicting domestic laws on IK and GR sub-sector is not good for business.
- iii. There is need to have a substantive ABS law with clear procedures, incentive mechanisms and guidelines on access, utilization and benefit sharing of the country's IKaGR. In this respect, NEMA to consider reviewing the existing ABS regulation 2006 to re-align with the Constitution and the Nagoya Protocol.
- iv. There is need for holistic approach on genetic resources which include wildlife GR and domesticated animals.
- v. Standards are key for market access. Lack of standards, is an impediment for access to both national and global markets for the country's IKaGR products. In this regard, there is need to develop appropriate standards for domestic and export markets akin to other countries e.g. China, Brazil, India etc.
- vi. There is need to have clear benefit sharing mechanisms arising from utilization of the country's IKaGR. Lack of clear community structures for decision-making, resource ownership and benefit sharing is another impediment.
- vii. The Ministry of Sports, Culture and Heritage to establish mechanisms and initiate documentation and digitization of the country's TK associated assets.
- viii. There is need to identify and realign all biodiversity and IK based MEAs including the related domestic measures with clear enforcement, compliance and monitoring mechanism. Further, ensure harmonized country positions that are all-inclusive of key stakeholders.
- ix. It is imperative to review and establish a coordinated licensing and permitting process for IK and genetic resources sub-sector in the country.
- x. Establish effective structures/platforms at county level and community level for access and utilization of genetic resources and IK.
- xi. Valorize the country's IKaGR resources.
- xii. Understand different business models and diversify IK and GR for wider markets.

2.3 Topic 3: Licensing and permitting as tools for promoting socio-economic development in the IK & GR sub-sector.

Chair: Mr. Cyrus Mageria, Director of MEAs, on behalf of Dr. Chris Kiptoo, CBS, PS. Ministry of Environment and Forestry.

Contributors:

1. Prof. Walter Oyawa, Director General, NACOSTI
2. Mr. David Ongare, Representing Director General, NEMA
3. Dr. David Ndeereh, Deputy Director, Representing Director, WRTI
4. Ms. Elizabeth Lolchoki, County Secretary, Narok County Government



Key Highlights of the Presentations

Licensing and permitting under a clear regulatory framework is an enabler for the IK and GR sub-sector that can promote socio-economic development. The COVID-19 pandemic has reaffirmed the vital role of science, technology and innovation, in evolving solutions to mitigate the virus while at the same time cushioning the impact on households.

The speakers highlighted the key role played by licensing and permitting processes in unlocking the TK and GR sub-sector of the economy. An efficient and effective licensing and permitting process enhances transparency, service delivery, enforcement, traceability and monitoring of utilization of TK & GR therefore ensuring optimal returns to both users and providers. Efficient licensing and permitting relies on effective regulatory mechanisms with clear procedures and guidelines. Structures envisaged in the Nagoya Protocol which include focal point, competent authority, checkpoints and clearing house have not been fully actualized at national level. Certain aspects of IK have been overlooked in most legislations and permit approvals. It was noted that most of the current permit granting and review criteria have not factored in elements of access and utilization of GR & TK in line with the Nagoya Protocol and the Constitution of Kenya. Permitting processes are handled in silos and are not integrated.

The speakers highlighted efforts undertaken in other countries like China and Germany on how they have developed policies and legislations to integrate and promote utilization on TK & GR products. The country can benefit from the STI Act 2013 (Rev. 2014) to regulate Research, Science, Technology and Innovation sector where three (3) key institutions/State Agencies have been established namely National Commission for

Science, Technology and Innovation (NACOSTI); Kenya National Innovation Agency (KeNIA); and The National Research Fund (NRF). These institutions are critical to the realization of the TK & GR sub-sector in the country's economy. Further, NACOSTI in consultation with stakeholders has developed the National Research Priorities Framework which were informed by the existing government socio-economic policies. A three-tier implementation framework comprising the National Research Steering Committee (NARSC), the Research Priorities Delivery Secretariat (REPS), and Sector Working Groups/Research Consortia (RC) are useful platforms for harnessing the TK & GR sub-sector. Further, under ST&I mainstreaming, all MDAs are expected to develop STI strategies and indicators for M&E which include institutional desk review committees and intellectual property policies that can be used to re-align aspects of TK & GR utilization.

EMCA 1999 (Amendment 2015) is the key legislative framework dealing with matters of environment and bio-diversity. Sections 50, 51, 52 & 53 deal with aspects of establishment of ex-situ facilities and development of regulations to guide access and utilization of GR & associated TK. To this extent, the ABS regulations Legal Notice 160 were developed in 2006 and remains to be a key framework guiding business transaction in this sub-sector in line with the Nagoya Protocol. We realize that this regulation was developed before the Constitution of Kenya and the Nagoya Protocol and therefore need to be reviewed. The ABS regulations provide procedures for engagement between providers and users based on the principles of PIC and MAT. The access permit is informed by various permits such as those issued by KWS, KFS and NACOSTI based on PIC grant and MAT negotiated at the county and the community level. We realize disparities between the ABS permits granted by NEMA and those granted by NACOSTI which shows non-compliance by the applicants which is being handled through the development of the integrated online permitting process.

There are various permits granted under the wildlife sector. These include utilization permits such as game farming, filming, eco-tourism, R&D, and export and import permits for all types of wildlife species, progenies and derivatives (all forms of wildlife bio-trade and gene trade). The Wildlife Research and Training Institute (WRTI) coordinates and regulates wildlife research through issuance of wildlife research permit informed by the PIC and MAT between providers and users. Implementation of Nagoya Protocol and ABS related matters are emerging issues which pose some challenges on compliance and enforcement. In this regard, various efforts have been put in place which include development of model PIC and MAT templates, establishment of ad hoc ABS technical committees in counties and community platforms as well as capacity building and awareness creation of key stakeholders. In addition, development of IP & ABS policy guidelines for research and academic institutions, development of guidelines on access to and utilization of TK and GR and operationalization of WRTI to streamline wildlife research permitting processes have similarly been put in place.

As one of the key custodians of the IKaGR resources, counties are required to develop mechanisms in line with the national policies and legislations on how to utilize and benefit on existing resources. Under the TK & CE Act 2016, counties in consultation with the national government, are supposed to develop mechanisms of digital TK registers including establishing effective community structures such as the community bio-cultural protocol as platforms for benefit sharing and decision making. An illustration of the procedure for licensing and permitting at the county level was highlighted by Narok County Government.

The stepwise process involves notification by the applicant, stakeholder mapping to identify IK holders, application to lead agencies, forwarding to the relevant County Executive Committee Member (CECM) in charge of Culture and Environment, negotiate for PIC and MAT leading to approval and grant of permit.

Key Discussion Points

- i. Lack of adequate targeted investment was identified as a key challenge in value addition of natural products. It was recommended that the government takes deliberate efforts through relevant agencies to ring fence funds for harnessing the natural products industry in Kenya. County governments should endeavor to integrate IK and GR into the CIDP to influence adequate resource allocation. In addition, the CS, Sports, Culture and Heritage needs to pursue the formulation of a policy dedicating funds to facilitate development of cultural assets for the market place.
- ii. To enhance the efficiency and quality of permits, institutional scientific and ethical review committees need to be empowered in terms of developing criteria that consider scientific soundness, ethical issues and ABS related matters.
- iii. There is need for provision of incentives to innovators and creators of IKaGR assets to facilitate interaction with investors while leveraging on information technology in marketing.
- iv. The CS, Ministry of Sports, Culture and Heritage in consultation with key line ministries and county governments through the CoG to develop mechanisms to facilitate access and utilization of the TK intellectual assets.

- v. Management of IKaGR related intellectual assets are not clearly defined at the county and community levels. There is need for guidance for the lead ministry in collaboration with CoG to provide direction on this matter. Experiences and lessons can be gained from some counties that have established County ABS committees as underscored during the 6th Devolution Conference.
- vi. There is need to enhance capacity building through education and awareness for all stakeholders with more emphasis at the county level, indigenous peoples and local communities.
- vii. Consider enhancing compliance and enforcement through regulatory reviews to include emerging issues such as digital trades like you-tube, digital sequence information, synthetic biology and all forms of IKaGR resource misappropriation.
- viii. There is need for more funding for the STI Sector. Further, MDAs are requested to deliberately dedicate 2% of their annual budgets for Research Science Technology and Innovation (RSTI). In addition, the government to consider ring fencing 2% of GDP for RSTI as stipulated in -----.
- ix. Indigenous knowledge is a critical factor for inclusive sustainable development. There is an urgent need to formulate and implement strategies for indigenous knowledge (IK) integration into national development agenda, including empowerment of local communities.
- x. The CS, Sports, Culture and Heritage to consider implementing the STI Act 2013 (Rev. 2014) Section 40 which proposes the establishment of the National Museum of Science and Technology by the National Museums of Kenya.
- xi. There is need to establish appropriate framework to evaluate and monitor the utilization of the country's IKaGR value chains.
- xii. Review the existing IP regimes to comply with ABS value chains including the establishment of effective IP policies at all levels in tandem with international, regional and national laws.
- xiii. The county and national governments should develop cultural infrastructure such as; cultural centers, theatres, galleries, where artistic talents associated with IKaGR can be showcased.
- xiv. Promote and integrate all forms of indigenous Knowledge such as; vernacular, folklore, dances, fashion and design into the formal education system (curriculum) including professionalizing community cultural festivals to become economic ventures from which creators, artists and communities benefit economically.
- xv. There is need to strengthen partnership with civil society and other development partners in the IK and associated assets sub-sector.

CHAPTER THREE

THEME 2: INDIGENOUS KNOWLEDGE AND GENETIC RESOURCES AS INTELLECTUAL ASSETS FOR MARKET-ORIENTED INNOVATIONS AND EQUITABLE BENEFIT SHARING

The theme focused on promoting innovations based on local resources which is key to industrialization and economic growth of any country and if explored will have an added advantage. The country's IK and GR is a major pillar of the bio-economy. Whereas indigenous knowledge and genetic resources sub-sector hold key potential on the country's economy, they are not well positioned in the country's intellectual property (IP) regimes. In this regard, this theme addresses the link of intellectual assets arising from IK and GR and its delivery to marketplace as well as the role of intellectual property institutions, research and development of appropriate standards for market access.

3.1 Topic 1: Promoting innovation and investment for the country's indigenous knowledge intellectual assets: Opportunities, experiences and lessons learnt

Chair: Mr. Waweru Kamau, Director, Social and Governance, on behalf of Julius Muia, PhD., CBS, PS, The National Treasury.

Contributors:

1. Dr. Tonny Omwansa, CEO KeNIA,
2. Prof. Theophilus Mutui, MD KEPHIS
3. Mr. Edward Sigei, CEO, KECOBO,
4. Ms. Elvine Apiyo, Legal Officer/ Assistant Registrar of Trade Marks KIPi Representing Ag. MD KIPi.
5. Mr. Geoffrey Omedo, Portfolio Analyst - UNDP Kenya





Key Highlights of the Presentations

This topic focused on indigenous knowledge and the critical role it plays in driving innovation and wealth generation for the country through its diverse value chains. The presentations appreciated that investments in the sector could be harnessed for the benefit of the youth, communities, and the country. The speakers addressed how the specific IP regimes are promoting investments in this sub-sector, key among them is that the existing IP regimes have not factored in IP based Access and Benefit Sharing (ABS) systems derived from IKaGR and therefore does not offer effective protection and promotion of the products to the marketplace.

The existing national innovation regimes and how they could contribute to unlocking the IKaGR potential were presented. These ranged from copyrights, industrial property rights, breeders rights and national IP innovation strategies.

High level of misappropriation has been reported on IKaGR partly due to lack of effective IP regimes on protection and promotion of intellectual assets derived from IKaGR. Deliberate and focused investments in innovations in this sub-sector will generate valuable assets that will contribute to the national economy and increase the GDP.

The question arising therefore is whereas most countries are putting in place mechanisms to promote and protect innovations derived from their IK and GR and as part of COVID-19 recovery plan, what efforts are being done in Kenya?

KeNIAs mission is to develop and manage a dynamic national innovation system that facilitates taking ideas to the market. Given this mission, the task will be to find out how this new sub-sector on IKaGR can benefit from the innovations that facilitate taking ideas to the market. There a lot of ideas being generated from IKaGR sub-sector which are accessed and utilized in wide range of sectors. Therefore establishment of appropriate systems and management of dynamic information systems should facilitate taking these ideas to the market.

Clear strategies for technology transfer and protection of IP are necessary steps towards commercialization and establishment of viable business enterprises in this sub-sector. The Subsector can benefit from KeNIA's ten-year country innovation road map that incorporates the establishment of an innovation academy, promotion of institutions offering technology transfer support, coordination of innovation hubs, developing appropriate IP frameworks, formulation of a national innovation outlook and prioritizing commercialization of innovations.

Innovation emanates from the existing knowledge or experiences. If this knowledge isn't shared, it can be easily lost hence there is need to document existing IKaGR. Kenya has diverse policy and legislative frameworks relating to IKaGR. However, there is need to identify any gaps that exist within our laws to reduce any risk of exploitation. Mass production of various IK & GR products can lead to misappropriation of cultural assets. There is need for mapping and documentation of indigenous knowledge as a strategy for harnessing intellectual property rights and to stem continued misappropriation of cultural assets. Our cultural assets need to be valued and adequately resourced both at the national and county levels in order to be able to generate wealth.

Kenya has a rich diversity of plant materials for use in the food and agricultural sector. It was realized that the country has diverse policy and legislative frameworks that protect plant varieties from exploitation while promoting development of new and superior varieties that guarantee breeders' enhanced incomes. Through the National Gene Bank and KEPHIS, the country has developed modalities for the protection of indigenous seeds and plant varieties.

Disparities that exist on conventional protection of IP and the TK innovation pose a challenge as industrial property systems consider individual work while TK & CE Act, 2016 consider collective aspects such as trade - marks, logos and geographical indicators. In this regard, there is need for prompt disclosure of intellectual property for effective protection and transfer of technology with regard to IK.

It was noted that disclosures are vital in barring patentability of innovation by individuals within certain timeframes and this will help the country to monitor and enhance transparency in the utilization of genetic resources. Specifically, disclosure facilitates technology transfer, ensures continuity, allows others to improve on new technology and increases higher quality prior art.

As a country, we should convert indigenous knowledge resources into a critical component of the economy by ensuring that its cultural aspects, including IP and GRs are translated into bankable products. In addition, there is need for the country to prioritize valorization of IK through investment in research and development, proof of concept and leveraging on private capital to ensure that benefit-sharing strategies are built along identified investment needs. This will include creating enablers for ease of doing business for example through establishing a single-electronic one-stop permit system through transparent, efficient collaborative reviews and application procedures with clear monitoring, evaluation and reporting frameworks. The country should explore the use of a score card in developing the nation's valorization strategy assigning different scores for the diverse products, including food, pharmaceuticals, cosmetics, handicraft, industrial products, among others. The mandate of harnessing IKaGRs be assigned to either a new national competent authority or an existing one.

Some of the key emerging issues that were clearly noted included the need to have a well-defined policy and legal framework at both national and county levels to guide the utilization of IKaGR. In order to avoid misappropriation and infringement, there is need for IPs to exploit available legal regimes as nothing hinders IKaGR holders from having all available IP registrations.

Key Discussion Points

- i. There is need to review the ongoing seed and plant variety ABS legislations in line with Nagoya protocol in addressing protection of indigenous seeds and plant varieties to include animal breeds. Therefore, finalization of the seeds and plant varieties (conservation, access and benefits sharing of plant genetic resources for food and agriculture) regulations is critical to address protection of indigenous seeds and plant varieties;
- ii. The government to consider increased investment to support conservation, access and benefits sharing of plant genetic resources for food and agriculture;
- iii. Enhance coordination among the existing IP regimes and the players involved in its implementation including grants of IP rights on IKaGR in line with ABS laws.
- iv. There is need for continuous capacity building on IP and associated TKaGR, protection and promotion at all levels including county, academia, researchers, advocates, IPLCs, policy makers and top government officials. This will provide clarity on individual or community owned IP;
- v. The formulation of a National Industrial Property Policy and Strategy should be urgently concluded;
- vi. The Ministry of Sports Culture and Heritage in partnership with other line ministries to initiate mapping and documentation of indigenous knowledge as a strategy for harnessing intellectual property rights and to stem continued misappropriation of cultural assets.
- vii. Establish a comprehensive ABS one-stop shop system in line with legal guidance, making the current multiple-permit system more effective;
- viii. Establish a better oversight about world-wide R&D on TKaGR in line with TC & CE Act 2016, including streamlining reports and publications through the digital register system;
- ix. Enhance the capacities of stakeholders on ABS requirements and negotiation skills for effective realization of benefits more so the counties and local communities academia and research institutions.
- x. Increase compliance of users in sharing monetary and non-monetary benefits with Kenya;
- xi. There is need to promote communities to continuously innovate and generate unique products based on TKaGR to the marketplace including creation of unique trademarks to facilitate the identification of genuine products; and
- xii. There is need for the country to deliberately prioritize and develop mechanisms to convert Indigenous Knowledge resources into a critical component of the economy by ensuring that its cultural aspects, including IP and GRs are translated into bankable products.

3.2 Topic 2: Role of research and development in commercialization of intellectual property from indigenous knowledge and genetic resources: Case studies including COVID-19 initiatives

Chair: Dr. Mzalendo Kibunja, EBS, Director General, National Museums of Kenya

Contributors:

1. Dr. Festus Tolo, Director, Center of Traditional Medicine and Drug Research, Kenya Medical Research Institute
2. Dr. Jemima Onsare, Ag. Chief Executive Officer, National Research Fund
3. Prof. Mary Abukutsa-Onyango, EBS, Deputy Vice-Chancellor, Research Production and Extension, Jomo Kenyatta University Agriculture & Technology
4. Prof. Muniru Tsanuo, Deputy Vice-Chancellor, Research, Pwani University
5. Dr. Atunga Nyachieo, Chief of Research, Institute of Primate Research (IPR)
6. Dr. Hartmut Meyer, GIZ-GmbH ABS Capacity Development Initiative.





Key Highlights of the Presentations

Role of research and development is key to valorization of IKaGR assets. Most of the IKaGR assets are accessed in raw form and value addition and market access done elsewhere. A critical mass of vibrant R&D actors will be vital in realizing the potential of IKaGR sub-sector thereby contribute to the continued growth of the country's economy. Sometimes R&D institutions have been intermediaries of main users of the IKaGR shielding providers from direct access and therefore limiting benefits.



Various laws ranging from access permits to technology transfer that have not been harmonized within the academia, research institutions and regulating agencies govern research and development on IKaGR. In addition, low funding capacities is a challenge. The speakers shared practical examples showcasing experiences and lessons learned on how R&D on IKaGR is key to markets and benefits in this sub-sector.



The role of KEMRI in traditional medicine and drug research was highlighted during the high-level forum. KEMRI established a Centre for Traditional and Drug Research (CTM&DR) whose main function is to collect samples from herbalists for research as exemplified recently after the COVID-19 pandemic in the country. Examples of known plant-based on TK being commercialized were showcased, including the KEMRI products undergoing clinical trials for COVID-19 management. KEMRI cited that they undertake IKaGR research based on laid down legal standards of PIC and MAT process between local communities and researchers. Various challenges in this sub-sector were highlighted including destruction of the natural habitats of plants, poor conservation of medicinal plants and changing lifestyles leading to loss of indigenous knowledge.

In addition, lack of proper frameworks on intellectual property rights, equitable benefit sharing, exploitation of local communities that own the knowledge, issues related to safety, efficacy, quality of products of traditional medicine practice, policy & legislation, lack of institutions of learning as well as research and monitoring were noted.

Funding for R&D through NRF was highlighted as a key factor in the realization of the potential presented by IKaGR sub-sector. This can be through support of R&D process for enhanced national valorization of IKaGR. Some of the priority research areas funded by NRF include biodiversity conservation, food security, climate change, primary health care, improvement of socio-economic livelihoods and cultural identity. There are various strides taken to fill gaps in IK research and commercialization in Kenya, as shown from the case studies of NRF funded IK related research that has potential for commercialization. Some of this include the development of Pwani University Bioresearch Center as a model to enhance bioresearch in local Universities, patenting of the Purple Tea Probiotic Yoghurt by Karatina University and the formulated purple tea yoghurt, certification No RZ20921 by Muchiri Mary and Ochami Dinah. The key challenge has been absorption of the funds and declining government funding.

Jomo Kenyatta University of Agriculture and Technology (JKUAT) showcased the role of R&D in valorization of TK assets. R&D capacity relating to formulation and establishment of research policies to guide research, innovation in the development and commercialization of IKaGR related products was illustrated. It was further highlighted that mechanisms have been put in place including mainstreaming of IP/ABS and formulation of IP Policy since 2010 has enabled the university to commercialize some of its products (seed varieties, machines and equipment). It was reported that various agreements have been signed with local communities with clear mechanisms on equitable share of benefits permitting lawful access of TKaGR. The university currently has 54 patents in wide range of fields including TKaGR.

One of the contributors gave an overview of the importance of IK in research and development and noted that the major areas of interface is on intellectual property protection and commercialization. It was reported that capacity building of local communities, such as the Waata, in protection of their IKaGR assets is ongoing. These efforts have involved formulation of an IP policy which guides such engagements with the local communities and stakeholders. It was recognized that stakeholders' involvement in all stages of engagement such as MoU agreements, research proposal development, agreements/permits, data collections, results and disseminations. Further case studies have been undertaken on the sequencing of the baobab to understand the genetic diversity of the crop.

Further practical examples of the interface between scientists and IKaGR owners in compliance with existing legal requirements on access and utilization of TK and GR including share of arising benefits and technologies were illustrated. Two projects were show cased the COVID-19 and the Mturi turi study (Abrus precatorius) for family planning.

The laboratory component on this research involves the development of a suitable non-human primate model followed by the scientific validation and testing of the herbal formulations for the integrated management of COVID-19. The field component involved the engagement of local communities & signing of PIC agreement in 10 counties. So far, the animal model is being used to scientifically test at least 30 herbal remedies from local communities for dosage, safety and efficacy.

In this session, the progress made on access and utilization of indigenous knowledge associated with genetic resources was reported. Examples were given on how TKaGR has contributed to commercialization of various traditional medicines. Current challenges on establishing domestic measures for access and utilization of TKaGR by both users and providers were highlighted. Appropriate legal instruments will provide clarity and facilitate research that will contribute to valorization and enhance investment in the sub-sector. Lack of effective legal systems (lack of certainty and clarity) and their effects on IKaGR on R&D and commercialization were demonstrated in the case of Nestle South Africa's use of Rooibos for tea without grant of IP rights. An example was given of Nestlé Switzerland who applied for 5 patents based on IKaGR and this triggered a legal challenge from the Khoi-San communities of South Africa which led to barring grant of the patents. This led to many initiatives including establishment of appropriate local community governance structures and a benefit sharing agreement signed in 2014 by Khoi-San Council and Nestlé South Africa on Rooibos "Coffee".

Key Discussion Points

1. The existing IP regimes in research and academic institutions have a weak IP based ABS systems on IKaGR and therefore do not offer effective protection and promotion to the marketplace.
2. There is need for research and academic institutions to review their IP policies to factor in principles of ABS and comply with TK & CE Act 2016 to minimize misappropriation of TK assets and promote their commercialization. It was discussed that this would minimize/eliminate the practice of research and academic institutions to engage in unlawful access to TKaGR.
3. There is need to develop funding guidelines for agencies such as NRF to advise applicants to comply with the national legal requirements on access and utilization of GR and IK. It is proposed that this becomes part of the requirements for research clearance by NACOSTI and other permitting agencies before funding is granted.
4. There is need to forge consortia by researchers focused on IKaGR to enhance chances of R&D funding in view of the low absorption rates reported by NRF.
5. There is need for key agencies involved with matters of ABS to develop a clear outreach /communication plan to sensitize key stakeholders working on TKaGR to have the agreements with local communities and comply with the ABS procedures.
6. There is need to engage strategic investors in order to valorize patented innovations on TKaGR to enhance their commercialization.

3.3 Topic 3: Enhancing market access for the indigenous knowledge and genetic resource intellectual assets through appropriate standards & enabling regulation

Chair: Dr. Oscar Magenya, Secretary for Agriculture, Research and Innovation on behalf of Prof. Hamadi Boga, PS, State Department for Agricultural Research in the Ministry of Agriculture, Livestock, Fisheries and Irrigation.

Contributors:

1. Ms. Maria Julia Oliva, Deputy Director, Union of Ethical Bio-Trade (UEBT), Netherlands
2. Dr. Ronald Inyangala, Director, Product Evaluation & Registration, Pharmacy and Poison Board (PPB)
3. Dr. Joshua Njiru, HoD, Research & Development, Kenya Bureau of Standards.



Key Highlights of the Presentations

Market access and consumer acceptability of IP assets derived from IKaGR is partly driven by the existing product standards. Lack of guidelines, procedures and standards on various products and practices of IKaGR is a challenge for a wider market access. This is exemplified by lack of standards for traditional medicine and practitioners, which have not been developed by the Pharmacy and Poison Board (PPB). They have however developed guidelines for registration of alternative and complimentary medicines imported into the country. Approved standards for traditional medicine will lead to over the counter sales like other pharmaceuticals. A well-regulated traditional medicine sub-sector will be integrated with modern medical treatment process. Whereas the laws are in place but they seem to promote foreign products and practices at expense of indigenous knowledge-based products.

Baobab, aloe gum and gel are among the vast natural products being accessed from Kenya. Lack of national and international standards affect quality of products in the local market and furthermore there is no price regulation of these products. There is need for mechanisms to promote locally derived IKaGR-based products for wider market access resulting in job and wealth creation.

The role of standards and enabling legal environment for promotion of IKaGR products and processes as advanced by Union of Ethical Bio-Trade (UEBT) were discussed. Further, procedures for accessing GR as a source of active ingredients for industrial processes and awareness creation on biodiversity were also presented. The organization also provides further capacity building in development of national guidelines on ABS, research, training, advisory and support programmes.

The regulation of Traditional and Alternative Medicine practice is covered under Part X, Section 74 of the Health Act 2017. The Pharmacy and Poisons Board (PPB) regulates the evaluation and registration of health products and technologies and have developed guidelines for registration of these products. Currently, there are no defined laws, regulations and standards guiding practices of traditional medicines. PPB grants marketing authorization to herbal products for commercial use.

While Kenya Bureau of Standards (KEBS) has the primary responsibility for development of product standards, KEBS invites stakeholders including consumers with the technical know-how to develop various product standards. Natural products that meet these standards can help attract investments and boost product access to the market place.

Some of the challenges facing the natural products sub-sector, particularly traditional medicine is the delayed implementation of key aspects of the Health Act and the lack of convergence between modern medicine trained practitioners and traditional medicine practitioners. In addition, lack of an effective system to promote trust between researchers and traditional health practitioners (THP), inadequate resources to support training for THP, investment in research and manufacturing of TM as well as extinction of plants through global warming, pollution, human activity is negatively affecting the phyto-pharmaceutical sector.

Speakers highlighted some of the opportunities existing in this sub-sector including, leveraging on existing capacity building initiatives through formal and informal training in Traditional and Alternative Medicine (TAM) documentation, preservation, commercialization of TAM through partnership with local industrial players and scientific validation of TAM. This has increased demand for TKaGR based natural products thereby enhancing the value chains.

Key Discussion Points

- I. There is need to review policy and Institutional frameworks geared towards valorization and commercialization of TKaGR through development of appropriate standards for products and processes.
- ii. There is need to enhance enablers for market access for TKaGR-based products and processes.
- iii. There is need to put in place enablers for market access attractive to investors: legal clarity and certainty, resource/product access procedures and clear IP protection regimes.

3.4 Topic 4: Indigenous knowledge and genetic resource product value chains, markets and benefit sharing models

Chair: Mr. Cyrus Mageria, Director of MEAs, on behalf of Dr. Chris Kiptoo, CBS, PS. Ministry of Environment and Forestry.

Contributors:

1. Dr. Ullrich Klins, GIZ-GmbH ABS Capacity Development Initiative
2. Dr. Evangeline Njoka, Chief Executive Officer, Kenya National Commission for UNESCO
3. Mr. Mukonyi Kabaka Watai, OGW, Wildlife Research & Training Institute
4. Mr. Abel Kamau, Representing CEO, Kenya Association of Manufacturers (KAM)





Key Highlights of the Presentations

Gains expected from sharing of benefits arising from utilization of TKaGR are not commensurate with the levels of access nationally and globally. One of the key impediments to maximization of the benefits is the lack of understanding of the product value chains from access to development of the final consumer product. The landscape becomes more complex with the involvement of several players through partnerships, affiliations, collaborations and company mergers, each dealing with a different line of production process for development of varied products. The process therefore requires an integration of several aspects including legal, legislative and administrative processes and procedures, global market landscapes and players and the inter-relationship between indigenous knowledge and genetic resources.

The session addressed the issues of product value chains as one of the key segments in achieving a global market for Kenya's TKaGR-based commodities. Understanding the value chains of accessed TKaGR is essential in achieving maximum benefits from utilization of Kenyan resources, and guides in the negotiation and development of implementable benefit sharing agreements.

It was noted that the national and global value of culture as highlighted in SDGs (goal 8 target 8.9), underscoring that culture is the major driver for sustainable development in addition to the contribution of UNESCO to cultural and natural heritage. The value of various IKaGR-based intellectual assets at the market place, including the creative industry and the opportunities for the commercialization of diversified and customized products was highlighted. The various scenarios on ownership of IKaGR and the different market players as well as the process of granting of access rights including an online tool for providers to visualize biodiversity-based value chains were presented.

Acknowledging that there is little investment in branding in the sector that is key in development of globally competitive products, the use of UNESCO heritage sites as a unique branding mechanism for products with a global market reach, was noted as an option to the sector. Capacity building is therefore required for an understanding of the importance of UNESCO heritage sites in product branding and marketing in this sub-sector.

Key Discussion Points

- i. Benefit sharing can only be achieved if the ABS contracts are negotiated with the entity developing the compound. The final product in most cases is a compound and not a consumer product that is completely different from the accessed material. Value chains are complex once TKaGR leave the provider country as they are under different legal jurisdictions.
- ii. Many opportunities exist in the various TKaGR sub-sectors that need to be tapped for the market place.

- iii. Grant of access rights is the initial step in the generation of benefits / benefit sharing value chains and therefore need to be given priority by establishing the right legal structures on ownership for realization of benefits.
- iv. There is need for the establishment of a national IKaGR benefit sharing mechanism, IP/ABS policies and procedures and clear governance structures at all levels. Realization of benefits from the IKaGR sub-sector require legal clarity and certainty, including clear policies and procedures at all levels.
- v. There is need for enhancement of capacity to negotiate ABS contracts in the country (building a critical mass) on the full value chains of biodiversity utilization at all levels.
- vi. There is need for incorporating commercial aspects in policy development and value chain approaches for maximum benefits from utilization of TKaGR.

- vii. Investments in the areas of brand development, contractual engagements, enforcements and litigations are therefore crucial for the success of this sector.
- viii. There is need to develop globally competitive products and brands with regional approaches. Creation of partnerships with advanced knowledge in product development, branding and marketing is therefore of paramount importance in opening up the sub-sector for the global market place. Most of the products developed from the sub-sector are locally based, offering minimum returns and benefits.

CHAPTER FOUR

THEME 3: EFFECTIVE GOVERNANCE STRUCTURES AT THE COMMUNITY AND COUNTY LEVELS AS DRIVERS OF ACCESS & BENEFIT SHARING ARISING FROM SUSTAINABLE USE OF INDIGENOUS KNOWLEDGE AND GENETIC RESOURCES

The theme focused on governance, specifically at County and community level as one of the key triggers in realization of existing potential of IKaGR sub-sector. Currently as per the constitution, Kenya's resource management is devolved and therefore counties and local communities have major roles and responsibilities in granting of various rights and decision making on access and utilization of IKaGR. It has been noted that we lack clarity and certainty in grant of rights, ownership and sharing of benefits arising from accessed TKaGR at county and community level. We have no clear platforms /systems of approvals. Regardless of this there are notable efforts in multiple counties and community platforms such as bio-cultural protocols.

3.2 Topic 1: Policy & capacity building initiatives towards establishment of effective governance structures at county & local community levels as platforms for access and benefit sharing: Experiences & lessons learnt

Chair: Ms. Catherine Bunyassi, Senior Counsel, Office of the Attorney General & Department of Justice

Contributors:

1. Dr. Kiprop Lagat, Director, Department of Culture,
2. Ms. Kulamo Bullo, CECM, Tourism, Culture, Gender & Social Services, County Government of Marsabit
3. Dr. Anisa Omar, CECM, Gender, Sports, Youth, Culture & Social Services, County Government of Kilifi
4. Mr. Daniel Kobei, Chairperson, Ogiek Peoples Development Program
5. Mr. Eric Kimalit, Chairperson, Endorois Welfare Council





Key Highlights of the Presentations

Effective governance structures at both county and local community levels as platforms for access and benefit sharing are hinged on robust policy frameworks and capacity building initiatives. Though various international, regional and national frameworks exist, these are not adequate because there is the need to develop frameworks that are very specific to meeting the needs of stakeholders at local community and county levels.

It is agreed that despite the fact that the Constitution of Kenya lays the basis for protection and promotion of TKaGR leading to the enactment of TK & CE Act of 2016, Kenya has not done enough to protect its TK associated assets and resultant IP. This has slowed down efforts towards harnessing TK and associated assets sub-sector and the attendant misappropriation of these resources. Low levels of awareness on existing laws is a challenge in compliance and enforcement. Further there is challenge at local community levels, due to lack of a clear governance structure in respect to roles and responsibilities in grant of user rights. Establishment of community bio-cultural protocols was noted as a good model for enhancing community governance.

In order to address some of the challenges that exist, the presenters are of the view that there is the need to create a benefit sharing policy for the counties, together with the establishment of local community structures to comply with the legal frameworks. There is need to develop partnerships with research institutions for the utilization of TK and CE. Counties need to work with communities to document IK and associated assets, and establish a repository.

It was noted that capacity building initiatives to empower appropriate personnel, community and young champions for culture need to be enhanced. Counties need to be encouraged to enter inter county MoUs for sharing benefits of cross border resources, and where disputes arise, the same should be subjected to alternative dispute resolution arrangements based on customary laws. Where international or global instruments exist, the government should ratify them and apply them to handling issues of TKaGR within the jurisdiction.

The Ogiek People's Development Program and the Endrois Welfare Council are examples of community-based governance structures that have been established to champion the rights of indigenous peoples and local communities (IPLCs) in respect to access and utilization of TKaGR. Through such structures, IPLCs are able to grant rights on access and utilization of TKaGR.

The presenters opine that the conversation on TKaGR is shifting from the national government to county governments. This calls for the inclusion of county governments in national government initiatives that aim at addressing various issues that deal with TK and GR. Funding for this sector at county level is very critical. As they take charge, counties should establish a digital repository of indigenous knowledge that can then be updated from time to time.

National and county governments need to work together with communities to ensure effective service delivery. Most importantly, there should be dialogue and consultations with local communities in decision making. Capacity building should be conducted regularly to enable government officials and local communities develop their competencies.

It was noted that the TK & CE Act 2016 provides framework for engagement between key stakeholders involved in harnessing TK and associated assets by defining the roles and responsibilities of national and county governments as well as spelling out the need for proper governance structures at the local community levels. It was proposed that the approach of working with selected counties in a pilot program would be more fruitful in institutionalizing the governance structures that would serve as a model for the other counties.

One speaker wondered whether the value of TK and associated assets was truly appreciated as spelt out in the TK & CE Act 2016. The counties need to be empowered through capacity building and forging of strategic partnerships to be able to harness the TK associated assets for socio-economic development. It was noted that the Natural Products Industry would be realized if there are effective mechanisms of engagement between the national and county governments and other stakeholders. The TK & CE Act 2016 provides for establishment of IK digital registers and digital repository. It was highlighted that these repositories would be uploaded with information collected by the counties following their empowerment through capacity building. For local communities to benefit from harnessing of the TK associated assets, counties need to put their houses in order and foster community dialogues involving local community leaders, elders, resource holders, cultural ambassadors and young champions of culture.

The presentation by one speaker focused on TKaGR initiatives in Kilifi County. It was noted that Kilifi County is endowed with natural heritage resources in the area of health, geo-economic and blue economy. This vast potential would be harnessed if the county was empowered through capacity building and fostering of strategic partnerships. The county was enabled to register a community-based organization (CBO) called Kilifi County Herbal Group. A total of 42 personnel comprising of county government officers, members of the CBO and young champions of culture were trained in IK documentation, preservation and application through an initiative by the NPI programme at Pwani University, Pride Inn – Shanzu and Voi Technical Institute in 2020 and 2021.

It is notable that Kilifi County has subsequently initiated documentation of IKaGR resources resulting in a register containing over 30 genetic resources, their owners/holders and the type of ailments they treat. Future programmes on IK documentation and digitization will build on this initiative. Similarly, the county will embark on training young champions on the importance of cultural heritage and indigenous knowledge, herbal medicine, blue economy, entrepreneurship and proposal writing as a way of nurturing them to the new emerging economy.

The department in-charge of culture is in the final stages of domesticating the TK & CE Act 2016 through review and formulation of relevant county policies which, if implemented shall go a long way in enhancing the role of IKaGR in contributing to the growth the county's economy. Further efforts to domesticate TK & CE Act 2016 are exemplified in the signing of two PIC agreements relating two projects namely: a natural contraceptive locally known as Mturi turi and locally derived herbal products for integrated management of COVID 19.

In spite of these positive initiatives, a number of challenges were highlighted including low awareness levels among the local communities on the vast potential of IK and associated assets and lack of appropriate tools/registers to capture information on IKaGR at county level. In addition, lack of regulation on the practice of traditional and alternative medicine, lack of promotion of access to quality, safe and effective traditional and alternative medicine as well as inadequate funding amongst others were also highlighted.

In view of the aforementioned challenges, a number of proposals namely the need to promote sustainable utilization, management and conservation of IKaGR resources and the need to develop guidelines on establishment of ABS structures at county and local community levels and development of standard tools to capture information on IKaGR were suggested. In addition, the need to mobilize resources (financial, human, technical, etc.) for the provision of quality traditional and alternative healthcare and the need to expand health insurance coverage to include traditional and alternative medicine (TAM) services, were also suggested.

Key Discussion Points

- I. Develop standard tools to capture information for IKaGR.
- ii. There is need to establish guidelines on ABS structures at county and local community levels.

3.3 Topic 2: Indigenous Peoples & Local Communities and Access & Benefit Sharing Agreements: Experiences & Lessons Learnt

Chair: Dr. Gatama Gichina, Deputy Director, Ministry of Education

Contributors:

1. Mr. Wilson Ole Mosiany, Chairman of The Maa Unity Forum
2. Mr. David Watta, Chairman of Siaya Traditional Health Practitioners CBO, County Government of Siaya
3. Mr. Luke Otipa, Chairman of the County Technical Committee on Access and Benefits Sharing, County Government of Kakamega
4. Priscillar Mutungi, Senior Research Scientist, Wildlife Research & Training Institute





Key Highlights of the Presentations

This important topic seeks to share experiences from an array of presenters with regard to the actual experiences and lessons learnt in the process on implementing access and benefits sharing agreements within counties and local communities.

Some of the key issues identified for streamlining ABS includes proper structures at the county and local community levels and facilitative legal and institutional frameworks to ensure that local communities benefit from their resources. Market access is among the important factors influencing the success of ABS process.

It is noted that culture in all its forms, including indigenous knowledge and cultural expressions are at the center of local communities around the world. Because of the ever rising demand for natural products, indigenous knowledge and genetic resources are increasingly becoming commoditized for sale at the market place.

This has created the need for proper branding and marketing to appeal to the market. Demand and competition for resources has led to the proliferation of threats such as illegal and unethical acquisition, drought, global warming, resource conflict in arid counties, insecurity, etc.

There is concurrence that the local communities owning TK and associated assets are often left out in discussions that revolve around them, and that has often been a source of conflict with governments. The Constitution of Kenya obligates the executive arm of government to promote cultural expressions in all forms, while parliament is expected to enact legislation that ensures communities benefit from access of their cultural heritage as well as ensure the heritage is protected.

Within the context of the Nagoya Protocol on access and benefits sharing, national governments are obligated to help build the capacity of county governments in terms of human capital to enable them handle issues of TKaGR effectively. County governments are in turn under obligation to support local community initiatives by developing county policies, legislations and guidelines. A critical issue is the involvement of local communities as resource owners/holders in decision making especially on matters that involve access to TKaGR, negotiating grant of access rights through signing prior informed consent (PIC) and mutually agreed terms (MAT) agreements.

It was observed that where proper legal structures exist at the county and community level, there is a guarantee of IP protection because they define who the knowledge holders are for collective protection. They also enable communities to protect their IK through the sui generis system, open for opportunities for additional business, as well as form the basis of IK registers which is part of valorisation of IK to the market place.

Under the TK & CE Act 2016, local communities are expected to develop governance structures and deposit the instruments with the county governments to facilitate the grant of access rights to TKaGR. In most communities, there exists various interest groups. Bringing all these groups into one community platform possess a major challenge.

It was noted that some of the challenges facing implementation of ABS programs in local communities could be addressed by establishing clear governance structures at county and community levels to promote business in this sub-sector. Counties and local communities need to participate in monitoring, compliance and enforcement. Where diverse groups exist, the county departments of trade and cooperatives could assist the communities establish an overarching cooperative society with individual and cooperate membership. Where cultural institutions of governance exist, the same should be tapped into during community engagements. Regular consultations between national and county governments and local communities could go a long way in addressing most of these challenges.

Key Discussion Points

- i. Counties through departments of culture and environment to assist the local communities in fast-tracking granting of PIC and MAT agreements and undertake monitoring, compliance and enforcement.
- ii. The counties through the department of trade and cooperatives to assist the communities in strengthening the legal structures.
- iii. CoG, in liaison with the national government, needs to be proactive to promote establishment of harmonized structures across all the counties.

- iv. It is imperative for national and county governments to work together in enforcing the rights of local communities with regards to utilization their resources.
- v. There is need to enhance current efforts on capacity-building and sensitization of county government officials and local communities on TK & CE Act 2016.
- vi. Stakeholders have different levels of understanding when it comes to partnership and benefits so it's important to tailor the consultation process to each audience.
- vii. Indigenous languages are the vehicles for the preservation and transmission of indigenous knowledge hence the need to promote the use of ethno-languages.
- viii. County governments should urgently embark on collecting, documenting and registering cultural expressions within the respective counties for the purposes of recognition, benefit sharing and for sustainable development.
- ix. There is need to enhance the operationalization of Article 56 of CoK (minorities & marginalized groups) and Article 100 of CoK (promotion of marginalized groups).
- x. Establish exchange programs involving counties and local communities which include benchmarking/experience sharing programs.
- xi. Establish ABS based management plans through participatory process to include counties and local communities in management, conservation, monitoring and benefits sharing (e.g. Baringo and Narok).
- xii. Establish effective resource mobilization strategies for valorization and conservation of TKaGR resources.

3.4 Topic 3: Fish bowl discussion: Realizing benefits from effective management of indigenous knowledge-based intellectual assets

Chair: Mr. Kavaka Mukonyi, OGW, Wildlife Research Training Institute.

Contributors:

1. Mr. Kimaren Ole Riamit, Executive Director, Indigenous Livelihood Enhancement Partners (ILEPA)
2. Ms. Elizabeth Lolchoki, County Secretary, Narok County
3. Dr. Festus Tolo, KEMRI, Natural Product Research & Drug Development
4. Dr. Joshua Njiru, HoD, Research & Development, Kenya Bureau of Standards
5. Ms. Catherine Bunyasi, Senior Counsel, Office of the Attorney General & Department of Justice
6. Dr. Benson Mburu, NACOSTI, Department of Biological & Health Sciences
7. Ms. Joyce Imende, Access and Benefit Sharing Desk Officer, National Environment Management Authority
8. Dr. Anne Mberia, Focal point - TK & CE Act 2016, Department of Culture
9. Mr. Stanley Atsali, Senior Patent Examiner & Head of TK & GR Unit, KIPI
10. Dr. Ahmed Hassan, Senior Program Officer, Natural Products Industry Programme, National Museums of Kenya

Key Highlights of the Presentations

This session involved discussion on the key issues which need to be considered in unlocking the economic contribution from the TKaGR sub-sector. Realization of benefits from the sub-sector requires concerted efforts from various actors. These include researchers, who have a role in the R&D phase of product development, county governments and indigenous peoples & local communities who are at the core of conservation, protection of indigenous knowledge, culture, regulators and policy makers who guide in access process and utilization of IKaGR.







Key Discussion Points:

1. Review, amend and develop legislative frameworks that facilitate transaction of TKaGR sub-sector. Key among them include review of the country's patent system to include disclosure requirements based on PIC and MAT and developing a stronger law on breeder's rights which incorporates the IP system for enhanced benefits to farmers.

2. Implementation of the TK & CE Act 2016 on documentation of TK, CE and IKaGR that cascades from the community level to the national repository to provide clarity on ownership and minimize misappropriation through the patent system in addition to training of county staff on procedures and processes. Documentation of resources and knowledge would, in addition help in mapping out distribution of communities with shared knowledge and endangered species that require urgent conservation initiatives. In addition, development of legal structures at the community level and capacity building on ABS processes and procedures will enable ease of grant of PIC & MAT and benefit sharing processes.
3. Enhance valorization of TKaGR for the market place. Valorization of TKaGR was noted to be at low levels as a result of:
 - i. The lack of commodity branding and an understanding of the registration processes for products and brand names;
 - ii. Low levels of funding for research in the TKaGR sub-sector especially for validation of medicinal herbal products;
 - iii. Lack of trust between developers (researchers) and IK holders;
 - iv. Lack of clarity in law especially on regulation of herbal products by herbalists
 - v. Lack of standards for the TKaGR products; and
 - vi. Complex ABS including permitting and licensing processes that is still not understood by all stakeholders.

In response to this, the discussants recommended:

- I. The formulation of a national valorisation strategy;
- ii. Enhancing government funding for the sector;
- iii. Enhance SMEs dialogue with KEBS for development of standards;
- iv. Validation and formulation of medicinal herbal products;
- v. Establishment of a dialogue process between researchers and knowledge owners by the office of the AG in consultation with other lead agencies;
- vi. Building the capacity of stakeholders to understand ABS processes and procedures; and
- vii. Establishment of partnerships with various industries (agricultural, pharmaceutical, cosmetic, bio-technology).

4. General comments from an investor perspective

- I. Noted that the country was ahead in several aspects on investment but recommended operationalization of processes and procedures;
- ii. Noted the existence of grey areas in Kenyan legal approval and licencing processes which need to be addressed; and
- iii. There is need to create investor confidence especially on access processes and procedures and recommended the use of a single window system for the sub-sector;

CHAPTER FIVE

THEME 4: SHAPING THE FUTURE OF INDIGENOUS KNOWLEDGE AND ASSOCIATED GENETIC RESOURCES IN KENYA: EMPOWERING YOUNG-CHAMPIONS-FOR-CULTURE

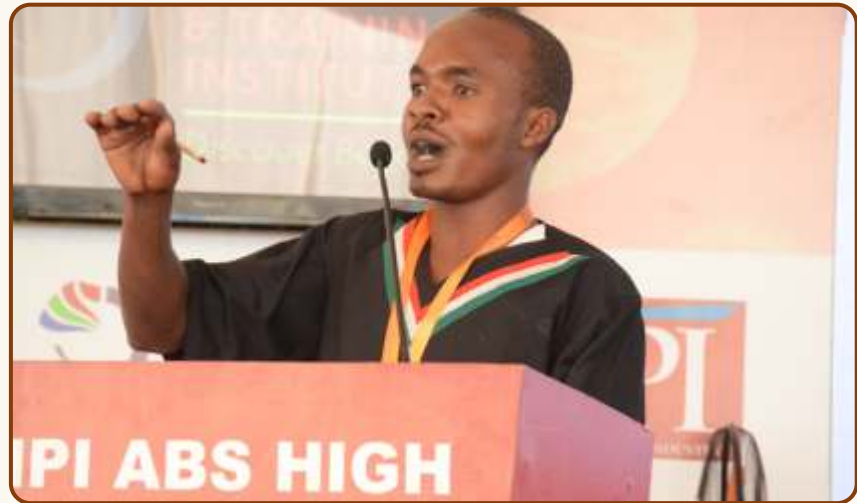
A nation without youth perishes. It has been estimated that 60% of Africa's population are the youth. For sustainability of the IKaGR, there is need for protection and preservation for the present and future generations. It is important to maintain intergeneration equity and perpetuity. The fading cultural norms /systems, changing lifestyles and economic fortunes including climate change has a negative impact on the IKaGR. The potential inherent in IKaGR-generated intellectual assets, if well harnessed, could have big impact in addressing the myriad challenges facing the youth in the country ranging from wealth creation, job employment, and responsible citizens. NPI has established a programme called “Young-Champions-for-Culture” targeting all the 47 counties. The overall goal of this programme is to create a critical mass of like-minded culture-enthusiastic young Kenyans to advocate for and promote culture, in general, and IKaGR, in particular, as a center-piece for civilization and a strategic asset for socio-economic development. Focus, experiences and road map were shared during the forum.

3.3 Topic 1: Peeking into the world of indigenous knowledge intellectual assets from the perspective of young champions for culture

Chair: Prof. Gideon Nyamasyo, Expert in Access and Benefit Sharing Matters.

Contributors:

1. Ms Ruthbelah Makhanu, National Focal point, Young-Champions-for-Culture Programme, NPI-NMK
2. Mr. Felix Kiprono, Young-Champion-for-Culture, Elgeyo Marakwet County
3. Mr. Boniface Kyalo, Young-Champion-for-Culture, Makueni County
4. Mr. Boniface Ng'ang'a, Young- Champion-for-Culture, Murang'a County
5. Lucy Wanjiku, Young-Champion-for-Culture, Nakuru County
6. Mr. David Watta, Young-Champion-for-Culture, Siaya County
7. Mr. Simon Tajeu, Young-Champion-for-Culture, Kajiado County
8. Dr. Evans Taracha, NPI Coordinator, NMK





Key Highlights of the Presentations

The Young Champions for Culture agenda is an initiative of the NMK/NPI programme which brings together youth representatives nominated at the county level, with the overall goal of building their capacities for ownership, meaningful participation in documentation, preservation, value addition and application of indigenous knowledge.

The initiative gives life and meaning to constitutional provisions on culture as the foundation of the nation, protection of indigenous knowledge and innovation and the place of youth as one of the vulnerable and marginalized groups in the country. It seeks to promote intergenerational equity and perpetuity in the face of enormous social, economic, political and environmental pressures to erode indigenous cultures.

In the words of the NPI Programme Coordinator, Dr. Taracha, *"the aspiration is to make the young champions the face of the NPI initiative in the country and all other stakeholders are encouraged to be deliberate and purposeful in making youths the face of the IKaGR sub-sector."* The young champions hailed the young-champions-for-culture approach as a pioneering and strategic avenue that has rekindled youth interest in culture, indigenous knowledge, genetic resources and associated assets.

Young champions see the Initiative as a useful tool and avenue to sensitize the youth, enable protection of intellectual property, halt on-going expropriation, trigger the unique untapped potential resident in the natural product sub-sector and ultimately contribute positive identity on cultural heritage and sustainable development. Bad governance and resource misappropriation minimize benefits to the country. If well harnessed, this could lead to wealth & job creation thereby employing thousands of youths. An example of resource misappropriation was given as exploitation and expropriation of *Prunus Africana*, a medicinal plant used to treat a variety of ailments, including hypertension and prostate cancer, among the Marakwet and other communities. Pharmaceutical corporations are now running a multimillion-dollar enterprise on account of the *Prunus africana* pushing existence of the plant to near extinction and with negligible benefits to the community.

So far, a total of 330 young champions for culture in 33 counties have been identified, sensitized, trained and equipped with relevant skills in IK documentation, preservation and application. In addition, an online platform and a training manual has been developed. The young champions are also involved in identification of priority IK assets in their counties for value addition. The champions in partnership with other stakeholders are already breaking new grounds in advancing the Natural Product Industry aspirations – the Botanical Garden at Mt Kenya university, preservation of indigenous trees and promotion of Indigenous fruits in Muranga County; the Osilalei oral hygiene Gum in Kajiado among others.

In addition, the champions asserted that the initiative presents an opportunity for using creative art to transform society, contribute to recording / documentation, communication and transmission of IKaCE of our diverse cultures. The creative industry represented 5.3% of Kenya's GDP in 2020, but little of this is grounded on IK-based creativity, a situation attributable to prevailing myths, misconception and stereotypes on culture and IK. Creative art is one of the useful efforts towards addressing these misconceptions through awareness creation.

The long-standing resentment arising from perceptions associated with the African indigenous vegetables (AIV) and the latter turn-around in terms of consumer acceptance demonstrates that time is ripe for promotion of products and assets associated with IKaGR. Nevertheless, some challenges and areas of improvement still exists These include continuous capacity building related to TK & CE, policy and legal provisions; funding and resource allocation to TK & CE interventions at both county and national levels; documentation of TK & CE associated assets, including establishment of a national repository.

Key Discussion Points

- i. There is need to pro-actively allocate resources to support promotion of IK and associated assets by integrating it in CIDP at county level and relevant national entities such as Department of Culture and NMK-NPI for capacity building. Further, inter-generational transfer of TK & CE; access to appropriate technologies; copyrighting & branding of youth innovations on IK; research, documentation and value addition; inter-cultural dialogue/learning exchanges and cultural centres / hubs so as to ultimately contribute towards the Kenya Vision 2030 and global Vision 2050 for Biodiversity with focus on humanity living in harmony with nature.
- ii. Establish a Indigenous Knowledge Trust Fund to support protection, registration, value addition and commercialization of the TK, CE and associated assets.
- iii. Strengthen institutional linkages between the youth, community, county, national and private sector actors to ensure effective engagement and representation of youth, making them the face of the Natural Product Industry, including sustainable support for the young champions for culture.

3.4 Topic 2: A case study highlighting practical example of access and benefit sharing: Waata community and use of *Abrus precatorius* (locally known as Mturi turi) as a natural contraceptive at Gede, Arabuko Sokoke, Kilifi County

Chair: Mr. Benjamin Kalume, Director of Culture, County Government of Kilifi

Workshop participants visited the Waata community resident in Arabuko Sokoke village, Kilifi County, to familiarize themselves and learn from the ongoing partnership spearheaded by NMK-NPI and its partners.

The excursion was patronized by the following stakeholders: Waata community (holders of natural contraceptive indigenous knowledge & technical knowhow), Kilifi County Herbalist Group, young-champions-for-culture, county government officials, researchers & research institutions (users of indigenous knowledge on Mturi turi), national government officials and development partners. The workshop participants were exposed first-hand to the Mturi turi plant and other indigenous knowledge products utilized by the Waata community.

The NMK's NPI programme is fostering partnerships with local community-based groups, county governments and private sector to explore opportunities for development in the natural products sub-sector. The development of this sub-sector is premised on the concept of allowing indigenous knowledge systems to drive market-oriented innovations in Kenya by drawing on science and business expertise to come up with home-grown products.

The Mturi turi natural contraceptive project is one such emerging partnership bringing together the local community-based groups, NMK-NPI, KEMRI, county government(s) and Department of Culture.

The Waata community have for years employed their indigenous knowledge on the *Abrus precatorius* (Mturi turi)-seed as a natural birth control method. The project activity involves access to IK and associated genetic material (Mturi turi seed) and its scientific validation as a natural contraceptive.

The project team has successfully negotiated for access and testing of *Abrus precatorius* (Mturi turi) associated IK through the signing of PIC Agreement with Kilifi and Kwale counties.

The testing of Mturi turi as a potential natural contraceptive is on-going in baboons (*Papio anubi*) at the Institute of Primate Research (IPR), which is part of the National Museums of Kenya. Preliminary results indicate that Mturi turi seed can prevent pregnancy in the baboon model. Positive results in the baboon will lead to clinical trials in human subjects to pave way for commercialization.



Figure 1: Endorsement of Dr. Taracha as Waata Traditional Elder during Gede Excursion

The Waata community expressed their gratitude to the NMK-NPI and the State Department for Culture and Heritage for the evolving mutually respectful partnership and the prospects of potential incomes to the community from the Mturi turi the project when fully explored with positive returns. The community demonstrated their faith in the process and partnership by bestowing the NPI Programme Coordinator, the honour of being endorsed as Waata traditional community elder.

Key Discussion Points

- I. The Waata community reaffirmed their commitment to cooperate in the on-going project and look forward to a positive outcome leading to fair and equitable sharing of benefits that may accrue from this.
- ii. The role and place of PIC and MAT in such encounters and the need for protocols to safeguard unregulated exposure of intellectual property rights (IPRs), including through non-disclosure;
- iii. Clarifying roles, responsibilities, and rights in the context of IKaGR between local communities, counties, national government and other actors;
- iv. Concerns arose over safeguarding of indigenous technical know-how on Mturi turi natural contraceptive and proprietary rights thereof on account of discussing it in a public forum prior to finalization of the protection process; and
- v. Capacity building is a journey. There is need for enhanced and sustained capacity building of IPLCs on PIC, MAT and negotiation.



Figure 2: Waata Community showcasing Mturi turi and other TK/GR

CHAPTER SIX

RESOLUTIONS AND WAY FORWARD

6.1 RESOLUTIONS A COMMUNIQUE ON “KENYA'S JOURNEY TOWARDS UNLOCKING A NEW SUBSECTOR OF THE ECONOMY: HIGH-LEVEL FORUM ON ACCESS AND BENEFIT SHARING ARISING FROM SUSTAINABLE UTILIZATION OF INDIGENOUS KNOWLEDGE AND GENETIC RESOURCES” DELIVERED AT SERENA BEACH RESORT AND SPA ON 4 FEBRUARY 2022

The Ministry of Sports, Culture and Heritage, organized a five-day high-level forum on Kenya's journey on access and benefit sharing (ABS) arising from sustainable utilization of indigenous knowledge and associated genetic resources (IKaGR). The forum brought together key players including representatives from national government line ministries & agencies, universities and research institutions, county governments, indigenous peoples and local communities, young-champions-for-culture, development partners and the private sector. The main objective of this high-level forum was to discuss and come up with modalities of opening up the IKaGR sub-sector as a new growth area of the economy. The forum focussed on the need for creating enabling policy, legal and administrative frameworks to spur innovations, manufacturing, marketing and partnerships necessary for harnessing the potential presented by IKaGR. With the enablers in place, the expected outcome from this high-level forum was the unlocking of IKaGR as a new sub-sector contributing to Kenya's GDP as reflected in new job opportunities, wealth creation, increased household incomes as well as enhance recognition of the role of culture for sustainable development.

The participants at the meeting:

- i. Appreciated and acknowledged the essence of the meeting as a unique and important opportunity for not only sharing experiences and lessons learnt in our different jurisdictions but consciously and collectively threading together the different nodes in the value chain to unlock this new sub-sector of the economy.
- ii. Noted that there was a low degree of awareness at the national, county, local community, research and academia levels on the vast potential presented by the IKaGR sub-sector in terms of its contribution to the growth of the economy. There is need therefore to create awareness and build capacity of all stakeholders across board.
- iii. Noted that the current policy, legal and administrative frameworks do not provide certainty and clarity and therefore have been a hindrance to the maximization of benefits from IKaGR sub-sector. These frameworks and administrative procedures require to be reviewed, harmonized to incorporate the emerging issues such as digital trade, digital sequence information, synthetic biology and intellectual property aspects.
- iv. Noted the lack of a coordinated licensing and permitting process for IKaGR sub-sector in the country. Therefore, there is need for development of clear ABS legal framework, incentive mechanisms and guidelines at the national, county and community levels to facilitate grant of access rights and benefit sharing.

- v. Noted that the existing policy and legislative frameworks do not adequately address commercial aspects of the IKaGR value chain. Therefore, there is need for an all-inclusive approach to policy and legal development processes, involving private sector and other development partners to maximize benefits from this emerging sub-sector.
- vi. Appreciated the huge potential in IKaGR sub-sector and noted the minimal valorisation of these resources and therefore recommended the establishment of a national valorisation strategy, enhanced financial resource allocation at all government levels to support value chains including development of IKaGR product standards and marketing processes to spur growth in the sub-sector.
- vii. Affirmed the need for documentation, protection and promotion of IKaGR through establishment of digital repositories at national, county and local community levels as stipulated in the TK & CE Act 2016. By facilitating ease of access, clarity of ownership and providing for prior art in intellectual property protection, this will curb misappropriation and thereby spur innovation, home-grown product development and business opportunities in the IKaGR sub-sector.
- viii. Recognized the importance of partnerships in the development and commercialization of products and therefore recommended the need for the government to enhance strategic collaborations and partnerships that can spur growth in this sub-sector.
- ix. Noted the complexity of the IKaGR utilization value chain particularly post-access, so there is need to build capacity for the providers to understand the value chain and participate in the product development process to maximize benefits.
- x. Noted that the Young-Champions-for-Culture agenda resonates with the spirit of the Constitution of Kenya on culture as a foundation of the nation and cumulative civilization of the people of Kenya. Young-Champions-for-Culture agenda will contribute immensely to promoting the value of culture in socio-economic development and as a centre-piece for civilization. There is need to strengthen institutional linkages between the youth, community, county, national and private sector actors in IKaGR; establish a National Indigenous Knowledge Trust Fund which will support various aspects of IKaGR including the Young-Champions-for-Culture agenda; and need to pro-actively prioritize IK and associated assets for youths in the CIDP and allocate adequate funding.
- xi. Given the complexities and the gravity of issues noted above, the meeting recommended the establishment of a coordinating agency to drive the agenda of this sub-sector.

6.2 WAY FORWARD AND RECOMMENDATIONS

1. The Office of the Attorney General

- i. The AG to put in place mechanisms to review and harmonize the existing legislations on IK and GR sub-sector to facilitate business and attract investment.
- ii. The AG to work with Ministry of Sports, Culture and Heritage, the National Treasury & Planning, relevant ministries and agencies in the review and development of policies and legislations to incorporate the commercial component in the indigenous knowledge and genetic resource value chain.

2. Ministry of Sports, Culture and Heritage

- i. The Ministry of Sports, Culture and Heritage in consultation with other line ministries, county governments through the Council of Governors, indigenous peoples and local communities, research and academia fraternity to build capacity and raise awareness on the legal and legislative procedures governing the IKaGR sub-sector.
- ii. The Ministry of Sports, Culture and Heritage to spearhead strategic collaborations and partnerships to attract investment and spur sustainable utilization and commercialization of IKaGR thereby open up this sub-sector.
- iii. The Ministry of Sports, Culture and Heritage in consultation with other relevant government agencies to establish a coordination agency for purposes of valorization and commercialization of the indigenous knowledge and associated genetic resources to maximize benefits from this sub-sector.
- iv. The Ministry of Sports, Culture and Heritage to put in place mechanisms for a National Traditional Knowledge Trust Fund dedicated to promote micro, small and medium enterprises (MSME & SMEs) as venture capital for valorization of indigenous knowledge and associated genetic resources, including establishment of business incubation centers in all the 47 counties targeting youth and women.
- v. The Ministry of Sports, Culture and Heritage, in consultation with the Ministry of Education, to consider amendment of the Science, Technology and Innovation Act, 2013 (No. 28 of 2013) and create a fund for upto 10% of the 2% GDP for supporting scientific validation, product standardization and innovations in the IKaGR product development process for the market place.
- vi. The Ministry of Sports, Culture and Heritage in consultation with the counties, through the Council of Governors to initiate a programme on documentation and digitization of TKaGR IP assets as a basis for their protection, promotion and valorization for commercialization.
- vii. The Ministry of Sports, Culture and Heritage through the Natural Products Industry initiative, which is a Vision 2030 flagship project, premised on allowing indigenous knowledge systems to drive market-oriented innovations through science and business, to provide a platform for promoting and coordinating valorization of IKaGR to open up the sub-sector.

3. The Ministry of Tourism and Wildlife

- i. The Ministry of Tourism and Wildlife to create awareness to all stakeholders on the national permitting and licensing procedures and processes on access to and utilization of IKaGR for enhanced benefits.
- ii. The Ministry of Tourism and Wildlife in consultation with Ministry of Sports, Culture and Heritage, county governments and other relevant line ministries to enhance the capacity of indigenous peoples and local communities in establishment of legal structures for grant of user rights for IKaGR within their jurisdiction for legal clarity and investor confidence.
- iii. The Ministry of Tourism and Wildlife, in coordination with the Ministry of Sports, Culture and Heritage to build the capacity of all stakeholders in negotiation processes for maximization of benefits in this sub-sector.

4. Ministry of Environment and Forestry

- i. The Ministry of Environment and Forestry in consultation with other line ministries to establish a coordinated One-Stop-Shop (Huduma Centre approach) for licensing and permitting in the IKaGR to facilitate ease of doing business in this sub-sector.
- ii. The Ministry of Environment and Forestry, working with other relevant ministries, to spearhead streamlining of modalities of a coordinated approach in participation and development of country positions during Conference of Parties (COP) in respect to Multi-lateral Environmental Agreements on IKaGR. Moreso, consider the Ministry of Sports, Culture and Heritage as a competent authority on matters TKaGR under Nagoya Protocol.

5. County Governments

- i. County governments through the Council of Governors to prioritize and ensure resource allocation to the IKaGR sub-sector during the County Integrated Development Plan process.
- ii. County governments in consultation with the Ministry of Health and other relevant national institutions to coordinate traditional health practitioners and enhance their capacities to improve the standards of the herbal products and services for the wider market.
- iii. County governments to domesticate the TK & CE Act 2016 and put mechanisms in place for IK documentation and digitization leading to establishment of county digital registers.
- iv. County governments in partnership with national government to establish clear administrative structures (such as ABS County Technical Committees and community bio-cultural protocols) both at county and local community levels for grant of TKaGR access rights informed by prior informed consent (PIC) and mutually agreed terms (MAT).

6. Indigenous Peoples and Local Communities

- I. Indigenous peoples and local communities in consultation with the national and county governments to develop legal structures at the community level to promote business in the sub-sector.

- ii. Indigenous peoples and local communities in consultation with the national and county government to put in place a clear mechanism to establish community-based IK registers.

7. Young-Champions-for-Culture

- i. The NPI Programme in partnership with the counties to establish a vibrant platform to enable young-champions-for-culture to play a crucial role by participating in the harnessing of the indigenous knowledge and associated genetic resources sub-sector as a new growth area of the economy.

8. Development Partners

- I. Development partners in collaboration with the Ministry of Sports, Culture and Heritage, county governments and other relevant ministries to support government programmes that provide oversight and entrench best practices in the IKaGR sub-sector.
- II. Development partners in collaboration with the Ministry of Sports, Culture and Heritage, and other key stakeholders to support activities geared towards the full realization of the IKaGR value chain.

Annexes

- Annex I – Programme
- Annex II – List of participants
- Annex III – Speeches



*AIV Photo 2 Commercializing Nursery business
Kirenga Lari kiambu County*



*AIV Photo 3 Fresh AIV Blanching at Mwala,
Machakos County*



*AIV Photo 3 Fresh AIV on-farm grading and
packing at Sinoko Kakamega County*



*AIV Photo 3 Fresh AIV Value addition
at Kirenga Lari kiambu county*



*AIV Photo AIV Informal Seed business
at Soko mjinga along Nairobi Naivasha
road Kiambu County*



Cereals



Condiments and Spices



Indigenous Vegetables



Myrsine africana in fruit



Kilifi county discussions to access IK



PIC Signing in Nyeri county in 2021 THP



PIC Signing in Nyeri county in 2021



PIC Agreement signed between Taita Taveta County Government Officials & Mighondi Conservation & Economy CBO and NMK & KEMRI Researchers



Purchase of herbal products from Mighondi Conservation & Economy C.B.O. members in the presence of Taita Taveta county government officers on ... October 2021



Signing of PIC Agreement between Kilifi County Government Officials, Kilifi County Herbalist Group and NMK & KEMRI Researchers 18 October 2021



Taita Taveta County Government Officials & Mighondi Conservation & Economy C.B.O. sign Prior-Informed Consent (PIC) Agreement with NMK & KEMRI to access



Store and wall hangings in a borana hut



Wild Fruits



Annex I

**Programme for the ABS
High Level Forum**

KENYA'S JOURNEY TOWARDS UNLOCKING A NEW SUBSECTOR OF THE ECONOMY: HIGH-LEVEL FORUM ON ACCESS AND BENEFIT SHARING ARISING FROM SUSTAINABLE UTILIZATION OF INDIGENOUS KNOWLEDGE AND GENETIC RESOURCES

Date: 30th January - 4th February 2022

Venue: Serena Beach Resort & SPA, Mombasa

TIME / DATE	ACTIVITY	RESPONSIBILITY
DAY 1: Sunday 30 th Jan 2022	Travel to Mombasa	Secretariat
DAY 2: Monday 31st Jan 2022		
8:00am-9:00am	Registration	Secretariat
9:00am-9:15am	Prayer & Introduction	Dr. Kiprop Lagat, Director, Department of Culture
9:15am- 10.15am	Welcome & Introductory remarks	Ms. Josephta Mukobe, CBS, Principal Secretary
	Introductory Briefs Private Sector: KAM CEO & Dr. Manu Chandaria Head, GIZ ABS Initiative PS, Crop Development & Agricultural Research PS, Wildlife PS, Environment PS, University Education & Research PS, Planning PS, National Treasury CAS, Health Chair, Parliamentary Committee on Sports, Culture	Ms. Josephta Mukobe, CBS, Principal Secretary
10:15am-10:45am	Official Opening Ceremony: Governor, County Government of Mombasa CS, Environment & Forestry CS, Tourism & Wildlife Attorney General Chief Guest – H. E. The President and Commander-in-Chief of Defence Forces of the Republic of Kenya	Hon. Amb. Dr. Amina C.Mohamed, EGH, CAV, Cabinet Secretary, Ministry of Sports Culture & Heritage Rapporteur: Dr. Gichini Gatama
10:45am-11:15am	Health Break	

TIME / DATE	ACTIVITY	RESPONSIBILITY
Theme 1: The regulatory framework in Kenya: Is it an enabler or an impediment?		
Making it work for the indigenous knowledge (IK) & genetic resources (GR) subsector		
11:15am-1:30pm Speakers (20mins each) Q&A (35mins)	<p>Topic 1: Current policy, legal & administrative landscape for harnessing IK & GR subsector in Kenya</p> <p>Ms. Josephta Mukobe, CBS, PS, Culture & Heritage Amb. Simon Nabukwesi, CBS, Principal Secretary, State Department for University Education and Research Dr. Oscar Magenya, Agriculture Research and Innovation Secretary at Kenya Ministry of Agriculture, Livestock, Fisheries and Cooperatives Prof. Fred Sigor, CBS PS, State Department for Wildlife Dr. Chris K. Kiptoo, CBS, PS, Ministry of Environment and Forestry Hon. Justice (Rtd) Paul Kihara Kariuki, Attorney General</p> <p>Questions and discussion</p>	<p>Session Chair: Mr. Joel Saitoti Torome, CBS, Principal Secretary State Department of Planning, National Treasury & Planning</p> <p>Rapporteur: Ms. Christine Mangwana, Legal Officer, State Department for Culture & Heritage</p>
1:30-2:30pm LUNCH BREAK		
2:30pm-3:45pm Speakers (15mins each) Q&A (15mins)	<p>Topic 2: What gaps & opportunities exist in Kenya's policy & legal framework to spur the IK & GR subsector? Experiences/lessons learnt</p> <p>Dr. Erustus Kanga, Secretary Wildlife Dr. Evans Taracha, Coordinator, Natural Products Industry Programme, National Museums of Kenya Prof. Gideon Nyamasyo, ABS expert Prof. Kameri Mbote, Director, Policy and Law, DELC, UNEP</p> <p>Questions and discussion</p>	<p>Session Chair: Dr. Rashid Aman, PhD, CAS Ministry of Health</p> <p>Rapporteur: Dr. Anne Mberia, Focal point for Protection of Traditional Knowledge and Cultural Expressions Act 2016, Department of Culture</p>

TIME / DATE	ACTIVITY	RESPONSIBILITY
3:45pm- 5:00pm Speakers (15mins) Q &A (15 mins)	Topic 3: Licensing and permitting as tools for promoting socio-economic development in the IK & GR subsector Prof. Walter Oyawa, Director General, NACOSTI Mr. Mamo B. Mamo, Director General, NEMA Dr. Patrick Omondi, Director, WRTI Ms. Elizabeth Lolchoki, Narok County Attorney Questions and discussion	Session Chair: Mr. Cyrus Mageria, Director MEAs, Ministry of Environment and Forestry Rapporteur: Dr. Benson Mburu, Head of Department, Biological & Health Sciences, National Commission for Science, Technology and Innovations
5:00pm – 5:30pm HEALTH BREAK (End of day 2)		

TIME / DATE	ACTIVITY	RESPONSIBILITY
DAY 3: Tuesday 1st Feb 2022		
Theme 2: Indigenous knowledge and genetic resources as intellectual assets for market-oriented innovations and equitable benefit sharing		
08:30am – 09:00am	Recap of previous day discussions	<p>Ms. Christine Mangwana, Legal Officer, State Department for Culture & Heritage</p> <p>Dr. Benson Mburu, Head of Department, Biological & Health Sciences, National Commission for Science, Technology and Innovations</p>
09:00am – 10:45am Speakers (15mins each) Q&A (15 mins)	Topic 1: Promoting innovation and investment for the country's indigenous knowledge intellectual assets: Opportunities, experiences and lessons learnt CEO KeNIA: Dr. Tonny Omwansa MD KEPHIS: Prof. Theophilus Mutui CEO KECOBO: Mr. Edward Sigei Ag. MD KIPI: Mr. John Onyango UNDP Representative WIPO WIPO Representative	<p>Session Chair: Dr. Julius Muia CBS, Principal Secretary, National Treasury</p> <p>Rapporteur: Dr. Kiproop Lagat, Director, Department of Culture</p>
10:45am - 11:15am HEALTH BREAK		
11:15am – 1:00pm Speakers (15mins each) Q&A (15 mins)	Topic 2: Role of research and development in commercialization of intellectual property from indigenous knowledge and genetic resources: Case studies including COVID-19 initiatives Ag. DG KEMRI: Prof. SamKariuki Ag. CEO NRF: Dr. Jemimah Onsare JKUAT DVC: Prof. Mary Abukutsa Pwani University DVC: Prof. Muniru Tsanuo Dr. Atunga Nyachieo, Chief of Research, IPR Dr. Hartmut Meyer, GIZ ABS	<p>Session Chair: Dr. Mzalendo Kibunja, EBS, Director General, National Museums of Kenya</p>

TIME / DATE	ACTIVITY	RESPONSIBILITY
	Initiative Dr. Evans Taracha , Coordinator, NPI Discussions	Rapporteur: Dr. Allan Ole Kwallah, Senior Research Scientist, KEMRI
1:00pm – 2:00pm	LUNCH BREAK	
2:00pm – 3:30pm Speakers (20mins each) Q&A (30 mins)	Topic 3: Enhancing market access for the indigenous knowledge and genetic resource intellectual assets through appropriate standards & enabling regulation Ms. Maria Julia Oliva, Deputy Director UEBT, Netherlands Dr. Edwin Burugu , Assistant Chief Pharmacist, PPB Dr. Joshua Njiru, Head, R&D, KEBS	Session Chair: Dr. Oscar Magenya, Agriculture Research and Innovation Secretary at Kenya Ministry of Agriculture, Livestock, Fisheries and Cooperatives Rapporteur: Mr. Stanley Atsali, Senior Patent Examiner & Head of TK &GR Unit, Kenya Industrial Property Institute
3:30pm – 5:00pm Speakers (20mins each) Q&A (30 mins)	Topic 4: Indigenous knowledge and genetic resource product value chains, markets and benefit sharing models Dr. Ullrich Klins, GIZ ABS Initiative Dr. E. Njoka, UNESCO Mr. Mukonyi Kavaka, OGW Wildlife Research & Training Institute: Ms. Phyllis Wakiaga, CEO Kenya Association of Manufacturers (KAM) Discussions	Session Chair: Mr. Mamo B. Mamo, Director General, National Environment Management Authority Rapporteur: Dr. Hassan Ahmed Senior Program Officer Natural Products Industry Programme
5:00pm – 6:00pm	HEALTH BREAK (End of day 3)	

TIME / DATE	ACTIVITY	RESPONSIBILITY
Day 4: Wednesday 2nd Feb 2022		
Theme 3: Effective governance structures at the community and county levels as drivers of access & benefit sharing arising from sustainable use of indigenous knowledge and genetic resources		
08:30am – 09:00am	Recap of previous day discussions	Dr. Allan Ole Kwallah Mr. Stanley Atsali, Senior Patent Examiner & Head of TK & GR Unit, Kenya Industrial Property Institute
09:00 – 10:45am Speakers (15mins each) Q&A (15 mins)	Topic 1: Policy & capacity building initiatives towards establishment of effective governance structures at county & community levels as platforms for access and benefit sharing: Experiences & lessons learnt Dr. Kiprop Lagat, Department of Culture Ms. Mary Mwititi, AG. CEO, Council of Governors Ms. Kulamo Bullo, CECM, Tourism, Culture, Gender & Social Services, County Government of Marsabit Dr. Anisa Omar, CECM, gender, sports, youth, culture & social services, County Government of Kilifi Mr. Daniel Kobei, Chairperson, Ogiek Peoples Development Program Mr. Eric Kimalit, Chairperson, Endorois Welfare Council	Session Chair: Prof. Collins Odote, Legal expert in access & benefit sharing, University of Nairobi Rapporteur: Mr. John Ewesit Ebenyo, County Government of Turkana Co-Rapporteur: Boniface Kyalo, Young -Champion-For-Culture, County Government of Makueni Ms. Monica Njogu, Ministry of Tourism and Wildlife (Permanent Rapporteur Desk)
10:45am – 11:15am	HEALTH BREAK	

TIME / DATE	ACTIVITY	RESPONSIBILITY
<p>11:15am – 1:00pm</p> <p>Speakers (15mins each) Q&A (30 mins)</p>	<p>Topic 2: Indigenous peoples & local communities and access & benefit sharing agreements: Experiences & lessons learnt</p> <p>Mr. Wilson Ole Mosiany, The Maa Unity Mr. Simon Mitambo, Chairperson, Society for Alternative Learning and Transformation - County Government of Tharaka-Nithi Mr. David Watta, Chairman, Siaya Traditional Health Practitioners CBO, County Government of Siaya Mr. Luke Otipi, Chair, ABS Technical Committee, County Government of Kakamega Ms. Priscillar Mutungi, Wildlife Research & Training Institute</p>	<p>Session Chair: Dr. Erustus Kanga, Secretary, Wildlife, Ministry of Tourism & Wildlife</p> <p>Rapporteur: Dr. David Ngigi, Principal Research Analyst, NACOSTI</p> <p>Co-Rapporteur: Dr. Atunga Nyachieo, Chief of Research, IPR</p>
<p>1:00pm – 2:00pm LUNCH BREAK</p>		
<p>2:00pm – 5:00pm</p>	<p>Topic 3: Fish bowl discussion: Realizing benefits from effective management of indigenous knowledge-based intellectual assets</p> <p>Discussants: Mr. Kimaren Ole Riमित, Ms. Mary Mwiti, Ms. Maria Julia Oliva, Dr. Peter Mwitari, Dr. Joshua Njiru, Ms. Catherine Bunyassi, Dr. Benson Mburu, Ms. Joyce Imende, Dr. Anne Mberia, Mr. Stanley Atsali, Dr. Ahmed Hassan</p>	<p>Session Chair: Mukonyi Kabaka, OGW</p>
<p>5:00pm – 5:30pm HEALTH BREAK End of day 4</p>		

TIME / DATE	ACTIVITY	RESPONSIBILITY
Day 5: Thursday 3rd Feb 2022		
Theme 4: Shaping the future of indigenous knowledge and genetic resources in Kenya: Empowering young champions for culture		
08:30am – 09:00am	Recap of previous day discussions	Boniface Kyalo, Young - Champion-for-Culture, County Government of Makueni Rapporteur: Dr. David Ngigi, Principal Research Analyst, NACOSTI <u>Dr.</u> Atunga Nyachieo, Chief of Research, IPR
09:00am – 10:45am Speakers (10mins each) Q&A (30 mins)	Topic 1: Peeking into the world of indigenous knowledge intellectual assets from the perspective of young champions for culture Ms. Ruthbelah Makhanu Focal point, Young -Champion-for-Culture Programme, National Museums of Kenya Mr. David Watta, CBO Chair / Young -Champion-for-Culture, Siaya County Ms. Joyce Halubha, Young - Champion-for-Culture, Tana River County Mr. Boniface Kyalo, Young - Champion-for-Culture, Makueni County Mr. Simon Tajeu, Young -Champion-for-Culture, Kajiado County Mr. Boniface Ng'ang'a, Young-Champion-for-Culture, Murang'a County Mr. Felix Kiprono, Young - Champion-for-Culture, Elgeyo Marakwet County Dr. Evans Taracha, Coordinator, NPI	Session Chair: Prof. Gideon Nyamasyo, expert in access & benefit sharing matters Rapporteur: Ms. Joyce Imende, Access and Benefit Sharing Desk Officer, National Environment Management Authority
10:45am - 11:00am	HEALTH BREAK	

TIME / DATE	ACTIVITY	RESPONSIBILITY
11:00am – 5:00pm	<p>Excursion to Gede, Arabuko Sokoke, Malindi</p> <p>Case studies, practical examples of access and benefit sharing: the case of Mturi turi as a natural contraceptive Entertainment</p>	<p>Mr. Ben Kalume, Director of Culture, County Government of Kilifi</p> <p>Ms. Ruthbelah Makhanu, Natural Products Industry initiative</p> <p>Dr. Amos Lewa, Research Officer, Kenya Medical Research Institute</p>
5:00pm – 5:30pm	HEALTH BREAK (End of day 5)	

TIME / DATE	ACTIVITY	RESPONSIBILITY
Day 6: Friday 4th Feb 2022		
Theme 5: Wrap up, recommendation/resolutions and way forward		
08:30am – 09:00am	Recap of previous day discussions and activities	Ms. Joyce Imende, Access and Benefit Sharing Desk Officer, National Environment Management Authority
09:00am -11:00am	Group formations to discuss the issues raised in the course of the week and presentations	Prof. Collins Odote, Legal expert in access & benefit sharing, University of Nairobi Prof. Gideon Nyamasyo, expert in access & benefit sharing matters Assisted by: Ms. Christine Mangwana, Legal Officer, State Department for Culture & Heritage Ms. Catherine Bunyasi, Senior Counsel, Office of the Attorney General & Department of Justice
11:00am -11:30am	HEALTH BREAK	
11:30am - 1:00pm	Recommendations & way forward	
1:00pm-1:30pm	Closing Ceremony	Hon. Amb. Dr. Amina C. Mohamed, EGH, CAV, Ministry of Sports, Culture & Heritage Rapporteur: Dr. David Ngigi
5:00pm – 5:30pm	HEALTH BREAK (End of day 6)	
Day 7: Sat 5th Feb 2022		
	Travel back	Secretariat



Annex II

List of Participants

**KENYA'S JOURNEY: HIGH LEVEL FORUM ON ACCESS AND BENEFIT SHARING
ARISING FROM SUSTAINABLE UTILIZATION OF INDIGENOUS KNOWLEDGE AND
GENETIC RESOURCES**

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Annex III Speeches

Distinguished Participants, Ladies and Gentlemen

1. I am deeply honoured to welcome you all to this unique and important conference on our indigenous knowledge, cultural heritage and genetic resources here in our coastal city of Mombasa.
2. The theme of this high-level forum is “Kenya's ABS Journey: High-Level Forum on Access and Benefit Sharing Arising from Sustainable Utilization of Indigenous Knowledge and Genetic Resources: Unlocking a New Subsector of the Economy”
3. A major focus of this high-level forum, therefore, is to have a discourse on what it takes to open up the indigenous knowledge and genetic resources as new growth area of our economy.
4. In doing so, we shall highlight our experiences, successes and lessons learned in Kenya's journey towards full domestication of the Nagoya Protocol and implementation of the various relevant national legislations.
5. But beyond this, we are called upon to explore the different facets of the indigenous knowledge and genetic resources value chain necessary to unlock this important subsector of our economy.
6. From the State Department for Culture and Heritage, we are keen to position culture as a centerpiece of our civilization and socio-economic development as stipulated in our Constitution.

Distinguished Participants, Ladies & Gentlemen

7. This high-level forum will involve the participation of multiple and diverse stakeholders including Cabinet Secretaries and Principal Secretaries of relevant Ministries such as Ministry of Environment and Forestry, Ministry of Tourism and Wildlife, Ministry of Education, Ministry of Industrialization, Trade and Enterprise Development and the Office of the Attorney General. Other key stakeholders include Council of Governors, Chairs of relevant Parliamentary Committees, relevant County Government Departments, policymakers, regulators, researchers, private sector, development partners, indigenous peoples & local communities.
8. The conference comprises 4 themes with a wide range of topics to be presented by experts in the subject areas. We shall also have an excursion in a village in Kilifi county for real practical experience with local communities on access of indigenous knowledge and associated assets and benefit sharing negotiations.

9. The key outputs from this high-level forum are proposed to include:
- A commitment to the need for an enabling legal and policy framework to spur investment in the indigenous knowledge and genetic resources subsector.
 - Enhancement of public and private partnerships aimed at harnessing the indigenous knowledge and genetic resources subsector.
 - A commitment to the need to create brand ambassadors of indigenous knowledge and genetic resources to promote local content.
 - A commitment to establish a national valorization team to oversee the full operationalization of the indigenous knowledge and genetic resources value chain.
 - Mainstreaming resource mobilization from Government of Kenya and development partners to support indigenous knowledge and genetic resources subsector.
 - A commitment to incorporate indigenous knowledge and genetic resources in formal and informal learning institutions to make it part of the knowledge economy.
 - Commitment to initiate indigenous knowledge county digital registries and national repository for protection and spurring of socio-economic development.
 - Commitment to strengthen the intellectual property policy framework that is well coordinated and responsive to changing needs of the scientific and technological sector taking consideration of indigenous knowledge and genetic resources

Once again, we salute you all Distinguished Participants, Ladies and Gentlemen for heeding our invite to participate in this important event.

END OF INTRODUCTORY REMARKS!!

.....
Topic 1: Current policy, legal & administrative landscape for harnessing IK & GR subsector in Kenya

Distinguished Participants, Ladies and Gentlemen

1. The State Department for Culture and Heritage is putting the necessary measures in place to create an enabling environment for harnessing the indigenous knowledge and associated genetic resources as a new subsector of our economy.
2. The enactment of "Protection of Traditional Knowledge and Cultural Expressions Act 2016 (TK & CE Act 2016) has paved the way for identifying, protecting and prioritizing indigenous knowledge associated assets with clear provision for equitable sharing of resultant benefits between owners and users of these key resources.

3. We are in the process of operationalizing the TK & CE Act 2016 in order to promote innovations thereby generate intellectual assets for the marketplace. This will contribute to developing the indigenous knowledge and genetic resources sub-sector as a new growth area of our economy at community, county and national levels.
4. An inter-agency taskforce has been constituted and gazetted to develop regulations as well as identify gaps in the TK & CE Act 2016 for amendment. Therefore, this conference provides a good opportunity for participants to explore and propose areas for improvement to create a more enabling environment to harness the indigenous knowledge and genetic resources subsector in our country.
5. The State Department of Culture and Heritage through the Natural Products Industry (NPI) Programme in partnership with the National Museums of Kenya's Kenya Resource Center for Indigenous Knowledge, Department of Culture and Kenya Wildlife Service are undertaking capacity building in documentation, preservation and utilization of indigenous knowledge in different counties to pave way for actual documentation and digitization.
6. Indeed, it is planned to roll out documentation and digitization of indigenous knowledge as a pilot programme in 13 counties. This will lead to the establishment of community and county digital registers as well as a national digital repository of indigenous knowledge associated assets as stipulated in the TK & CE Act 2016.
7. These platforms of identified, protected and prioritized indigenous knowledge assets will trigger business in this subsector and create wealth, jobs and enhance the livelihoods of our in our country including mashinani.
8. Finally, we welcome your input and considered views as we operationalize the TK & CE Act 2016 and better position ourselves to collectively chart the journey towards unlocking the indigenous knowledge and genetic resources as a new subsector of our economy.

END OF CONTRIBUTION TO TOPIC 1

**SPEECH BY HON. AMB. (DR.) AMINA C. MOHAMED, EGH, CAV, CABINET SECRETARY,
MINISTRY OF SPORTS, CULTURE AND HERITAGE DURING THE HIGH-LEVEL FORUM ON
ACCESS AND BENEFIT SHARING ARISING FROM SUSTAINABLE UTILISATION OF
INDIGENOUS KNOWLEDGE AND GENETIC RESOURCES IN KENYA, ON 31ST JANUARY
2022 AT THE SERENA BEACH RESORT & SPA, MOMBASA**

Cabinet Secretary, Ministry of Environment and Forestry Mr. Keriako Tobiko
The Honourable Attorney General, Hon. Justice (Rtd.) Paul Kihara Kariuki
Principal Secretary for Culture Ms. Josephtha Mukobe
Principal Secretaries from various Ministries present
Board Chairman of the National Museums of Kenya
CEOs of various State Agencies and Institutions
Heads of Corporations
Development Partners

Distinguished Participants, Ladies and Gentlemen

I would like to officially welcome you all to this forum on a subject matter that is of great historical significance to all of us.

This conference, being held under the theme: “Kenya's ABS Journey: High-Level Forum on Access and Benefit Sharing Arising from Sustainable Utilization of Indigenous Knowledge and Genetic Resources: Unlocking a New Subsector of the Economy”, offers a unique opportunity for national discourse on harnessing indigenous knowledge and genetic resources as a new growth area of our economy.

This high-level forum brings together key players including representatives of indigenous peoples and local communities who are the holders of the indigenous knowledge & traditionally accumulated skills; academia from universities & research institutions; representatives from the business sector for their role in incubation and commercialisation of scientifically-validated indigenous knowledge intellectual assets; county and national government representatives for their policy, legal, and administrative role; and international development partners who oversee best practices across the board.

**Ladies and Gentlemen,
[The Creative Economy]**

Globally, the creative economy is valued at USD 2.25 trillion (which is approximately Ksh255 trillion) and accounts for about 30 million jobs.

In Kenya, the sector is the mainstay for many, averaging 5.3% of the Country's GDP.

[Work for Pay Programme]

It is for this reason that, in April 2020, His Excellency President Uhuru Kenyatta ordered the release and distribution of ksh100 million to cushion the cultural and creative sectors from the vagaries of Covid-19.

Through the **Work for Pay Programme**, we were able to support indigenous people, artists, musicians, actors, and other players from the creative sector, during the tough economic times occasioned by the cessation of movement, closure of exhibition centres and tourist attractions sites, and cancellation of concerts and social events, in an effort to prevent the spread of Covid-19.

Ladies and Gentlemen,

Our history is illuminated by tales of artistic prowess and cultural richness that is unique to us, making Kenya the perfect destination for archaeologists, cultural anthropologists and international tourists.

From the expansive region of Northern Kenya to the shores of the Kenyan Coast, from the undulated landscapes of Rift Valley to the broad plains of Western Kenya and the rest of the country, the Kenyan people are known to be proud of their culture.

This could be attributed to our deeper appreciation of the popular saying: “Mwacha mila ni mtumwa” (translated to mean: One who abandons his or her culture is a slave).

My Ministry is awake to this fact; that is why we have put in place measures to protect intellectual property, genetic resources and traditional knowledge and grow their prominence at the local, regional and international levels.

We believe that the utilisation of indigenous knowledge and genetic resources will harness the socio-economic potential of this subsector.

It is said, after all, that: “without culture and the relative freedom it implies, society, even when perfect, is but a jungle.”

Ladies and Gentlemen,

[Post-COVID-19 recovery plan]

As a Ministry, we are in the process of operationalizing the Protection of Traditional Knowledge and Cultural Expressions Act 2016 to promote innovation and generate intellectual assets for the marketplace and contribute to developing the indigenous knowledge and genetic resources sub-sector as a new growth area of our economy at community, county and national levels.

Further, the Ministry is initiating the roll-out of indigenous knowledge documentation and digitisation as a pilot programme in 13 counties to establish community and county digital registers and a national digital repository of indigenous knowledge associated assets.

On this note, I would like to recognize the definite strides that have been made by sister Ministries and connected entities, guided by the various international instruments such as the Convention on Biological Diversity (CBD), Cartagena Protocol, Nagoya Protocol, WIPO Treaties, CITES, UNESCO, ILO and various regional agreements such as ARIPO, to create the required ecosystem that enables the creation of policy, legal and administrative frameworks as the critical foundational steps in Kenya's ABS journey.

[Final Communique]

In conclusion, **Ladies and Gentlemen**, I would like to express my sincere gratitude to everyone who played a role in organising this event.

This is a perfect opportunity for this forum to explore and propose ways of creating an enabling environment for the growth of this subsector.

I am optimistic that at the end of this event, we will have a communique that shows key resolutions that define the roadmap towards unlocking indigenous knowledge and genetic resources as a new subsector of our economy.

I wish you all the best in the session ahead and look forward to progressive deliberations.

It is now my honour and privilege to declare this forum officially opened.

Thank You!

**PIC Document (Signed) --
More Counties --
May2021**

PRIOR INFORMED CONSENT FOR ACCESS AND UTILIZATION OF KENYAN INDIGENOUS KNOWLEDGE ASSOCIATED WITH GENETIC RESOURCE; GENETIC RESOURCE; PROGENY; DERIVATIVES AND ASSOCIATED INFORMATION FOR MANAGEMENT OF RESPIRATORY INFECTIONS INCLUDING COVID-19 UNDER THE PROJECT: "Strategies to Enhance Prevention and Recovery from Coronavirus Infectious Disease (COVID-19) and Similar Infections: Evaluation of the Utility of Natural Health Products for Boosting Immune Responses drawing on Local and Indigenous Knowledge Systems"

This Prior Informed Consent herein referred to as the PIC agreement is entered on this date 1 March 2021 by and between

STAKEHOLDERS

The Providers

1. Ministry of Sports, Culture and Heritage
2. Kenya Wildlife Service (hereinafter referred to as "KWS")
3. County Government (s) of:
 - Mombasa
 - Kwale
 - Taita Taveta
 - Tana River
 - Kilifi
 - Lamu
 - Embu
 - Kirinyaga
 - Laikipia
 - Meru
 - Murang'a
 - Nyandarua
 - Nyeri
 - Tharaka Nithi
 - Homa Bay

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- Kisumu
- Migori
- Siaya
- Bungoma
- Busia
- Kakamega
- Vihiga

4. Local Communities platforms that have been identified and approved in respective County governments.

AND

The Users:

- (1) National Museums of Kenya (hereinafter referred to as "NMK")
- (2) Kenya Medical Research Institute (hereinafter referred to as "KEMRI")

WITNESSES:

Whereas access to Biological / Genetic Resources and Traditional Knowledge of Kenya is governed by various multilateral environmental agreements that Kenya is party to and the existing domestic laws, and subject to Access Permit, Research Licenses, Prior Informed Consent (PIC), Mutually Agreed Terms (MAT) and Material Transfer Agreement (MTA) between Providers and Users.

Whereas the Constitution of Kenya 2010 Article 2 (5, 6) states that the general rules of international law shall form part of the law of Kenya, and that any treaty or convention ratified by Kenya shall form part of the Kenyan Law.

Whereas the Ministry of Sports, Culture and Heritage is the Custodian of The Protection of Traditional Knowledge and Cultural Expressions (TK& CE) Act, 2016 and through the Act the Cabinet Secretary (CS) grants consent on access and utilization of Traditional Knowledge (TK) associated with genetic resources informed by PIC between Users and Providers.

Whereas KWS is the Competent Authority on matters of wildlife where it manages and conserves the wildlife of Kenya under the Wildlife (Conservation and Management) Act 2013, grants PIC on wildlife user rights, administers Material Transfer Agreements on all

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wildlife Genetic Resources on behalf of the Government of Kenya, and where possible with County Authority, private landowners and local communities.

Whereas the County Governments are devolved governments, established under Constitution of Kenya 2010 that legislates, ensure compliance with the laws of Kenya, and grant PIC and MAT on access to and utilization of biological resources within the county as per the County Governments Act, 2012 section 17. Under the TK & CE Act 2016 they protect and promote utilization of TK associated with genetic resource through establishment of Indigenous Knowledge registers for individuals and communities.

Whereas the project will involve multiple counties including Mombasa, Kwale, Taita Taveta, Tana River, Kilifi, Lamu, Meru, Tharaka Nithi, Embu, Kirinyaga, Nyeri, Murang'a, Nyandarua, Laikipia, Kakamega, Migori, Busia, Siaya, Homa Bay, Bungoma and Vihiga.

Whereas the NMK, a multidisciplinary research institution and the national repository of natural heritage collections and documentation, conserving the country's natural heritage through identification, preservation, conservation and development under the National Museums and Heritage Act of 2006. NMK through Kenya Resource Centre for Indigenous Knowledge (KENRIK) has a rich database of Traditional Knowledge Associated with Genetic Resources (GR) Knowledge. NMK has also established a Special Delivery Unit, Natural Products Industry (NPI) Initiative, a Vision 2030 flagship project to valorize genetic resource and associated traditional knowledge.

Whereas the Institute of Primate Research (IPR), a directorate of the NMK, is a centre of excellence in basic, applied and pre-clinical biomedical research and non-human primate conservation, which has as its mission to improve human health and biodiversity through advances in research. The centre has capacity for diagnostics and research in human infectious viral pathogens. It is currently one of the approved centers for testing, diagnosis and research in COVID-19.

Whereas KEMRI is a State Corporation established through the Science and Technology Act of 1979, which was amended to Science, Technology and Innovation Act No. 28 of 2013 with a mandate to undertake health science research in the country. KEMRI has advanced infrastructure for testing and validation of herbal products (Centre for Traditional Medicine and Drug Research). The Centre for Clinical Research in KEMRI undertakes clinical trials


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to support development of drugs and vaccines aimed at tackling priority disease conditions in the country.

Whereas NPI conceived and developed the project titled "Strategies to enhance prevention and recovery from coronavirus infectious disease (COVID-19) and similar infections: Evaluation of the utility of natural health products for boosting immune responses" funded by the Kenyan Government as part of the COVID-19 emergency fund. The project seeks to provide scientific evidence on the potential of herbal remedies to boost immunity against COVID-19 drawing on indigenous knowledge systems and modern scientific methodologies and ultimately develop products for the market place. This will be achieved through structured community engagement with local communities possessing indigenous knowledge associated with traditional medicinal products, on the one hand, and testing, validating and developing such products for the market, on the other. This project will be a model to provide practical examples on access to and utilization of traditional knowledge as well as traditional knowledge associated with genetic resources (TKaGR) including the sharing of accruing benefits considering rights and responsibilities thereof, in line with Nagoya Protocol. The project brings on board Resource Providers (local community traditional knowledge-holders, County Governments and National Government) and Resource Users (research institutions).

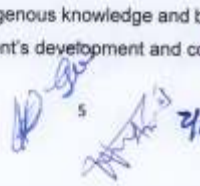
Whereas various consultations between the Resource Providers including Ministry of Sports, Culture & Heritage, KWS affected County Governments through the County Executive Committee Members (CECMs) in-charge of Culture, Health and Environment, local community customary platforms (traditional institutions & individual TK holders) and the Users have been carried out through in-person meetings held in different regions of Kenya as well as via emails and phone calls and consultative forums.

However, through consultation, each County is peculiar in its own structures at the community level. Some Counties have clear community structures and others are in the process of establishing clear community structures in line with existing legislation. Therefore, the signing of this PIC will begin with Counties with established community structures that meet the legal criteria.


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NOW THEREFORE, the parties HERETO AGREE IT as follows:

- a) This project is in line with the national development goals and the Government's "Big Four" Agenda and seeks to fulfil the requirements of the Constitution of Kenya 2010 (Articles 11, 40 & 69) on the utilization of traditional knowledge (TK), genetic resources (GR) and traditional knowledge associated with genetic resources (TKaGR) and equitable share of benefits thereby implementing the TK&CE Act 2016 and other related legislations.
- b) The NPI Initiative is one of the Kenya Vision 2030 flagship projects premised on allowing indigenous knowledge (IK) systems to drive market-oriented innovations by drawing on science and business expertise to come up with homegrown products. This project seeks to validate the utility of IK-based herbal remedies as natural health products in management of COVID-19 and other similar infections.
- c) This project promotes long-term partnership between TK-holders and research institutions in Kenya on access to and utilization of TK and associated genetic resources for research and development to realize novel products for management of COVID-19 and other similar infections.
- d) This project seeks to contribute to capacity-building through:
 - Sensitizing and creating awareness on IK for development and promoting establishment of county IK registers.
 - Training of county government officials on IK documentation, preservation and utilization.
 - Putting in place long-term programmes for documentation of IK at the county and national level.
 - Creating a pool of young Kenyans from different local communities (ethnic groups) who will be champions of culture as a tool of development.
 - Adding value on the herbal concoctions through testing for safety, dosage and efficacy.
 - Training the local community on standardization of herbal products, commercialization and registration of their herbal projects.
- e) Safeguard of indigenous rights: the project will adhere to all ethical standards in accessing, handling, testing and commercialization of the herbal products. Ensure that IK is accessed using established registers at the county level.
- f) Resource Mobilization: The project is funded by the Government of Kenya (GoK) and this contributes to the conservation of indigenous knowledge and biological resources in Kenya and supporting the national government's development and conservation goals.


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It responds to the three objectives of the Convention on Biological Diversity (CBD) of Conservation, Sustainable use and Benefit sharing.

- a) The research complies with the international and GoK's ethical standards.
- b) Where ethical approval is required to undertake a project or an element of a project, it has been sought in line the relevant law and no project has commenced without prior approval. These approval documents will be provided as background disclosures to KWS.

Partnership Framework:

This project is accessing the IK associated with GR from local communities. It is understood the ownership of IK is varied it could be from an individual, collective groups or customary platforms governed by customary protocols. The project will also access herbal formulations used by the communities or THPs. In addition, the project will access assorted GR to be used at various levels of the product development. The project will thus involve the National Government, County Government(s) and local communities.

In connection with the proposed research activities the following conditions will be met:

- a) An appropriate partnership framework will be established between the identified resource providers and the users at various levels informed by various legal entities. For accessing and using IK, focus will be on the traditional customary platforms which need to operate as registered entities having proper governance structures that meet the project standards. At national level, we shall have NMK, KEMRI and KWS.
- b) The Ministry of Sports, Culture and Heritage in consultation with the county governments through the Council of Governors (CoG) Secretariat will fast-track the process of granting consent on IK associated with GR as per the TK&CE Act 2016.
- c) NMK through NPI will be the lead institution to coordinate the project. Working in consultation with the counties, NMK will mobilize the local communities and TK-holders. NMK through IPR will be responsible for preclinical validation of traditional herbal products. KEMRI will be responsible for clinical trials of validated safe and efficacious products. KWS will be responsible for granting of user rights on access and utilization of GR and negotiation of the PIC & MAT process and capacity building of both providers, at county and local community level, and users. KWS will also participate in some of the research project activities.


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c) The County Government(s) shall establish the county registers of IK associated with GR thereby assisting in mobilising the IK-holders and customary institutions and platforms. This will begin with a few of the selected counties and gradually be up-scaled to other counties.

d) The research project is focusing on accessing TK associated with GR, GR, progeny, derivatives, compounds, extracts and associated information currently used by traditional health healers. The project will also access wild baboons for preclinical work.

The primary access will be indigenous knowledge from IK-holders, traditional medicine products, the formulas, the processes used for preparation of the medicinal products. Other primary products will include whole animal, body tissues, blood, hair, brain, lungs, heart, kidney, liver, muscles, skin, nails, eyes, nose, ears, all internal organs and microbes resident in the animal body.

e) The users will declare the information and technologies (IK, formulations, products, process, and genetic resources) relevant to the project that they will access from the local community providers. It is known that the users have already been working with IK, and in this partnership they will need to declare if they have accessed any IK which could be in any form of a product possibly in the market place or with potential to enter the market place.

It is known the partners have previously accessed and documented various technologies based on IK possessed by local communities which will be useful for the purpose of this project and implementation of IK registers at the county level. The partners will through the Ministry of Sports, Culture and Heritage share with the respective counties the database containing the documented IK to guide in the process of future implementation of TK & CE Act 2016.

Standard Operating Procedures (SOPs) or guidelines will be developed for accessing and utilising the requested resources which include the IK, GR, formulas, processes, and related products. Only traditional medicine products will be accessed for experimental work. The users will engage with TK providers only on promising prioritized products for further disclosure and development.

Holders of technologies on IK, formulae, products and process will be identified and the manner and steps of disclosures will be agreed upon before any access and utilization, protection or transfer of the technology.

The project will initially be rolled out in the following counties and be gradually extended to the others as more funding is made available:




Mombasa, Kwale, Taita Taveta, Tana River, Kilifi, Lamu, Meru, Tharaka Nithi, Embu, Kirinyaga, Nyeri, Murang'a, Nyandarua, Laikipia, Kakamega, Busia, Bungoma, Vihiga, Kisumu, Migori, Siaya and Homa Bay

f) Users will develop systems of database protection of accessed IK and GR and *ex situ* conservation in line with existing legal framework.

g) Sampling activities will in no way infringe on the rights and practices of the communities residing within the sampling areas or elsewhere in Kenya. Efforts will be put in place to involve local communities and where possible their indigenous knowledge will be safeguarded.

h) The national partners will promote the systems of registration both at the county and national levels.

i) The users will ensure that the providers and local researchers engaged in this project will have adequate training, as appropriate.

Benefit Sharing (existing and anticipated):

Non-monetary benefits:

Technology transfer

a) Skills

Skills are quite important and will include wide-ranging training in the key subject matter. This will include, but not limited to, long-term and short-term training to enhance the know-how. Noting that this will involve multiple agencies and realizing the need to valorize the TK & GR for health purposes and further noting the danger of erosion of the knowledge, species extinction, climate change and other pressures to the environment, the Government shall:

Through the Ministry of Education, Science and Technology in consultation with project partners tailor-make training programmes at various levels ranging from primary to tertiary TK & Alternative medicine courses. Through the on-going young champions mobilization programme, youths will be identified for this training at various levels and will also involve mentorship under TK-holders and practitioners.

With regard to acquisition of skills related to TM practice in healthcare system, certificate-level programmes will be offered.

Building the critical mass of Kenyans in value-addition for both IK & GR and any other specialized course.

Through appropriate channels, use what has been documented to valorize it and ensure it is accessible for use at both county and national level.




Communities will transfer the technology on preparation of the product

b) Specialized training and exchange programmes

- It is understood that the users will be accessing technology for TK associated GR, formulations and processes, and upon signing the technology transfer, the licensor will equip the licensee skills and know-how of the product as mutually agreed.
- That the users will equip the TK associated GR-holders with capacities in production of quality products for the market place. This will be done through short training courses at either the county or the users place at least four (4) trainings at minimum of 100 participants.
- On best practices, the users will develop various training manuals, which include but not limited to IK, documentation, sustainable production, harvesting, post-harvest processing, safety and hygienic production, agro-forestry, botanic gardens.
- Under this project, realizing the need for IK registers, the users are going to train the county government officials and local community groups from the selected counties to enable registration of TK and TK-holders
- Build the capacity of TK-holders and practitioners in entrepreneurship skills under the SMEs programme in partnership with the Ministry of Industrialization, Trade and Enterprise Development and county governments.
- There shall be at least three inter-county community exchange programmes to enhance best practices among the communities involved and explore possibilities of sharing experiences from other countries who are commoditizing TK associated GR. This will also include exchange programmes at policy and technical level.

c) Infrastructure

Establishment of effective systems for protection and promotion of TK associated with GR. The TK&CE Act 2016 provides for establishment of protection of TK associated with GR through the system of identification and registration by establishment of IK registers and digital repository at the County and National levels, respectively.

Under this project, the partners will work with the Ministry of Sports, Culture and Heritage and the county governments in selected counties to at least establish systems of storage, retrieval and use. This will involve mapping, identification, documentation, developing the processes and software for the digital use.

The partners in collaboration with the Ministry of Industrialization, Trade and Enterprise Development and the county governments will establish processing units at one centralized processing plant equipped with necessary facilities in the selected counties.



- The partners will explore using the existing facilities and in consultation with the Ministry of Health validate, standardize, register the prioritized products and be accepted as part of healthcare. In addition, the partners in consultation and working with the Ministry of Health will develop appropriate guidelines for standardization of traditional medicines in healthcare.
- Together with the Ministry of Health, explore integrating improved and approved traditional medicine in modern healthcare systems. For example, in referrals provide space for qualified traditional health practitioners (THPs) such as Laikipia County has provided space for traditional birth attendants (TBAs) in some of their healthcare centres.

d) Outreach programme

- The project has a major component of education and awareness. Project sensitization meetings, project inception and launch which will bring together key stakeholders. The project will develop an education and awareness plan. This will include various outreach materials for dissemination (media, policy briefs, awareness material).
- The partners will develop a school-based awareness programme targeting children at the primary level. The project design will be displayed during the Science Technology and Innovation (STI) week and science congress.
- Workshops/conferences and publications product launch/science & business dialogue during which the project outputs/progress will be presented acknowledging the users and providers.
- The partners will organize community-based conservation awareness for sustainable production of the raw materials in which community-based conservation i.e. sustainable utilization of the priority species, agro-forestry/commercial production/in-situ conservation/botanic gardens/conservation areas will be promoted.

e) Enhancing sustainability

The partners will develop appropriate programmes for sustainability in production of raw materials of prioritized products. This will include restoring partnership with existing structures e.g. joint management plans to allow local communities establish medicinal gardens in designated conservation areas, which will act as seed bank and supply of the raw materials. The project will also explore promotion of *ex-situ* conservation systems linking in with *in-situ* conservation including botanical gardens, home herbal gardens, herbaria, breeding and game farming.

Monetary benefits

- Investments (venture capital)



The government has provided seed money to initiate the process of implementing the project titled "Strategies to enhance prevention and recovery from coronavirus infectious disease (COVID-19) and similar infections: Evaluation of the utility of natural products for boosting immune responses drawing on local and indigenous knowledge systems".

- 2) Purchasing products e.g. genetic resource (informed by ethical sourcing – fair trade regime), licenses / fees

The list of products to be sourced will be identified and each will be purchased at a fair price governed by international standards. These will include but not limited to:

- IK-generated intellectual property (IP)
- Products
- Formulae
- Processes
- Baboons (conservation fee)

- 3) IP commodification e.g. IPR audits, registers and types of IPRs (patents, utility models, trademarks, geographical indications, media assets, copyrights and *Sui generis* etc) attract upfront (initial pay e.g. kajama), milestones (if it works on preclinical, clinical), royalties (amount % of the gross/net sales).

- 4) Commodification of IK alone where the source of the IK-holder or communities is known: 60% to be shared by the IK-holder (18%), community (24%) and county government (18%) for preservation of intellectual property rights (IPR). The remaining 40% goes to the users.
- 5) Where the IK-holder is not known but the community is known, the 60% is shared by the county (18%) and community (42%) and the remaining 40% goes to the users.
- 6) Where IK belongs to various communities in various counties' the overall 60% will be divided pro-rata among communities and 40% goes to the users.
- 7) Where IK and genetic resource (GR) is part of IPR, the TK-holder will get 40% of the returns / royalties, the community 30%, County Government 10%, and National Government 20%.
- 8) Where IP is generated from GR alone without IK, 30% goes to the providers and 70% to the users.
- 9) Where IP is generated from media assets and copyright, 25% goes to the providers and 75% to the users.

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Note: The detailed modalities defining the benefits arising from IP, will be defined in the MAT.

Compliance with Legal Requirements:

- a. It is known various approvals and permits will be required to operationalize this process. This will include access to protected IK, GR used as ingredients in drug development, the animal models for pre-clinical testing, clinical trials, and registration for both generated IP and developed drugs/products and subsequent product launch. The users will comply with all the legal requirements and apply for permits in compliance with Access and Utilisation of Genetic Resources domestic measures.
- b. The partners will conduct an IP audit of this project to identify background, potential, generated and commercializable IP.
- c. Indigenous Knowledge and associated Genetic Resources (TKaGR) accessed and utilized under this agreement shall not be transferred to third party without permission from the TK-holders and in accordance with the PIC and MAT.
- d. Biological and genetic resource materials collected pursuant to this Agreement shall only be transferred to third parties in accordance with the terms of the PIC and the MAT.
- e. Monitoring and evaluation will be undertaken by NEMA, KWS, and designated check-points as per the Laws of Kenya.
- f. The terms and conditions set forth herein may be revisited and/or amended at a future date, in the event that such revisions are required in connection with changes to the proposed research, or are justified by preliminary research findings. Any amendment will be undertaken in full consultation and by written agreement of the Parties.
- g. These Mutually Agreed Terms (MAT) will form the basis for the Collaborative Research Agreement (CRA) and Co-operative Research and Development Agreement (CRADA) also referred to as MAT to be signed between the Users and Providers.

IN WITNESS WHEREOF, the parties hereto mutually consent and their duly authorized representatives have hereunto subscribed their hands and seals on the date and year first mentioned here below

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SIGNED by

1. National Museums of Kenya (herein referred to as NMK)
Director General, NMK

Name Mzalende N. Kibugojia
Title Director General
Signature [Signature]
Date 12/01/2021



2. Kenya Medical Research Institute (herein referred to as KEMRI)
Director General, KEMRI

Name Prof. JERI KOMBE
Title DIRECTOR GENERAL
Signature [Signature]
Date 4/2/2021

P.O. Box 59840 - 00200
NAIROBI, Kenya.

3. County Government of Kakamega
(County Executive Committee Member for Social Services, Sports, Youths, Women Empowerment and Culture)

Name KASSIM WARE AH
Title CECM
Signature [Signature]
Date 09/12/2020

- (County Executive Committee Member for Water, Environment, Natural Resources and Climate Change)

Name KULANI F. WANJIA
Title CECM
Signature [Signature]
Date 09/12/2020



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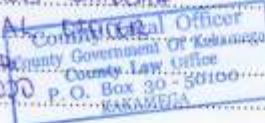
Kakamega Natural Forest Catchment Conservation Organization (KANFCCO)

Name PAUL LUMADI BURDI
Title CHAIRMAN - KANFCCO
Signature [Signature]
Date 9-12-2020



In presence of
County Attorney

Name MILDRED WANDEMA
Title S. LEGAL OFFICER
Signature [Signature]
Date 9/12/2020



4. SIGNED on behalf of the KWS
Director General, KWS

Name [Signature]
Title DIRECTOR GENERAL
Signature [Signature]
Date 1/3/21

KENYA WILDLIFE SERVICE
P.O. Box 40241 - 00100
NAIROBI

5. Ministry of Sports, Culture and Heritage

Name JOSEPHITA O. MUKOBE
Title PRINCIPAL SECRETARY
Signature [Signature]
Date 9/12/2020

PRINCIPAL SECRETARY
STATE DEPARTMENT FOR CULTURE & HERITAGE
MINISTRY OF SPORTS, CULTURE & HERITAGE
P.O. Box 49849 - 00100, NAIROBI

[Signature]



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7. The County Government of Taita Taveta

County Executive Committee Member for Youth, Sports, Culture, Gender & Social Services

Name: VINCE N. RINCO
Title: CECM YSGSS
Signature: [Signature]
Date: 17.05.2021



County Executive Committee Member for Water, Environment & Sanitation

Name: ESTHER UKAWALI MWANYUMBA
Title: CECM
Signature: [Signature]
Date: 17TH MAY, 2021

Mighondi Conservation and Economy Network C.B.O.

Name: JAXON SHAKO MOTO
Title: CHAIRMAN
Signature: [Signature]
Date: 17/05/2021



In Presence of;

The County Attorney Taita Taveta County Government

Name: _____
Title: _____
Signature: [Signature]
Date: 17.5.21



8. The County Government of Murang'a

County Executive Committee Member for Youth, Sports, Culture & Social Services

Name: MAINA KAMATI
Title: CHIEF OFFICER
Signature: [Signature]
Date: 20TH MAY 2021



County Executive Committee Member for Environment, Natural Resources and Climate Change

Name: CATHERINE W. MWANYA
Title: COUNTY DIRECTOR OF CULTURE
Signature: [Signature]
Date: 20TH MAY, 2021

Murang'a Traditional Medical Practitioners Association

Name: CYRUS M. GICHONGE
Title: CHAIRMAN
Signature: [Signature]
Date: 20TH MAY, 2021

In Presence of;

The County Attorney Murang'a County Government

Name: M.B. YU KAMAU
Title: COUNTY ATTORNEY
Signature: [Signature]
Date: 20.05.2021

9. The County Government of Nyeri

County Executive Committee Member for Trade, Tourism, Culture and Cooperative Development

Name: Diana Tanchia
Title: CFC
Signature: [Signature]
Date: 20/5/2021

County Executive Committee Member for Water, Irrigation, Environment and Climate Change

Name: Frederick W. Kinyua
Title: CECM
Signature: [Signature]
Date: 20/05/2021

Nyeri County Indigenous Knowledge Heritage and Derivative Works Co-operative Society Ltd

Name: Jack Githee
Title: CHAIRMAN
Signature: [Signature]
Date: 20/5/2021

In Presence of;

The County Attorney

Name: XIMANI RUCIYA
Title: COUNTY ATTORNEY
Signature: [Signature]
Date: 20/05/2021

10. The County Government of Kirinyaga

County Executive Committee Member for Gender & Culture

Name: DENNIS MUCIMI GICHUBI
Title: CECM-SPORTS, CULTURE & SOCIAL SERVICES
Signature: [Signature]
Date: 20/05/2021

FOR County Executive Committee Member for Environment and Natural Resources

Name: JARED MIGWI
Title: CHIEF OFFICER - ENVIRONMENT
Signature: [Signature]
Date: 20-05-2021

Kirinyaga Traditional Medicine Practitioners Association

Name: ERASTUS NYERI NYAFIACHY MUKIUKI
Title: CHAIRMAN
Signature: [Signature]
Date: 20-5-2021

In Presence of;

The County Attorney

Name: CARDOLYNE KINYUA
Title: COUNTY ATTORNEY
Signature: [Signature]
Date: 20-5-2021



11. The County Government of Embu

County Executive Committee Member for Gender, Children, Culture & Social Services

Name: JOSEPHAT M. KITHUNBU

Title: CECM

Signature: [Handwritten Signature]

Date: 20/05/2021

County Executive Committee Member for Water, Irrigation, Environment & Natural Resources

Name: JAYNE N. MUGAMBI

Title: CECM

Signature: [Handwritten Signature]

Date: 20/05/2021

The Embu County Herbalist Association

Name: VIRGINIA WERETI NJUE

Title: CHAIRPERSON

Signature: [Handwritten Signature]

Date: 20/5/2021

In Presence of;

The County Attorney Embu County Government

Name: KENNETH WITHINGI

Title: COUNTY ATTORNEY

Signature: [Handwritten Signature]

Date: 20th / 5 / 2021



12. The County Government of Tharaka Nithi

County Executive Committee Member for Education, Vocation Training, Youth, Sports, Tourism & Culture

Name: SHEILA KIGANKA

Title: CECM

Signature: [Handwritten Signature]

Date: 20th MAY, 2021

County Executive Committee Member for Lands, Physical planning, Urban Development Environment, Water, Irrigation & Natural Resources

Name: JAEDEO NKANYA

Title: CECM

Signature: [Handwritten Signature]

Date: 20/5/2021

Society for Alternative Learning & Transformation (SALT)

Name: SIMON MITAMBO

Title: CEO - SALT

Signature: [Handwritten Signature]

Date: 20/5/2021

In Presence of;

The County Attorney Tharaka Nithi County Government

Name: LILIAN GATWIRI KIRUJA

Title: PRINCIPAL LEGAL OFFICER

Signature: [Handwritten Signature]

Date: 20th May 2021

13. The County Government of Siaya

County Executive Committee Member for Tourism, Culture, ICT, Sports and Arts

Name: EM. AMAN OUMA
Title: CECM
Signature: [Signature]
Date: 18/5/21

County Executive Committee Member for Water, Environment and Natural Resources

Name: CHARLES ODOR OYADA
Title: CECM
Signature: [Signature]
Date: 17/5/21

Siaya Traditional Health Practitioners

Name: DAVID BARACK ODHAMBO WATA
Title: Chairman
Signature: [Signature]
Date: 18/5/21

In Presence of;

The County Attorney

Name: Amb. PHILIP RICHARD SWADE
Title: COUNTY ATTORNEY
Signature: [Signature]
Date: 18/05/2021



14. The County Government of Bungoma

County Executive Committee Member for Gender, Youth, Culture and Sports

Name: SARITA AUL IKRAM
Title: COUNTY CHIEF OFFICER CULTURE
Signature: [Signature]
Date: 19/5/2021

County Executive Committee Member for Environment, Water and Tourism

Name: RENSON MARHESI WANJONYI
Title: CECM ENVIRONMENT W.F
Signature: [Signature]
Date: 19th MAY 2021

Bungoma Herbal Doctors Savings and Credit Cooperative Society Limited

Name: DR ISAAC MISIKI
Title: CHAIRMAN
Signature: [Signature]
Date: 19th - MAY 2021

In Presence of;

The County Attorney

Name: CAROL S. WATONGI
Title: COUNTY ATTORNEY
Signature: [Signature]
Date: 19/05/2021

