





# **ICE** 2019

35th Session of the Intergovernmental Committee of Senior Officials and Experts for Central Africa (ICE)

*Digital Transformations and Economic Diversification in Central Africa: Issues, Challenges and Opportunities* 

MALABO 23 - 27 September 2019

## **CONCEPT NOTE**



## **TABLE OF CONTENTS**

1	BACKGROUND						
2	JUS	TIFICATION	3				
	2.1	What is digital transformation?	4				
	2.2	Impact on employment	4				
	2.3	Impact on industry	5				
	2.4	What about Africa?	6				
	2.5	Digital economic potential	7				
	2.6	Prospects in terms of job creation for young people in Africa	7				
	2.7	Role of youth in the digital economy and training	7				
	2.8	Challenges for Central Africa	8				
3	OBJ	ECTIVES OF THE MEETING	9				
4	ORG	GANIZATION AND FORMAT OF THE MEETING	9				
5	5 EXPECTED OUTCOME OF THE MEETING10						
6	PAF	RTICIPANTS	10				
7	DA	DATE AND VENUE OF THE MEETING10					
8	WO	WORKING LANGUAGES					



## 1 BACKGROUND

1. The Intergovernmental Committee of Experts (ICE) is the first statutory body of the Subregional Office for Central Africa of the United Nations Economic Commission for Africa (ECA-SRO-CA / CEA). The Office was established as a strategic platform for fostering dialogue and forging closer collaboration and cooperation among the high-level experts of the sub-region, with the common goal of accelerating inclusive and sustainable economic growth. The ICE meets annually to identify and discuss relevant socioeconomic challenges for the economic and social transformation of the sub-region, and to propose holistic solutions to address them. It also serves as a platform for discussing the state of regional integration in Central Africa and adopting coherent strategies to accelerate its pace, particularly in the context of the Continental Free Trade Area (CFTA).

2. It is in this context that the Sub-regional Office for Central Africa (SRO-CA) of the United Nations Economic Commission for Africa (ECA) is organizing its thirty-fifth session of the Intergovernmental Committee of Experts (ICE) from 23 to 27 September 2019 in Malabo, Republic of Equatorial Guinea. The theme of this year is "Digital Transformations and Economic Diversification in Central Africa: Issues, Challenges and Opportunities". The main item on the agenda of this session is the central role that could be played by the digital economy in the economic diversification of the sub-region, and the creation of new growth opportunities in terms of job creation, especially for its youth.

3. The digital technology has been chosen as a major pillar of economic diversification and industrialization strategy by several Central African countries. This session will be a contribution to the operationalization of the Douala Consensus adopted at the 33rd session of the ICE (Cameroun, September 2017), and the 34<sup>th</sup> session of the ICE (September 2018, N'Djamena, Chad) on the financing of industrialization in Central Africa.

## **2** JUSTIFICATION

4. The choice of this theme was motivated by the cross-cutting nature of the digital economy, which impacts all economic and social sectors of the continent and is also at the origin of the new innovative sectors. The Internet affords the African continent an enormous window on the world and remains an essential tool. The digital economy is one of the few sectors in which Africa has managed to close its gap compared with other industrialized countries or even demonstrate global innovation especially in M-Banking. It is agreed that industrialization is the main engine that can drive growth, productivity, job creation and equally speed up structural transformation. However, industrialization is doomed to fail if it does not mainstream digital transformation will account for 25 per cent of global Gross Domestic Product (GDP). If Africa misses the opportunity to take advantage of the fourth revolution, it risks continuing to be a spectator/consumer in the global economy.



#### 2.1 What is digital transformation?

5. Digital transformation refers to a profound structural shift within a state or a company. It is the transition of an essentially paper economy based on physical materials (office, files, paper, cash payments, etc.) to a paperless economy based on exchange of data (platforms, e-commerce, server-supported database, virtual currency, etc.). In a nutshell, it is the transition from a traditional economy to a digital economy.

6. Today's world has become an increasingly connected digital world. This is illustrated by the nature of the themes identified in several recent international fora. For example, the theme of the 2017 African Union/European Union Summit was "Investing in Job Creation for the Youth: The Digital Economy"; the theme of the Kigali World Economic Forum in 2016 and 2017 was "Connecting Africa's resources through digital transformation". Moreover, under the banner of the Smart Africa Alliance, the Transform Africa Summit "Stimulating the Digital Economy of Africa" was held in Kigali, Rwanda, from 14 to 17 May 2019, and saw the participation of Presidents and other decision makers in this sector. In addition, with the first edition of the Sub-regional Conference on the Development of the Digital Economy for Central African Countries held in Yaoundé in May 2018, the 2016 Davos Forum, the G7 and G20 meetings of 2018, the digital revolution has become one of the key themes in international debates.

7. Officials in the highest reaches of African Governments, including the African Ministers of Finance, Planning and Economic Development of the Economic Commission for Africa meeting in Addis Ababa in May 2018, agreed on one point, namely that the digital revolution is transforming the lives of citizens, and also agreed on the urgent need to mobilize its benefits for more inclusive and sustainable prosperity and development. As such, the fifty-second session of the Conference of African Ministers of Finance, Planning and Economic Development of the Economic Commission held in Morocco in March 2019 addressed the theme "Fiscal Policy, Trade and the Private Sector in the Digital Age: A Strategy for Africa".

8. Considered as the fourth industrial revolution, the digital economy is a new step in the profound economic and social reorganization that has been underway for several decades, as a result of information technologies. Digital technology is ubiquitous in our society and produces increasingly sensitive effects each day; an illustration thereof is the number of internet users that climbed from 3.6 billion in 2016 to more than 4.2 billion in 2018 or the development of ecommerce which grew by 24.8% in 2017 compared with 2016<sup>1</sup>. This fourth revolution, with the increased use of advanced technologies, such as 3D printing, robotics and artificial intelligence, suggests that manufacturing is becoming more automated, which should have a major impact on the manufacturing process worldwide. A question arises for countries of Central Africa: in their quest for economic competitiveness, how do they leverage the numerous opportunities that the digital economy offers in a volatile, uncertain and complex environment?

## 2.2 Impact on employment

9. This implosion of the mainstream economy has consequences on employment, training and the social contract. According to the McKinsey & Co report<sup>2</sup>, 800 million human jobs will

<sup>&</sup>lt;sup>1</sup> <u>https://www.journaldunet.com/ebusiness/le-net/1071539-nombre-d-internautes-dans-le-monde/</u>

<sup>&</sup>lt;sup>2</sup> McKinsey Global Institute (2017), "Jobs lost, jobs gained: workforce transitions in a time of automation" <u>https://www.mckinsey.com/</u>



be gone by 2030, replaced by automation and robots. This estimate is based on an aggressive implementation of digital technology, with 400 million human jobs lost at an average pace and 10 million jobs lost on a slow pace. As can be seen, the loss of jobs associated with automation will depend both on its pace of deployment in the economy and on market growth.

10. Despite this loss of jobs relating to the digital transformation, there will be an increased demand for work and consequently new jobs (which we cannot imagine for now) generated directly or indirectly in various sectors (health, technology, energy, infrastructure and construction...) by this revolution. Scenarios from the McKinsey & Co<sup>3</sup> study estimate that there could be between 555 million and 890 million jobs created, accounting for 21% to 33% of the global workforce by 2030, more than the disruptive effect of jobs lost.

11. Moreover, the technology itself has historically been a creator of jobs. Let's think of the introduction of the personal computer in the 1970s and 1980s that created millions of jobs, not only for semiconductor manufacturers but also for developers of all types of software and applications, customer service representatives and information analysts.

#### 2.3 Impact on industry

12. Some developing countries with a high manufacturing industry could run the risk of having their jobs relocated to developed countries given the automation of this type of industry at a lower cost locally. Even though all trades will be impacted by this revolution, the most exposed are still the manual and replicative trades. In the Unites States, already in 2013, estimates indicated that 46% of manual industrial jobs were technically automatable, and, according to the 2014 report of the Bruegel Institute consolidated by that of the Roland Berger consulting firm, 40% of jobs in Europe may disappear due to automation<sup>4</sup>. It is therefore urgent to raise the awareness of mainstream economic players about the danger of their existence being threatened by other emerging and innovative economic actors, if they do not integrate digital technology into their economic model.

13. Faced with digital technology, the industry will have to rethink its business model to adapt to the new challenges of this fourth industrial revolution. It will have to move from a mere goods production system into a creation, production and new uses chain system in constant revolutions (see table below).

<sup>&</sup>lt;sup>3</sup> Idem

<sup>&</sup>lt;sup>4</sup> <u>https://cio-mag.com/transformation-digitale-quels-impacts-sur-lemploi-et-vers-quel-type-de-societe-allons-nous/</u>



Dates	1 <sup>st</sup> IR 1780 –1850	2 <sup>nd</sup> IR 1880 – 1950	3 <sup>rd</sup> IR 1970 – 2020	4 <sup>th</sup> IR 2020 – 2050
Industry	Semi- mechanical (small workshops)	<ul> <li>Mechanical (assembly lines)</li> <li>Mass</li> </ul>	<ul><li>communication techniques</li><li>Informatique</li></ul>	• Digital
Major technical inventions	<ul> <li>Steam engine</li> <li>Mechanical loom</li> </ul>	<ul> <li>Internal Combusti on engine</li> <li>Plastics</li> </ul>	<ul><li>Microprocessor</li><li>Satellites</li><li>ERP, CRM</li></ul>	<ul> <li>3D printing</li> <li>Physical cyber systems</li> <li>Virtual / augmented</li> </ul>
New energy sources	<ul><li>Hydraulic</li><li>Coal</li></ul>	<ul><li>Electricity</li><li>Oil</li><li>Gas</li></ul>	<ul><li>Nuclear</li><li>Renewable energies</li></ul>	• Hydrogen
Means of transport	<ul> <li>Steamships and navigable waterways</li> <li>Locomotives and railways</li> </ul>	<ul> <li>Automobile and road networks</li> <li>Aircraft</li> </ul>	• High-speed trains	Autonomo us vehicles
Information disseminatio n channels	<ul><li>Telegraphy</li><li>Mail</li><li>Print media</li></ul>	<ul><li>Telephone</li><li>Radio</li></ul>	<ul> <li>Email</li> <li>Television</li> <li>Internet</li> </ul>	<ul> <li>Social networks</li> <li>Cloud computing</li> <li>LPWAN networks</li> </ul>

Source: 2017 ADEM study Deloitte, G-SCOP and SATIE "Digital impacts in the industry, with regard to the energy and ecological transition"

Notes:

IR: Industrial revolution

LPWAN: Low-Power Wide Area Network

#### 2.4 What about Africa?

14. The continent currently has a very strong potential, both in terms of the number of users and access to the most innovative offers. It is indeed to respond to new consumption habits, as well as to meet the need for responsiveness and interconnectivity that several economic and political actors have invested in this economy for some years now. Digital transformation by using mobile telephony and the internet will therefore have a key role to play in this growth that has already begun in some countries.

15. An example is Kenya which has enabled Safaricom (through its M-PESA tools) to become the world leader in Mobile Banking with more than 2.5 million transactions per day, and better legibility of these transactions with invoices, traceability and hence the fight against corruption. This mechanism has allowed urban as well as most rural populations to have their money wherever they find themselves. In just 10 years, in 2017, M-PESA has generated nearly half of Kenya's total GDP using the mobile money system. It is easier to pay for a taxi using your mobile phone in Nairobi than in New York. Many experts believe that this system is a credible solution to the financial inclusion.



16. Another area where digital transformation could contribute significantly to economic growth is agriculture, which employs about 70% of the continent's population. According to a World Bank report<sup>5</sup>, tripling the value of the sector would create additional jobs and contribute significantly to poverty eradication for millions of people. New technologies would have a significant role in the development of agriculture at each key stage of its process.

#### 2.5 Digital economic potential

17. The digital revolution on the African continent is still in its infancy. Even if major telecom operators and internet giants are particularly interested, no company has a dominant grip thereon, which opens up many opportunities for all digital technology players, large mainstream companies or startups. Accordingly, Jumia, Afrimark and M-Kopa are maiden examples of African success stories and are pioneers for a new generation of African entrepreneurs.

18. The continent's economy is increasingly impacted by digitization and in different ways. The use of Big Data or large-scale data processing, artificial intelligence (AI) and threedimensional (3D) printing are examples. The report notes that large sets of data are being collected in several countries in sub-Saharan Africa to use soil characteristics to determine fertilizer needs to optimize productivity. Another example is Tanzania, where plastic bottles are recycled to make 3D prostheses, as well as the use of artificial intelligence solutions by multinational firms on the continent to address certain development challenges, particularly in areas such as agriculture, healthcare, education, energy and water.

#### 2.6 Prospects in terms of job creation for young people in Africa

19. In terms of job creation on the continent, a study by the African Development Bank reveals that companies that integrate digital technologies into their practices will create jobs and boost profits. The Bank announced in 2016 that two million jobs would be created in the ICT sector in Africa by 2021. Programmer-analysts, IT network professionals, and systems and database administrators will find jobs in this area<sup>6</sup>.

20. For its part, the World Bank mentions the possibility of creating millions of jobs in the youth-oriented sector of the continent, which accounts for 60% of unemployed Africans who are twice more affected by unemployment than adults<sup>7</sup>.

#### 2.7 Role of youth in the digital economy and training

21. Africa has the world's youngest population, as more than 70% of Africans (over 700 million people) are under 30 years of age. Its creative, talented and energetic youth offer great potential for driving this digital revolution, and it is also key to the future prosperity of the continent. However, it lacks the skills and experience to access the full range of employment and entrepreneurship opportunities available in this sector. To increase the impact of digitization on

<sup>&</sup>lt;sup>5</sup> World Bank (2016), "ICT Use, Innovation, and Productivity: Evidence from Sub-Saharan Africa". Policy Research Working Paper; No. 7868. World Bank, Washington, DC. © World Bank. <u>https://openknowledge.worldbank.org/handle/10986/25313</u>

<sup>&</sup>lt;sup>6</sup> <u>https://www.un.org/africarenewal/fr/magazine/d%C3%A9cembre-2017-mars-2018/la-r%C3%A9volution-num%C3%A9rique-</u>est-porteuse-de-belles-promesses

<sup>&</sup>lt;sup>7</sup> Idem



development, it is essential that African countries develop complementary skills. Becoming ready for the future entails reviewing and reorienting the curriculum in African educational institutions around science, technology, engineering and mathematics (STEM). Particular attention should be paid to technical and vocational education and training, with closer collaboration between the public and private sectors. It is essential for African youth not only to have enough digital skills, but also an enabling environment to become a major contributor in the areas of entrepreneurship and innovation to accelerate the continent's economic diversification.

#### 2.8 Challenges for Central Africa

22. To participate in the digital economy, Africa must ensure widespread and inexpensive access to the internet. The region is far from being fully connected to broadband infrastructure. Twenty-one of the 25 least connected countries in the world are in the African continent, where only 22% of the population has access to the internet.

23. Central Africa is not spared. In fact, it is one of the least connected African regions in the world. Indeed, according to the "2018 Global Digital" report, Central Africa recorded the lowest internet penetration rate with only 12%, behind North Africa with 49%, West Africa with 39% and East Africa with 27% Internet penetration rate<sup>8</sup>.

24. In addition, the sub-region still has serious setbacks such as the lack of a reliable and secure 24-hours-a-day broadband infrastructure, an ICT skills gap and weak institutional capacity to support innovative firms.

25. This landscape has hampered, among others, the development of digital financial inclusion, which consists in determining how to exploit the tremendous potential of digital solutions (stock exchange, fintech, private savings...) while guaranteeing the consumer protection and financial system stability. The potential for capital gains generated by these institutions/investors could be used to finance part of the industrialization of the sub-region, start uppers, digital entrepreneurs ...

26. Notwithstanding this situation, several countries in the sub-region have adopted a strategy for developing the digital economy. One of the main obstacles to implementing these plans is the lack of funding which, for some countries, is more likely to aggravate the already many years lag in the transformation of their mainstream economy into a digital economy.

27. The case of Rwanda should inspire the other countries of the sub-region in the development of ICT for the benefit of the economy and social inclusion. Indeed, Rwanda is now one of the highest ranked countries in Africa in the digital economy and is considered as an economic model for the rest of the continent.

<sup>&</sup>lt;sup>8</sup> 8 <u>https://digitalreport.wearesocial.com/</u>



#### **3** OBJECTIVES OF THE MEETING

28. The main objective of the thirty-fifth session of the ICE is to consider ways and means to better mainstream the digital economy into the economic diversification strategies of the subregion to accelerate its structural transformation, and to pool the efforts of all Central African countries in terms of digital technology, to set up an integrated digital ecosystem.

29. The specific objectives of the session are:

- To take stock of the digital economy in each country of the sub-region ;
- □ To raise awareness on opportunities to integrate the digital economy into economic diversification strategies of the sub-region ;
- □ To highlight the strengths of the sub-region's digital economy, including start-up innovations;
- □ To identify opportunities and challenges for the development of a relevant and sustainable digital ecosystem at sub-regional level ;
- To come up with recommendations for strengthening the digital economy in the subregion, taking into account identified opportunities and challenges ;
- □ To identify the main sources of funding for digital economy development programmes in the sub-region ;
- □ To pool donors to finance projects for the development of the digital economy in the subregion.

30. Participants of the ICE session will also have the opportunity to discuss statutory issues relating to the functioning of the SRO-CA: (i) the ECA/SRO-CA progress report on the 2018 and 2019 work programme; (ii) report on the progress of regional and international programmes and other special initiatives in the sub-region; (iii) report on the implementation of sub-regional initiatives in Central Africa.

## **4** ORGANIZATION AND FORMAT OF THE MEETING

31. The ICE session will be held in plenaries and break-out sessions on the broader theme "Digital Transformations and Economic Diversification in Central Africa: Issues, Challenges and Opportunities". It will include an initial presentation followed by discussions around the background document of the meeting "Digital Transformations and Economic Diversification in Central Africa: issues, Challenges and Opportunities".

32. The discussions around specific aspects of the main theme will take place in break-out sessions around the following themes:

- Theme 1: Towards effective ecosystems for public-private partnership in support of the digital transformation in Central Africa.
- Theme 2: E-commerce and economic diversification in Central Africa.
- Theme 3: Technological innovations for economic diversification in Central Africa.



#### **5** EXPECTED OUTCOME OF THE MEETING

33. The expected outcome of the session will be a set of concrete recommendations to help member States of the sub-region achieve the digital transformation to sustain and accelerate their transformation and diversification strategy.

## 6 PARTICIPANTS

34. The session will bring together a wide range of high-level stakeholders, including government officials, representatives of key regional bodies (AUC, CEMAC, ECCAS, ITU, etc.), private sector players in the digital economy, bilateral and multilateral development partners (AfDB, World Bank, etc.), senior officials from United Nations entities, civil society and the academia.

#### 7 DATE AND VENUE OF THE MEETING

35. The thirty-fifth session of the ICE will be held in Malabo, Republic of Equatorial Guinea, from 23 to 27 September 2019.

#### **8 WORKING LANGUAGES**

36. The session will be conducted in French, Portuguese, Spanish and English with simultaneous interpretation.



For further information on the meeting, please contact:

**M. Laurent Guiseppe D'Aronco** Email : <u>daroncoguiseppe@un.org</u> Tel. : (237) 670 112 133 Ms. Semia Tapia Email : <u>guermastapia@un.org</u> Tel. : (237) 680 075 014