

# KENYA NATIONAL INNOVATION POLICY FRAMEWORK

(Proposed)

The proposed National Policy Innovation Framework (NIPF) for Kenya has been developed by:

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### **ACRONYMS AND ABBREVIATIONS**

AGOA - African Growth and Opportunity COMESA - Common Market for Eastern and Southern Africa

CFTA - Continental Free Trade Area

EAC – East African Community
NIPF - National Innovation Policy Framework

TFTA - Tripartite Free Trade Area

IPR - Intellectual Property Rights

#### 1.0 INTRODUCTION

Innovation has been recognised as a driver of economic development and a key differentiator in the competitiveness of nations. Innovation can be defined as the implementation of a new or significantly improved product, process, marketing method or organisational method in business practices, workplace organisation or external relations. In this definition a product may be a good or a service. Innovation is not simply about the generation of new ideas, but about exploiting these ideas in practice to enhance a country's competitiveness and respond to problems or challenges that it faces. It is this "problem-solving" nature that makes innovation key to dealing with important social and economic issues. Innovation policies, therefore, are particularly relevant when they are able to clearly provide solutions to defined problems.<sup>2</sup>

Innovation, therefore, may be defined as, the aspirations of people, institutions and the government to achieve development through the generation of creative ideas and the introduction of new products and operations that improve our overall quality of life.<sup>3</sup>

The Government has recognised and emphasises the importance of innovation in attainment of Vision 2030 as Kenya embarks on a journey "Accelerating the transition to an innovation-led and knowledge-based economy." Enacted policies and programmes have resulted in Kenya ranking third in Sub-Saharan Africa in the Global Innovation Index and 86<sup>th</sup> in the World. Despite these achievements, a lot still needs to be done.

The need for a national innovation policy framework was identified as early as 2015, when the Ministry of Education Science and Technology noted that "policy-makers have ... become more informed on the role of framework conditions beyond the conventional ST&I policy to include issues like market competition, ... the regulatory environment among others." The further noted that, "Many stakeholders are also demanding integrated responses to societal challenges that cross disciplines and national borders." The concluded that, "The Government must therefore fully embrace the concept of a national innovation system and adopt a systemic approach in order to successfully deal with the [current] challenges."

#### 2.0 OBJECTIVES OF THE FRAMEWORK

- 1. Enable review, development and implementation of integrated and coordinated policies and programmes to spur innovation in Kenya to achieve socio-economic development and sustainable long-term growth.
- 2. Provide coherence in the governance structure of the national innovation system.
- 3. Create an innovation culture in Kenyan people, institutions, companies and government, and promote academia-industry and industry-industry collaboration.
- 4. Provide a framework through which the country's economic goals and the social impacts of innovation, for example its impact on well-being and its contribution to achieving social goals, can be measured. Internationally accepted indicators shall be adapted to form the National Innovation Scoreboard that shall provide up to date data on the status of innovation in Kenya, and the effectiveness of the NIPF.

<sup>2</sup> Edler and Fagerberg (2017)

<sup>3</sup> Ministry of Cabinet Affairs, UAE (2015)

<sup>&</sup>lt;sup>1</sup> OECD/Eurostat (2005)

<sup>&</sup>lt;sup>4</sup> Ministry of Education, Science and Technology (2016), pp. 3.

#### 3.0 THE INNOVATION POLICY FRAMEWORK

The National Innovation Policy Framework (NIPF) is structured around:

- Three key pillars Demand, Supply and the Broader Environment,
- Three levels in each pillar National, Industry/Institution and People.

The interface of the three pillars and three levels, illustrated as 1A - 4C in Figure 1, define a structured and synergistic web of policies and programmes aimed at mainstreaming and driving innovation to significantly grow the economy with a focus on the identified national priority sectors.

The NIPF recognises the existence of a large number of policies and programmes in support of the Kenya Innovation Ecosystem. It, therefore,

- Provides a coherent structure through which existing policies may be reviewed to ensure strong synergies between them and that their collective implementation shall drive the country towards attainment of the aspirations in Vision 2030.
- Enables identification and correction of overlaps and contradictions among the current policies,
- Enables identification of gaps that can be filled through development of new targeted policies and programmes, and
- Is a living document to be reviewed and improved upon in response to local and global changes.

#### 3.1 Governance

A core element of the NIPF is the establishment of an **over-arching governance structure** to drive coordination among the players in the innovation eco-system at the three levels: government, industry/ institution, and people.

The over-arching governance mechanism shall address major weaknesses in the current innovation policy landscape where:

- Numerous key initiatives in approved development plans and policies have not implemented or are greatly behind schedule, severely limiting the achievement of the desired outcomes.
- Many of the policies are outdated or pending legislative or cabinet approvals.
- Many implemented programmes and flagship projects have been uncoordinated, non-transparent, and ineffective.

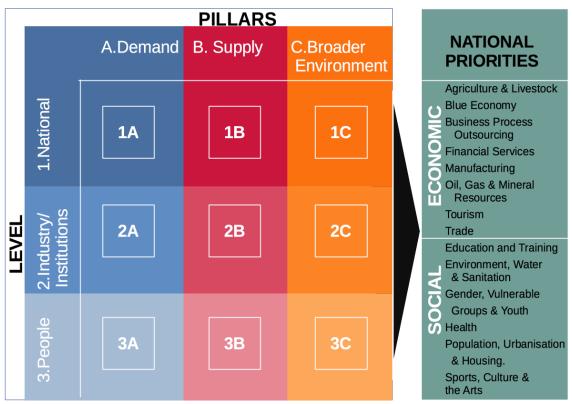


Figure 1 – Kenya National Innovation Policy Framework

#### 4.0 NATIONAL INNOVATION POLICY PILLARS AND LEVELS

#### 4.1 The Demand Pillar

The demand pillar articulates policies and programmes that generate private and public demand for innovation.



# **National and County**

At national and County level, have policies and programmes that:

- Provide for transparent public procurement of high-quality local products through among others, the Buy Kenya-Build Kenya programme and reserved procurement. These shall include policies that provide capacity-building and training to firms on how to navigate the public procurement process.
- Promote regional integration (East African Community), strengthen regional economic communities that Kenya is a member of (EAC, COMESA) to foster regional trade creating increased demand for Kenya's products. Other initiatives to be pursued include the Continental Free Trade Area (CFTA) and the proposed Tripartite Free Trade Area (TFTA). The TFTA seeks to establish a Tripartite Free Trade Area among the Common Market for Eastern and Southern Africa, the East African Community, and the Southern African Development Community.
- Promote access of Kenyan products to global markets through opportunities provided by existing preferential trade opportunities. These include: African Growth and Opportunity Act (AGOA) that give Kenya duty free access to the US market until 2025; the ACP/Cotonou Partnership Agreement 2005<sup>5</sup> under which Exports from Kenya entering the European Union are entitled to duty reductions and exemptions from all quota restrictions and the Generalized System of Preferences (GSP)<sup>6</sup> which entitles a wide range of Kenya's manufactured products to preferential duty treatment in the United States, Japan, Canada, New Zealand, Australia, Switzerland, Norway, Sweden, Finland, Austria, and other European countries.
- Promote accesses to domestic and global markets by creating awareness on Kenyan goods and products; improving the efficiency of the supply and logistics chain; developing digital platforms for trading and payments, elimination of non-tariff barriers to trade, improving access to credit and improving infrastructures such as market facilities.
- Accelerate integration of county regional economic blocs to promote cluster development and attract investment to the counties.

<sup>&</sup>lt;sup>5</sup> European Communities, 2006, Partnership Agreement ACP-EC.

<sup>&</sup>lt;sup>6</sup> See https://unctad.org/en/Pages/DITC/GSP/Generalized-System-of-Preferences.aspx for more information and respective GSP handbooks for different countries.

# 2A Industry/Institution

At an industry/institution level, have policies and programmes that:

- Build a culture of innovation. Develop and implement a National Innovation Challenge programme, open to all Kenyans, addressing specific national issues. The programme would develop an innovation culture and find practical innovative solutions.
- Include appropriate import/export policies that make Kenyan products competitive in local and foreign markets. These policies should include strategies to protect start-ups and infant industries from unfair competition and business practices.
- Provide incentives to promote value addition and diversification of exports with focus
  the key sectors that utilizes local raw materials and export commodities such as
  coffee, tea, cashew-nuts and horticultural products. Diversification and production of
  high value exports can be used to utilize the potential provided by existing trade
  preferences in the export market.



#### **People**

At a people level, have policies and programmes that:

- Provide for product standards and certification building confidence in consumers in the local products, as well as confidence by consumers in and competitiveness of Kenyan products in export markets.
- Promote consumer protection in the provision of public and private services and good.
- Change perceptions and attitudes towards locally manufactured goods

#### 4.2 The Supply Pillar

The Supply pillar focuses on the side of innovation producers (researchers, innovators, and firms), which is the supply-side of the national innovation eco-system.

Policies and programmes under this pillar seek to support production of innovations by enhancing producers' capabilities and improving incentives to innovate.



# **National and County**

At national and County level, have policies and programmes that:

- Include fiscal and tax policies that provide incentives for Research & Development and innovation commercialisation.
- Steadily and continuously grow R&D and innovation funding available to make it easier for researchers, innovators, and private sector firms in the formal and informal sector to access the funds.
- Provide tailored public trainings for firms, especially in the informal sector to enhance innovation and entrepreneurship, as well as support business compliance to formalize the informal economy.
- Make it easy for public-private engagements and collaborations, including providing supportive and streamlined processes to form public-private partnerships.
- Provide information and brokerage support to enable collaborations and connecting of ideas, people, organisations, and communities.



# Industry/Institution

At an industry/institution level, have policies and programmes that:

- Provide incentives for cooperation and collaboration within the triple-helix framework (academia-industry-government) for new product and process development.
- Provide incentives for firms to invest in research & development, and innovation activities
- Support institutional infrastructure development for research and innovation activities
- Provide for innovation rewards and national recognition.
- Support pathways to commercialisation of innovations, especially through the provision of legal and technical support in the identification, management, and commercialisation of intellectual property assets.
- Support the development necessary research infrastructure and the establishment of shared laboratories and innovation and entrepreneurship centres.
- Encourage and support international mutually beneficial research collaborations to drive the country towards world-class research and innovation hub in the region.
- Support coordination of innovation support institutions, including incubation centres, innovation hubs, and science and technology parks.
- Provide support of innovation activities through awareness creation and access to the right combination of finance, including grants, debt finance and equity finance (Business Angel, Venture capital and equity crowd funding).

# 3B People

At a people level, have policies and programmes that:

- Provide education and training that nurture talent and enhance skills to develop and thrive within an innovative culture.
- Seek to promote creativity and provide a strong foundation from primary for creation of an innovation culture. Skills-based training especially should be carried out in collaboration with industry.
- Provide research and innovation scholarships and grants for talented students, researchers, and innovators.
- Seek to create a critical mass of researchers in priority areas, provide avenues for them to collaborate with their international colleagues, and attract diaspora and foreign researchers to the country.
- Seek to build leadership capacity and capability in support of nascent start-ups and for scale-ups.
- Inculcate, nurture, and sustain creative, innovative, and entrepreneurial culture

#### 4.3 The Broader Environment Pillar

The broader environment pillar focuses on policies and programmes that ensure alignment and coherence in the national, county, and institutional policy for purposes of strengthening and supporting the national innovation system.



# **National and County**

At the national and county level, have policies and programmes that:

- Strengthen the institutional and human capacity of institutions mandated to regulate, coordinate, promote and support the national innovation system – the Kenya National Innovation Agency, the National Commission for Science, Technology and Innovation, and the National Research Fund.
- Strengthen the Intellectual Property Rights (IPR) regime, through enforcement of legislative provisions and regulations, to prevent exploitation of local innovators, researchers, and entrepreneurs, and to encourage knowledge and technology transfer.
- Identify and promote indigenous knowledge in line with the constitutional provisions and the national policy on Genetic Resources and Traditional Cultural Expressions.
- Accelerate the completion of the Konza City Technopolis providing a smart city environment to nurture and grow high-technology firms

 Create opportunities for local value chain with forward and backward linkages and diversification of exports



# Industry/Institution

At an industry/institution level, have policies and programmes that:

- Accelerate the establishment of infrastructure for the formation of industry clusters and innovation and entrepreneurship incubators, providing spaces in support of industry-academia and industry-industry collaboration.
- Reduce cost of production of commodities for example by promoting the access to quality, affordable and reliable energy.
- Improve on the Ease of Doing Business indicators
- Support enforcement of laws to curb counterfeit, illicit products, contraband, substandard goods and dumping



### **People**

At a people level, have policies and programmes that:

- Narrow the digital divide by making reliable broadband affordable and accessible across the country.
- Provide adequate, regular, and strong platforms for public participation in governance and decision-making processes in line with constitutional provisions
- Provide adequate, affordable, and quality social amenities for the wellbeing of Kenyans in line with constitutional provisions, regional and global commitments
- Promote ethical values, principles, and practices in research, innovation, and entrepreneurship

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