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November 16, 2020

The Principal Secretary,
State Department of Broadcasting and Telecommunication
Ministry of ICT, Innovation and Youth Affairs,
10th Floor TelPosta Towers, Koinange Street
P.O. Box 30025-00100,
NAIROBI, KENYA
nsp@information.go.ke

Re: DSA Comments on the Public Consultation on the Draft National Spectrum Policy in Kenya

Dear Principal Secretary,

The Dynamic Spectrum Alliance (DSA) respectfully submits the following comments in response to the Ministry of ICT, Innovation and Youth Affairs consultation on the "Draft National Spectrum Policy" in Kenya.

The Dynamic Spectrum Alliance is a global, cross-industry, not for profit organization advocating for laws, regulations, and economic best practices that will lead to more efficient utilization of spectrum, fostering innovation and affordable connectivity for all. Our membership spans multinationals, small-and medium-sized enterprises, as well as academic, research and other organizations from around the world all working to create innovative solutions that will benefit consumers and businesses alike by making spectrum abundant through dynamic spectrum sharing¹.

The "Draft National Spectrum Policy" published on 22nd October 2020 recognizes that Radio Spectrum is an important and finite natural resource which supports a wide range of services and applications. According to the provided information, this Policy will act as an instrument that will guide for the present and the future of spectrum assignments and management in order to promote and build on the existing broadband deployment and increase nationwide penetration of broadband connectivity especially to the unserved and underserved rural areas.

¹ A full list of DSA members is available on the DSA's website at www.dynamicspectrumalliance.org/members

² Public Consultation on the Draft National Spectrum Policy. https://ict.go.ke/wp-content/uploads/2020/10/Draft-National-spectrum-Policy-for-public-consultation-22nd-Oct-2020.pdf

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The DSA celebrates that the Ministry of ICT, Innovation and Youth Affairs is taking an important step forward on updating the National Spectrum Policy and expects that in coordination with the Communications Authority, will guide Kenya to become a world leader in the development of innovative spectrum-based applications for posterity, specially expanding the scope of dynamic spectrum access. The National Spectrum Policy should include a particular item about spectrum sharing, which is fundamental to a modern spectrum policy framework. This is mentioned amongst the set of best practices for spectrum management identified by the GSR to promote broadband access and recommended for adoption and integration into national spectrum management processes by National Regulatory Authorities and is one of the key actions recommended in the guideline objective number 4: "Promote spectrum sharing, as long as interference is controlled, which can be implemented on the basis of geography, time or frequency separation" from the table included in section 3.

Moreover, the Communications Authority recognised the importance of spectrum sharing as a key strategy of spectrum management. Indeed, one of the objectives of the Communication Authority's Strategic Plan (2018-2023) is to develop a framework for Dynamic Spectrum Access. This will deliver more broadband connectivity in rural and underserved areas, as well as a wider range of investment, and new opportunities for innovation. We encourage the Ministry to support this strategic action in the National Spectrum Policy.

In the sections below, we offer some comments and further recommendations for consideration.

SECTION 4. OBJECTIVES OF THE NATIONAL SPECTRUM POLICY

3.1.3 Increasing the availability, penetration and use of ICT services:

According to the proposed draft "There is therefore need to encourage spectrum efficiency so that the scarce resource can be maximised to enable sufficient wireless communications infrastructure and investment, adequate coverage for the population of wireless communication networks, low quality and high consumer prices", the DSA agrees that spectrum efficiency is crucial and notes that in this last sentence it should be high quality and low consumer prices.

SECTION 6. PRINCIPLES FOR SPECTRUM MANAGEMENT

5.7 Prioritisation of Deployment of Services in Rural Areas

The DSA welcomes this principle in the National Spectrum Policy which will significantly contribute to broadband development in rural Kenya and help Kenya to attain broadband penetration goals set forth in the Authority's Strategic Plan (2018-2023) in line with the Kenya National Broadband Strategy (2018-2023) and Kenya Vision 2030.

In 5.7.4 it is indicated that "the Government shall take initiatives to increase wireless broadband penetration for the provision of Internet services that are fast, reliable, and of good quality to people in the unserved and the

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underserved areas." There are no details about the initiatives that could be considered, in that sense, the DSA would like to highlight that the UHF band has excellent propagation characteristics that make it particularly attractive for delivering communications services over long distances, coping with variations in terrain, as well as providing coverage into and within buildings. Type approved and authorized white space devices could be deployed by Wireless Internet Service Providers (WISPs) to provide Internet connectivity in rural and underserved areas, including for schools and libraries. The DSA supports increasing shared spectrum use in TV white spaces for cost-effective broadband deployment and is convinced that Internet access will increase digital inclusion.

5.8 Clarity on Rights and Access to Radiofrequency Spectrum

In 5.8.3 among the rights and obligations of the Government, a new item should be included referring to implementing "use-it-or-share-it" rules for the licensed bands. These rules will ensure that efficient use of critical spectrum is maximized and enable WISPs or smaller innovative providers to access the additional spectrum resources necessary to ensure that rural and remote citizens do not miss out on the benefits of accessing mobile networks. Together with a streamlined secondary market leasing process, the "use-it-or-share-it" rules also provide incentives for licensees to make sure all of their spectrum resources are put to use as quickly and as widely as possible.

5.13 Efficient Use of Radiofrequency Spectrum

Item 5.12.8 encourages "the use of unlicensed spectrum, the invisible backbone to many wireless technologies, in order to unlock the next generation of wireless technology that will optimize and expand available bandwidth to promote additional growth and economic development." The DSA agrees with the Ministry of ICT, Innovation and Youth Affairs on this vision and supports that the National Spectrum Policy recognises the importance and the need of enough spectrum for unlicensed access.

The wireless broadband strategy should go beyond assigning high-band, mid-band and low-band spectrum for licensed access. Unlicensed access WLAN/RLAN networks carry offload from cellular technologies and this will continue (total data offload to unlicensed going from 74% to 79% in 2022)³. This will lower the costs of network deployment for mobile operators and for edge investment by neutral host and third-party providers. It will also lower costs for consumers. So, it is crucial to identify and enable additional frequency bands for unlicensed spectrum access in high-band, mid-band and low-band spectrum.

CONCLUSION

In conclusion, the DSA would like to express our support for the Ministry's initiative in updating the draft National Spectrum Policy and would like to offer our continued support to the Authority in developing and

³ See Cisco Systems, Cisco Visual Networking Index: Global Mobile Data Traffic Forecast Update, 2017-2022. (link)

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implementing dynamic spectrum sharing policies and technologies. We are available to discuss these comments and any additional requirement the Ministry of ICT, Innovation and Youth Affairs might have.

Respectfully submitted,

Martha SUAREZ

President

Dynamic Spectrum Alliance